

## **Evolution Apologetics by the National Academy** **-Recommended Reading For the Creationist**

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This article reviews and critiques three booklets published by the National Academy of Sciences. These booklets are important to the creationist in two ways. First: To correctly learn the claims of evolutionists. Second: To better understand that the goal of many leading evolutionists is to eliminate belief in a creator god.

### Correctly Learning the Claims of Evolutionists

Some sources of information about evolution (sources including some websites, cable shows, and books written from either creationist or evolutionist viewpoints) may appear to be authoritative, but still present false descriptions of the evolution story. It is vitally important that our creation apologetic correctly describes the claims of evolution.

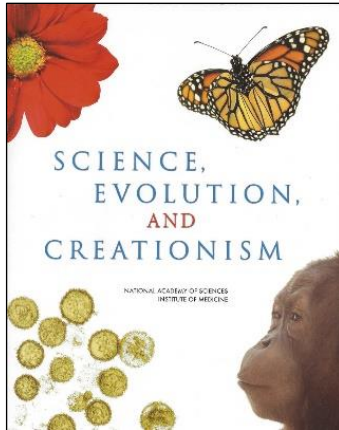
There is no source more trustworthy for helping us correctly learn the claims of evolution than the National Academy of Sciences. The National Academy of Sciences is a group of leading scientists formed by act of Congress, a group who advises the US president. The Academy has written many books which teach evolution. A series of three booklets not only teach evolution, but also condemn creation. I recommend the most recently published of the three, *Science, Evolution, and Creationism*, as the most concise and useful. For that reason, this article will center on that booklet, and end with a few comments on the other two.

### Eliminating Belief in a Creator God

Some internationally known champions of evolution viciously attack Christianity with wild claims, such as accusing creationists of child abuse for teaching their children about creation and even for teaching their children that there is a god. Books by many evolutionists and certainly those by scientific societies avoid such outrageous claims. Therefore, some readers might expect these Academy booklets to simply state their case for evolution and not directly attack Christianity. Those readers would be mistaken. The Academy is very clear that teaching creation is not only unscientific, but also harmful. They claim that Christians have no business teaching creation as the origin of the universe, since origins are not in the domain of religion.

Note these three National Academy of Sciences booklets are EVOLUTION APOLOGETICS. They attack Christianity. They are written to:

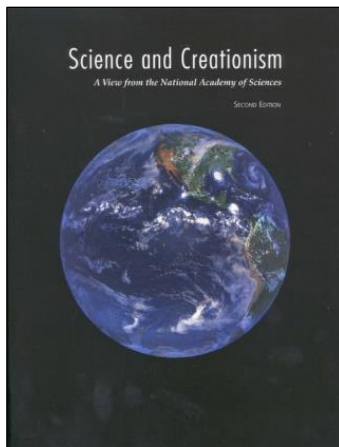
1. Teach select details of the evolution story.
2. Convince the reader:
  - That “Deep Time” (billions of years) is reality.
  - That there never was a global flood on earth.
  - That all living things including people are related by common ancestry.
  - That Christians should believe this and the rest of evolution. (The Academy claims evolution fits well with Christianity.)



### **Science, Evolution, and Creationism.**

by the National Academy of Sciences and Institute of Medicine. Washington, DC: National Academy Press, 2008. 88 pages, softcover, \$14.95.

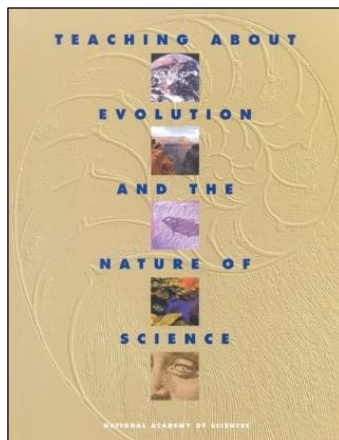
Free pdf at [www.nap.edu/catalog/11876.html](http://www.nap.edu/catalog/11876.html)



### **Science and Creationism: A View from the National Academy of Sciences, 2<sup>nd</sup> Ed.**

by the Steering Committee on Science and Creationism, National Academy of Sciences. Washington, DC: National Academy Press, 1999. 48 pages, softcover, out of print.

Free pdf at [www.nap.edu/catalog/6024.html](http://www.nap.edu/catalog/6024.html)



### **Teaching About Evolution and the Nature of Science.**

by the Working Group on Teaching Evolution, National Academy of Sciences. Washington, DC: National Academy Press, 1998. 150 pages, softcover, \$19.95.

Free pdf at [www.nap.edu/5787](http://www.nap.edu/5787)

Unless otherwise noted, the following comments refer to the first of these three booklets, *Science, Evolution, and Creationism*. Quotes from the second booklet are denoted as “2<sup>nd</sup> ed.”

The back cover of the print version of *Science, Evolution, and Creationism* (not in pdf version) states, “For educators, students, teachers, community leaders, legislators, policy makers, and parents who seek to understand the basis of evolutionary science, this publication will be an essential resource.”<sup>1</sup>

The preface states that this booklet is the 3<sup>rd</sup> edition of a booklet with another title, *Science and Creationism: A View from the National Academy of Sciences, 2nd Ed.* (the second booklet reviewed in this article).

### Recommended Pages

Most of chapters 1 and 2 (pages 1-12 and 17-35; pdf 18-29 and 34-52) briefly explain many claims of evolution including, natural selection, definitions of science/theory/fact, the evolution of stars and planets, the origin of life, biological evolution, and human evolution. These 31 pages are a great resource for correctly learning many claims of evolution, and have often been quoted in LSI Journal articles over the past five years. The remainder of the book is devoted to condemning creation as an unscientific, unreasonable, and harmful belief.

### “Only” A Theory

It is common for creationists to falsely claim, “Evolution is only a theory and has not been proven.” In science, a theory is overwhelmingly held as true. Theories do not become “laws” or “facts” as more evidence is accumulated. All three books define “science” and scientific words like “theory” and “fact.” The Academy writes on page 11 (pdf 28),

The formal scientific definition of theory is quite different from the everyday meaning of the word. It refers to a comprehensive explanation of some aspect of nature that is supported by a vast body of evidence. ...The theory of evolution is supported by so many observations and confirming experiments that scientists are confident that the basic components of the theory will not be overturned by new evidence. However, like all scientific theories, the theory of evolution is subject to continuing refinement as new areas of science emerge or as new technologies enable observations and experiments that were not possible previously.

### Stellar and Solar Evolution

Many people think of evolution as biological only, but the evolution story starts with the Big Bang, which is claimed to have produced time and space. It is further claimed that the stars and planets formed later on their own. Pages 18-21 (pdf 35-38) give a quick overview of stellar and solar evolution. The Academy describes evolution as beginning with the Big Bang (page 18; pdf 35),

Biological evolution is part of a compelling historical narrative that scientists have constructed over the last few centuries. The narrative begins with the formation of the universe, the solar system, and the Earth, which resulted in the conditions necessary for life to evolve.

### Human Evolution

Some creationists think evolutionists teach that people descended from monkeys, chimpanzees, or apes, but that is incorrect. Evolutionists claim people descended from “ape-like creatures.” The Academy corrects this

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<sup>1</sup> Also stated on the web page under “read the full description” at [www.nap.edu/catalog/11876.html](http://www.nap.edu/catalog/11876.html)

misunderstanding on page 24 (pdf 41): “Humans are not descended from chimpanzees or from any other ape living today but from a species that no longer exists.”

### Homologous Structures

In a section titled, “*Common structures and behaviors often demonstrate that species have evolved from common ancestors,*” the Academy states (pages 24-25; pdf 41-42),

Evolutionary biologists call similar structures that derive from common ancestry “homologies.” Comparative anatomists investigate such homologies not only in bone structures but also in other parts of the body, and work out evolutionary relationships from degrees of similarity. Using the same logic, other biologists examine similarities in the functions of different organs, in the development of embryos, or in behaviors among different kinds of organisms. These investigations provide evidence about the evolutionary pathways that connect today’s organisms to their common ancestors. Hypotheses based on this evidence than can be tested by examining the fossil record. Sometimes, separate lineages independently evolve similar features, known as “analogous” structures, which look like homologies but result from common environments rather than common ancestry.

Consider what the Academy is saying. If two creatures have a similar feature (like a similar bone arrangement in a claw), evolutionists make one of two conclusions: 1) The two creatures descended from a common ancestor (“homologous structures”), or 2) That feature evolved twice independently (“analogous structures”).

Evolutionists completely ignore the possibility that similar structures are a result of common design. Evolutionists use science ALONE when writing the evolution story, and science does not consider miracles as a possibility. So if something is the result of a miracle, evolutionists will never reach that conclusion no matter how overwhelming the evidence for miracles, because they reject miracles as a possibility. They will accept non-miraculous explanations even in cases where the only available non-miraculous explanations are unreasonable (such as life from non-living chemicals).

While evolutionists claim similar structures are solid evidence for evolution, those similar structures are also solid evidence for creation. Creationists also analyze similarities in creatures when attempting to determine relationships between those creatures. Sometimes similarities do indicate common ancestry. For example, a creationist may conclude that the similar bone structures in several dinosaur species indicate that these dinosaurs probably descended from a common ancestor, a dinosaur. A creationist may also conclude that similar structures in several other dinosaur species indicate that those dinosaurs are probably of different created kinds and do not have a common ancestor.

### Not Enough Water

The Academy commits the Straw man fallacy by misrepresenting creationist claims. The Academy alleges, Some creationists believe that Earth’s present form and the distribution of fossils can be explained by a worldwide flood. But this claim also is at odds with observations and evidence understood scientifically. The belief that Earth’s sediments, with their fossils, were deposited in a short period does not accord either with the known processes of sedimentation or with the estimated volume of water needed to deposit sediments on the top of some of Earth’s highest mountains. (page 38; pdf 55)

God could have provided enough water during the Noachic Flood to cover today's tallest mountains, but few creationists make such a claim. Creationists commonly assume the amount of surface water on earth today is about the amount of water used for the Noachic Flood. That amount of water would cover the entire planet and all the pre-flood mountains, which are assumed to be smaller than today's high peaks. The Academy off-hand rejects the Noachic Flood without even knowing the arguments creationists make. That is poor scholarship.

Creationist claims that the Noachic Flood may have deposited most fossils is in keeping "with observations and evidence understood scientifically." To say otherwise ignores observations such as the sedimentation which occurred as a result of the 1980 eruption of Mount Saint Helens, which laid down layered sediments just like that seen at the Grand Canyon. Fossilization requires very rapid burial and that is exactly what a global flood would do. The Flood would form fossils in continental sized sedimentary rock layers, and that is exactly what we observe today.

### Sequence of Fossil Layers

The Academy presents evidence as supporting millions of years. Yet that same evidence supports a planetary flood and an earth which is thousands of years old. The Academy summarizes a paragraph by contending (page 38; pdf 55),

The sequence of fossils across Earth's sediments points unambiguously toward the occurrence of evolution.

This is NOT "unambiguous" evidence for evolution, because these same fossil layers are what would be expected from the Noachic Flood, which is evidence for creation. One would expect the location of Noachic Flood formed fossils to be dependent upon where those creatures were living, and on their ability to temporarily escape the rising flood waters. Fossils of bottom dwelling sea creatures such as trilobites would be in layers together. Fossils of sea creatures which were not bottom dwellers (most fish) and land animals would not be found with the trilobites. Then there would be layers of fish. Then there would be layers of land animals. The bigger land animals could escape flood waters for a while, while smaller ones like mice would be buried first. Fossils of people are not found with dinosaurs, trilobites, and many other creatures, because people did not live with those creatures. So the sequence of fossils is solid evidence for the Flood.

### Creation Promoted By "Small Groups"

The Academy is factually incorrect in its attempts to minimize the number of creationists. They make it seem like there are rather few creationists in the USA, when they know that more than half the country is creationist (using the Academy's definition of "creationist" in their words below). The Academy asserts (pages 37-38; pdf 54-55),

In the United States, various views of creationism typically have been promoted by small groups of politically active religious fundamentalists who believe that only a supernatural entity could account for the physical changes in the universe and for the biological diversity of life on Earth. But even these creationists hold very different views. Some, known as "young Earth" creationists, believe the biblical account that the universe and the Earth were created just a few thousand years ago. Proponents of this form of creationism also believe that all living things, including humans, were created in a very short period of time in essentially the forms in which they exist today. Other creationists, known as "old Earth" creationists, accept that the Earth may be very old but reject other scientific findings regarding the evolution of living things.

A 2014 Gallup poll found that 42% of Americans are creationists who believe that “God created human beings pretty much in their present form at one time within the last 10,000 years or so.” Another 31% are creationists who believe “Human beings have evolved over millions of years from less advanced forms of life, but God guided this process.” Only 19% believe “Human beings have evolved over millions of years from less advanced forms of life, but God had no part in this process.”<sup>2</sup> It is because the majority of Americans believe God created (some “young Earth” and some “old Earth”) that the Academy writes and updates these evolution apologetic books. If only “small groups” were promoting creation, then the Academy would not have to put its resources into condemning creation.

Many of these creation believing Americans belong to LARGE church bodies and other groups which promote creation. Most churches promote “old Earth” creation, while a much smaller number promote “young Earth” creation. The number of people associated with just the following “young Earth” groups makes the point that there are LARGE groups advancing creation. The church bodies, school systems, and other groups listed below each teach “young Earth” creation. [Some individuals belong to multiple groups.]

- 373,000 members, Wisconsin Evangelical Lutheran Synod (WELS).
- 41,000 enrollment, WELS early childhood – gr. 12 school system.<sup>3</sup>
- 2,097,000 members, Lutheran Church Missouri Synod (LCMS).
- 221,000 enrollment, LCMS early childhood - grade 12 school system.<sup>4</sup>
- 36,000 enrollment, LCMS Concordia University all 10 campuses.<sup>5</sup>
- 15,000,000 membership, Southern Baptist Convention.
- 500,000 readership, Institute For Creation Research, *Acts & Facts*.<sup>6</sup>
- 287,000 visitors in 2015 to the AIG Creation Museum in Kentucky.
- Millions have toured in 8 years.<sup>7</sup>

### Billions of Years Compatible With Christianity?

The Academy argues that Christians can believe in billions of years without harming their faith. The two are “fully compatible.” The president of the Academy, president of its Institute of Medicine, and the booklet committee chair sign the preface, which they end with the claim,

As *Science, Evolution, and Creationism* makes clear, the evidence for evolution can be fully compatible with religious faith. Science and religion are different ways of understanding the world. Needlessly placing them in opposition reduces the potential of each to contribute to a better future. (page xiii; pdf 14.)

Quotes from religious leaders who believe in billions of years are printed on four pages under the title, “Acceptance of the evidence for evolution can be compatible with religious faith.” The Academy continues this theme throughout the booklet,

Religious denominations that do not accept the occurrence of evolution tend to be those that believe in strictly literal interpretations of religious texts. ...Attempts to pit science and religion against each other

<sup>2</sup> Gallup, May 8-11, 2014, <http://www.gallup.com/poll/21814/evolution-creationism-intelligent-design.aspx>

<sup>3</sup> <http://synodadmin.welsrc.net/download-synodadmin/official-synod-reports/?wpdmdl=3263&ind=fQXmuSxKVhKp9dO085aziKKmOuLaCUxQ5c33simCXPi4VVKIPjbCpbBTzguwfTXA>

<sup>4</sup> <https://www.lcms.org/Document.fdoc?src=lcms&id=2959>

<sup>5</sup> <http://blogs.lcms.org/2014/cus-enrollment>

<sup>6</sup> Henry M. Morris, “Sowing And Reaping,” *Acts & Facts*, vol. 46 no.1 (2017): 7.

<sup>7</sup> <https://assets.answersingenesis.org/doc/articles/about/annual-report-2015.pdf>

create controversy where none needs to exist. (page 12; pdf 29.) ...Science and religion are different ways of understanding. Needlessly placing them in opposition reduces the potential of both to contribute to a better future. (page 47; pdf 64) ...Newspaper and television stories sometimes make it seem as though evolution and religion are incompatible, but that is not true. Many scientists and theologians have written about how one can accept both faith and the validity of biological evolution. (page 49; pdf 66.) ...The study of science need not lessen or compromise faith. (page 54; pdf 71)

The Academy desires that all Christians reject the historical account of creation revealed by God in Scripture, just as many Christians already do. Those Christians who do not reject creation are charged with pitting science and religion against each other. Yet it is evolution which attacks the very core of the Christian faith. Evolution denies the need for a Savior, and the doctrines of man, original sin, actual sin, the fall into sin, the law, and death. Death is the penalty for sin, not the means God used to create. Evolution and Christianity ARE pitted against each other.

### Does Science Disprove Religion?

The booklet concludes with a Q&A, and the final question is, “Does science disprove religion?” The Academy’s answer begins with the words (*italics in original*),

Does science disprove religion? Science can neither prove nor disprove religion. Scientific advances have called some religious beliefs into question, such as the ideas that the Earth was created very recently, that the Sun goes around the Earth, and that mental illness is due to possession by spirits or demons. But many religious beliefs involve entities or ideas that currently are not within the domain of science. Thus, it would be false to assume that *all* religious beliefs can be challenged by scientific findings. (page 54; pdf 71.)

### Stop Teaching Creation

The Academy declares that the origin, age, and workings of the universe and everything in it are the domain of science and not the domain of religion. Religion should not intrude on science by teaching creation. The Academy continues its answer to the question, “Does science disprove religion?”

As science continues to advance, it will produce more complete and more accurate explanations for natural phenomena, including a deeper understanding of biological evolution. Both science and religion are weakened by claims that something not yet explained scientifically must be attributed to a supernatural deity. Theologians have pointed out that as scientific knowledge about phenomena that had been previously attributed to supernatural causes increases, a “god of the gaps” approach can undermine faith. Furthermore, it confuses the roles of science and religion by attributing explanations to one that belong in the domain of the other.

(page 54; pdf 71.)

I see this quote as an attack on even those Christians who believe God used evolution and billions of years to create. Such Christians accept every part of the evolution story but still have God involved at certain points along the way, such as making non-living chemicals into the first life form, and breathing the Breath of Life (soul) into the first humans. Such Christians may be seen as having a “god of the gaps” theology, where things “not yet explained scientifically must be attributed to a supernatural deity.” The Academy condemns even these Christian

evolutionists by asserting, “It confuses the roles of science and religion by attributing explanations to one that belong in the domain of the other.” Here the Academy asserts that the only source of knowledge about the origin, age, and workings of the universe is science. The Academy claims that religion has nothing to say about these things, as these things are in the domain of science and outside the domain of religion.

### Second Booklet

The second booklet, *Science and Creationism: A View from the National Academy of Sciences, 2nd Ed.*, begins with a great two page long (pages 1-2, pdf 12-13, 2<sup>nd</sup> ed.) explanation of science and definition of the scientific terms, “Fact,” “Hypothesis,” “Law,” and “Theory.” Several LSI Journal articles over the past five years have quoted from these pages. The Academy writes on page 2 (pdf 13) [2<sup>nd</sup> ed.],

Fact: In science, an observation that has been repeatedly confirmed and for all practical purposes is accepted as “true.” Truth in science, however, is never final, and what is accepted as a fact today may be modified or even discarded tomorrow.

Page 6 (pdf 17) [2<sup>nd</sup> ed.] has an amazing claim,

For those who are studying the origin of life, the question is no longer whether life could have originated by chemical processes involving nonbiological components. The question instead has become which of many pathways might have been followed to produce the first cells.

It seems to me that the Academy is being disingenuous here. They have no idea how non-living chemicals self-assembled into the first living creature. Even expert evolutionists admit this (see *We Do Not Know* elsewhere in this issue of the LSI Journal). Additionally, evolutionists have NEVER questioned “whether life could have originated by chemical processes involving nonbiological components.” Evolutionists arbitrarily reject even the possibility of God being the source of life. Once one rejects God, the only remaining possibility is that life “originated by chemical processes involving nonbiological components.”

The Academy criticizes creationists on Page 8 (pdf 19) [2<sup>nd</sup> ed.],

Special creation or supernatural intervention... is seen as unalterable, and evidence is sought only to support a particular conclusion by whatever means possible.

The preceding charge is as applicable to evolution as it is to creation. Many basic assumptions of evolution are “seen as unalterable.” Evolutionists will never alter their arbitrary denial of a creator god, their belief in deep time (millions and billions of years), or their rejection of a global flood on earth (even though they propose global floods on other planets). Evolutionists support these assumptions “by whatever means possible.” Because evolutionists reject a creator god, they make countless assumptions, then “evidence is sought only to support” those assumptions.

For example, evolutionists:<sup>8</sup>

- assume hydrogen gas molecules self-assembled into stars.
- assume rocks self-assembled into the earth.
- assume polar ice layers represent years, not individual storms or day/night warming/cooling.
- assume the Oort Cloud exists, while claiming zero evidence for it.

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<sup>8</sup> Paragraph based on: Mark Bergemann, *Did God Use Evolution to Create?*, presented at LutherDays, September 17, 2016.



- assume non-living molecules self-assembled into life.
- assume similarities between animals are due to common descent, instead of common design.
- assume soft tissue from dead dinosaurs remains soft for 60 million years.
- assume rock layers were deposited over millions of years, even though the 1980 eruption of Mt. St. Helens showed that it can happen in months.

### Third Booklet

This third and lengthier booklet, *Teaching About Evolution and the Nature of Science*, is similar to the booklets reviewed above, but with more depth and with additional content. It begins with the question, “Why Teach Evolution?,” then has 15 pages listing many reasons. Significant space is devoted to the history of science, especially the development of the Theory of Evolution. The last half of this booklet is devoted to helping teachers plan lessons for K-12 science, especially evolution. There are also three multi-page “dialogs,” two of them between teachers, and one of a teacher explaining evolution to her class.

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