Answering the New Atheists: How Science Points to God and to the Benefits of Christianity

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Preface

This book is about answering atheistic arguments against God’s existence with solid evidence from physics, chemistry, biology, psychology, sociology, philosophy, history, and theology to highlight the signposts to God and the many benefits of Christianity to society. Its major focus is to provide Christians with the scientific "ammunition" to battle the claims against God made by militant "new atheists." Arguments from revealed theology will not cut it in a debate with atheists who insist that science is on their side. The only theology that an atheist may afford a hearing is natural theology. Natural theology offers proof of God’s existence and divine purpose through scientific observation of nature and the use of human reason.

My own field is biosocial science and statistics, and my research involves looking at the genetic and neurobiological bases of behavior, particularly criminal behavior. Outside of these areas, I claim no expertise. No one can claim to be an expert, even in the science in which they earned their PhD, because scientific knowledge increases exponentially. One can only claim to be an expert in very specific areas of one’s discipline. As science expands the pressure for specialization in one tiny area of a discipline grows stronger. Every science spawns subfields that then may become separate disciplines, which in turn spawn further specialized areas of research. There are many advantages to this which include the efficiency and speed with which new knowledge is produced, but it carries with it the danger of intellectual isolation as fewer and fewer scientists are able to critically evaluate work done outside of their own narrow area of specialization. In the areas in which I work there are subfields with which I am only dimly acquainted and must "hit the books" when asked to peer review articles pertaining to those subfields. Geneticists and neurobiologists continue to make discovery after discovery as new technology arrives on the scene to enable them to do so, and statisticians continually develop better ways of analyzing the data that spring from these discoveries.

Nor am I a theologian with an intimate acquaintance with the Bible. But I do know enough about science and religion to know that science points the way to understanding God’s creation and to how Christianity is of immense benefit to a free, moral, and prosperous society, and even to science itself. This runs against the grain of radical atheist claims that science and religion are incompatible and in constant conflict. The great Albert Einstein disagrees, stating that "Science without religion is lame, religion without science is blind." As we shall see, science itself (particularly physics) has forced many
scientists who have thought deeply about the philosophical meaning of their work, some kicking and screaming, to accept Almighty God as the Grand Creator of everything.

This book also exposes and rebuts the destructive agenda of the so-called "new atheists" who want God banned entirely from the public square. It is my belief, formed from years of debating atheists, that Christians should acquaint themselves with a basic understanding of science since atheists claim that it is science that has buried God. Of course, God needs no defending by me or anyone else, but Christianity is retreating in the Western world in the face of secular attacks. It is Christianity that requires robust arguments from science when confronted by vocal atheists who view science as "God's undertaker," to steal a phrase from the brilliant and inspirational Oxford mathematician and theologian Dr. John Lennox.

I have previously published 38 books and over 150 articles, but none have presented the challenge that this one has. To write this book, I have set aside my own research agenda (the privilege of a tenured full professor) and delved into this topic for more time than I spent on any five previous books combined. I have reviewed high stacks of peer-reviewed articles and books written by top-notch scientists and philosophers and talked with scientists from a variety of fields. Some of the scientific writings are highly technical, so when I use them I make every effort to explain their content in terms understandable to all who might read this book without scientific training, making no assumptions about prior knowledge.

I have also written with the strong conviction that anyone espousing a position on any matter be it scientific, political, or religious, should be able to stoutly defend it. I do not say that this stout defense is for the conceited purpose of one-upmanship, but rather in the hope that such a defense will convince an atheist to examine his or her position with an open mind and come to know God. Most atheists have never given much thought to their position and simply believe that it is a reasonable position that puts them on the side of science. If a believer can show how reasoning to the best explanation from science leads to theism and not atheism, as countless scientists have found, perhaps they will also abandon their empty, hopeless, and nihilistic atheism for the love of God.

The first chapter shows how scientific insights that emerged in the 20th-century point the way to God and the reasoning used by theistic scientists to make their claim. The alternative offered by materialist scientists is that the universe created itself from nothing for no reason. Or even more bizarrely, the universe was created from the mathematical equations of so-called M-theory of the multiverse, as the late Stephen Hawking claimed. The subsequent three
chapters examine the bounty that Christianity has provided for individuals and society in the Western world and how the "new atheists" are attempting with almost evangelical zeal to drive God out of our lives. The new atheists are strongly leftist who subscribe to Karl Marx’s assertion that "Communism begins where atheism begins."

The next chapter examines the profound theistic implications of the Big Bang of creation and the exquisite fine-tuning of the laws of nature that allows for intelligent life to exist on Earth. The Big Bang was stoutly resisted by many scientists at first because of the "spooky" resemblance to Genesis, but it was eventually established as settled science and drove many former atheist scientists into the theistic camp. The following chapter looks how everything from our solar system’s location in the galaxy to plate tectonics is "just right" to permit life. The probabilities associated most of these circumstances and things occurring by chance far exceed the probability boundaries established by statisticians. In the following chapter we see that atheists don’t want God, so they have given us a multiverse of trillions of other universes with laws of nature different from ours to overcome the probability boundary. If you posit enough universes, they believe that at least one (ours) is likely to contain all the right parameters for life. The multiverse hypothesis is highly speculative and has been heavily criticized by physicists as metaphysical because even multiverse proponents admit they these other universes can never be observed—even in principle.

The following chapter leaves physics and takes us into chemistry and biology and the largely clueless search for abiogenesis—the search for the process by which dead matter supposedly gave birth to living things. Over 150 theories of abiogenesis have been offered, but all have faded away when put to the test. They all face the infamous chicken-or-egg problem since all components of the protein-making machinery must be online at once. The probability of obtaining only a short chain of amino acids required to make a protein by chance are astronomical. As we shall see, one team of physicists calculated that the probability of obtaining the right sugar backbone for DNA/RNA and all the required enzymes is $10^{40,000}$. This is an impossibly large number and one that rules chance entirely out of court.

I then examine Darwinist evolution by natural selection. No one rejects observable microevolution, which simply means small-scale changes in within a species. What is strongly challenged is macroevolution—large-scale innovations in bodily structures and qualitatively new genetic material. Darwin himself viewed this as a major problem, and contrary to atheistic claims, Darwin was not an atheist. He stated this on many occasions, and in his book *Origin of Species*, he wrote that evolution was ultimately due to "the laws impressed on matter by the Creator." The biggest problem encounter in macroevolution
is the time problem. It has been estimated by a number of biochemists that to create a new gene that would contribute to a new function would take far more times than all the seconds that have ticked away since the Big Bang.

The tenth and final chapter looks at the big philosophical questions that Christians must be able to answer to counter atheistic arguments against God's existence—God of the gaps, free will, and the problem of evil. Christians are often accused of using God to fill in the gaps in current scientific knowledge. If we use such arguments we push God further out if or when science fills the gap. God does not reside in gaps and we must base our arguments on what we know, not what we do not. In order to accept the Creator and to enjoy a personal relationship with him, we must freely choose to do so. Atheists deny free will and insist that our behavior and our choices are determined by our genes and environment. Everything is determined by these things to some extent, but I argue that this "soft" determinism is entirely compatible with free will. The problem of evil is often described as the "rock of atheism;" how can a loving and omnipotent God allow all the suffering his creatures must bear? After I examine various answers to this question I conclude that ultimately the best answer is in the promise of Revelation 21:4: And God shall wipe away all tears from their eyes; and there shall be no more death, neither sorrow of crying, neither shall there be any more pain; for the former things are passed away."
Chapter 1

Science Points the Way to God

“Everyone who is seriously involved in the pursuit of science becomes convinced that a spirit is manifest in the laws of the Universe—a spirit vastly superior to that of man, and one in the face of which we with our modest powers must feel humble.”

Nobel Prize winning physicist Albert Einstein

The God Hypothesis

In 1798, the French mathematician and physicist Pierre-Simon Laplace published the first of his five-volume work *Treatise on Celestial Mechanics*. He gave a copy to his friend, the Emperor Napoleon Bonaparte, who asked him why in a book explaining the mechanics of the universe that he had not mentioned its Creator. Laplace is reported to have replied, "Sir, I had no need of that hypothesis." When Napoleon told mathematician and astronomer Joseph-Louis Lagrange of Laplace’s response, Lagrange exclaimed: "Ah, it [the God hypothesis] is a fine hypothesis; it explains many things." Laplace’s reply to this, although this is disputed as apocryphal, was: “This hypothesis, Sir, explains, in fact, everything, but does not permit to predict anything. As a scholar, I must provide you with works permitting predictions.”

Laplace’s remark was not made with atheistic intent since he was a practicing Roman Catholic, but technically speaking, he was absolutely correct. A physicist does not need to insert a "God term" in an equation to figure out, for instance, the frequency of an average yellow light wave. But what if Napoleon had asked Laplace the origin of that light, why we are here, what is the purpose of life, or one of the deepest philosophical questions of all time, asked by one of the greatest thinkers of all time, Gottfried Leibniz: "Why is there something rather than nothing?" These are questions that science cannot answer, so God is hardly irrelevant if we wish answers to these profound questions.

This is not a “God of the gaps” position whereby God is invoked to explain what science cannot explain naturalistically. God’s existence is not contingent on science’s current inability to explain something or other in the natural world. Theists who invoke God of the gaps arguments do theism a disservice because if and/or when science does explain the phenomenon they get egg
on their faces, and it plays into the notion that religion and science are in conflict. Scientists readily acknowledge that the big questions of meaning are outside of their purview, so rather than lazily arguing from what we don’t know to God (of the gaps) I want to argue from what we do know from science to show how it logically leads to the transcendent Creator of the universe who is the foundation of all explanation. I also show from historical, sociological, and psychological studies that, contrary to the claims of militant atheists that it negatively impacts everything, Christianity has led to multiple benefits on Western civilization and leads to healthier, happier, and more fulfilled lives for those who live by its principles.

To interpret Laplace’s answer as implying that God is as unnecessary to explain the most meaningful "why" questions as he is to explain the more mundane "how" questions of the workings of creation is to make the category mistake of confusing impersonal principles with personal agency. Oxford mathematician and philosopher John Lennox uses the example of a Ford automobile to make this point. An engineer, he says, could fully explain how the car worked using the principles of internal combustion. However, if he wanted to know why the car existed, he would have to invoke agency. That is, why Henry Ford chose to manufacture automobiles in the first place. Ford’s agency would have no place whatsoever in the description of how the car works, but he is necessary to explain its existence. In other words, one needs both explanations to have a necessary and sufficient explanation of the car. Likewise, to have a necessary and sufficient explanation of all that exists in the cosmos we need both science and the Creator.

John Lennox’s evaluation of Laplace’s remark to Napoleon is revealing: "Considered as a serious observation, his remark could scarcely have been more misleading. Laplace and his colleagues had not learned to do without theology; they had merely learned to mind their own business."³ “Their own business” is the business of natural science; a business that can be pursued by even the most devout scientists without the God hypothesis entering their work. But affirming the utility of science does not imply disclaiming God, as countless first-rate scientists can attest. However, there are scientists who refuse to let God into their world at all and place all their faith in materialism/naturalism. Atheist and Marxist (two sides of the same coin) geneticist Richard Lewontin honestly reported his commitment to the materialist position despite some of the issues he points out:

Our willingness to accept scientific claims that are against common sense is the key to an understanding of the real struggle between science and the supernatural. We take the side of science in spite of the patent absurdity of some of its constructs, in spite of its failure to fulfill
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References


References


Craig, W., & Meister, C. (2010). God is great, God is good: why believing in God is reasonable and responsible. Downers Grove, IL: InterVarsity Press.


Goswami, A. (2014). *Creative evolution: A physicist’s resolution between darwinism and intelligent design.* Wheaton, IL: Quest Books


References


http://www.abc.net.au/religion/articles/2012/05/08/3498202.htm


http://www.realclearscience.com/blog/2016/01/string_theory_has_failed_as_a_scientific_theory.html


http://www.thepublicdiscourse.com/2015/06/15118/


Horgan, J. (2014). The philosophy of guessing has harmed physics, expert says. Scientific American, August 21
References


References


References


Müller, G. (2017). Why an extended evolutionary synthesis is necessary. *Interface focus, 7,* 20170015.


Reeves, C. Comment made with signature to the Dissent from Darwinism Statement. https://dissentfromdarwin.org/2008/09/22/professor_colin_reeves_coventr/


Stormer, J. (1964). *None Dare Call It Treason*. New York: Buccaneer Books


University of Tennessee at Knoxville. (2010, January 19). Bacteria are more capable of complex decision-making than thought. ScienceDaily.


Xu, Q. (2014). *The evolutionary feminism of Zhang Kangkang and the developing dialogue between Darwinism and gender studies*. PhD dissertation, University of Helsinki, Finland.


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