Religious Studies **43** (2007) **doi:10.1017/S0034412507009134**

Richard Dawkins *The God Delusion*. (London: Bantam Press; New York NY: Houghton Mifflin Company, 2006). Pp. x + 406. £20.00; $27.00 (Hbk). ISBN 0618680004.

Richard Dawkins, one of the most prominent atheist-scientists to date, and currently the Simonyi Reader and Professor of the Public Understanding of Science at Oxford University, has endeavoured to provide us yet again with a thought-provoking popular science book against God's existence, targetting the general public with a religious interest as a readership group. As an evolutionary biologist by training, and seeing Darwinism threatened by creationism, it seems reasonable that he wants to save his science from the religious fundamentalists. Yet the question is whether his defence is justified and whether it goes too far. For although Dawkins's book is the most entertaining I have read in years, it polarizes the subject matter to such an extent that it sometimes becomes difficult to take the book seriously as a scientific work. Dawkins, for instance, writes (18) that 'Pantheism is sexed-up atheism. Deism is watered-down theism'. Another passage (33): 'Splitting Christendom by splitting hairs – such has ever been the way of theology'. Moreover, by polarizing matters in this way, and by lacking moderation throughout the book, Dawkins risks hurting the feelings of his opponents in such a way that it may diminish their capacity to accept his arguments as rational.

Dawkins takes the claim of God's existence to be a scientific claim, which gets supported or undermined by means of evidence. Yet evidence seems to be his sole criterion, neglecting the fact that evidence can be interpreted in different ways, so that he seems to be unaware of the Duhem-Quine thesis of the underdetermination of the theory by the data. Some of the evidence he gives wouldn't be considered sufficient according to any scientific standards. For instance, he mentions typical statements by three American rabbis (262) in order to support his claim that observant Jews are discouraged to marry someone from another religion.

I am quite sure that every scientist would agree with me that it is not only evidence that counts, but that the interpretation of the evidence should be consistent with the theory which one advances, and that that is why one needs logic to a certain extent. Thus, criticizing theologians and philosophers because of their use of modal logic seems to be wrong (84). The value of logic, with regard to theistic arguments, is quite clearly established by means of J. H. Sobel's seminal book *Logic and Theism: Arguments for and against Beliefs in God* (Cambridge: Cambridge University Press, 2004). In this book, one finds (581, n. 21), a religious account of how old our universe is, which is in agreement with the

popular-science account of 15 billion years, something of which Dawkins seems to be unaware.

In accordance with Dawkins's disrespect for logic, we find that he commits the fallacy of virtue by association. According to T. Govier (*A Practical Study of Argument*, 6th edn (Belmont CA: Thomson Wadsworth, 2005), 187), the fallacy of virtue by association is the following:

> It is just as irrelevant to try to buttress a claim on the grounds that it is 'linked' to a positively regarded group as it is to resist a claim on the grounds that it is 'linked' to a negatively regarded one. Someone who greets your critical questions with the claim that what he is saying must be correct because he learned it at Princeton or Oxford is committing the fallacy of virtue by association.

Dawkins commits this fallacy (65), where he criticizes Richard Swinburne's view that too much evidence for God's existence might be bad for us, not by arguing against Swinburne's claim, but simply by pointing out that if someone who has held the UK's most prestigious professorship of theology and who is a Fellow of the British Academy is not able to come up with a better answer, then one shouldn't ask a theologian for a view.

In order to get an overview of the book I will briefly present what each chapter is about, making some more detailed criticisms of Dawkins's master-argument in chapter 4.

In chapter 1, Dawkins makes a distinction between Einsteinian religion and supernatural religion (13), and he makes clear that he will only advance the view that supernatural gods are delusional (15). Moreover, he states that he will not give religion a privileged stance, in the sense of giving it undue respect, but will treat religion in the same way as any other subject matter.

Chapter 2, 'The God hypothesis' begins with a definition of the same, namely that '*there exists a superhuman, supernatural intelligence who deliberately designed and created the universe and everything in it, including us*' (31). Dawkins, however, wants to advance the following view: 'any creative intelligence, of sufficient complexity to design anything, comes into existence only as the end product of an extended process of gradual evolution' (31). Yet C. G. Langton ('Artificial life', in M. A. Boden (ed.) *The Philosophy of Artificial Life* (Oxford: Oxford University Press, 1996), 39–94, 39) has pointed out – and I agree with him – that although biology is the scientific study of life, it is actually the scientific study of life on earth, based on carbon-chain chemistry. As a result, so Langton says, it is impossible to derive general principles from this single example. So how is Dawkins justified in claiming that any creative intelligence just comes into existence only as the end-product of a lengthy evolutionary process? Moreover, Dawkins thinks that the existence of God is a scientific question and that, although we don't know the answer to that question yet, we can ascribe a probability to it (48). He considers all gods as magic spells that do no real explanatory

https://doi.org/10.1017/S0034412507009134 Published online by Cambridge University Press

work (in opposition to Darwinism) and require more explanation than they actually give (73).

Chapter 3 deals with various proofs for God's existence, such as Aquinas's, the ontological argument, other a priori arguments, etc., in just thirty-two pages. With regard to Aquinas's unmoved mover, the uncaused cause, and the cosmological argument, Dawkins claims that all three arguments involve a regress and that all three of them depend on God terminating that regress, thereby making the unwarranted assumption that God is not subject to the regress. Yet, equally, one could also ask why does it have to be the case that everything must have a cause? Dawkins makes this assumption without arguing for it, and although we so far have good evidence for that, it doesn't seem impossible that some things might not have a cause; the sceptic Hume, whom Dawkins cites as support for his position in so many places, would even agree with me in that regard. Dawkins also points out that even if we need a terminator to end that regress, then it is still unclear why God has to be omnipotent, omniscient, etc. The latter goes together with Richard Gale (*On the Nature and Existence of God*, Cambridge: Cambridge University Press, 1991) who argues that a necessarily existent God who essentially has all of the divine perfections is an impossible being.

With regard to the arguments from admired religious scientists, Dawkins points out that religious scientists to date are hard to find and that there are correlations to show that there is a negative relation between education level and religiosity. Yet, I would not take this as a proof against God's existence, for the simple reason that most scientists are not theologians or philosophers of religion; that is, they actually spend very little time on the topic of God's existence and tend to work longer hours than non-scientists, so that a non-scientist might have much more time to devote to this question and get a better informed view.

In chapter 4, we find Dawkins's master-argument for the view that there almost certainly is no God, which he kindly summarizes on 157–158:

> 1. One of the greatest challenges to the human intellect … has been to explain how the complex, improbable appearance of design in the universe arises. 2. The natural temptation is to attribute the appearance of design to actual design itself. … 3. The temptation is a false one, because the designer hypothesis immediately raises the larger problem of who designed the designer. The whole problem we started out with was the problem of explaining statistical improbability. It is obviously no solution to postulate something even more improbable. We need a 'crane', not a 'skyhook', for only a crane can do the business of working up gradually and plausibly from simplicity to otherwise improbable complexity. 4. The most ingenious and powerful crane so far discovered is Darwinian evolution by natural selection. Darwin and his successors have shown how living creatures, with their spectacular statistical improbability and appearance of design, have evolved by slow, gradual degrees from simple beginnings. We can now safely say that the illusion of design in living creatures is just that – an illusion.

Dawkins adds two further points, namely, (1) that we have not found an equivalent theory to Darwinism in physics yet, but he thinks that a multiverse theory

such as the theory of Smolin (146) might do the same explanatory work as Darwin's theory did for biology; and (2) that the weak theories which we currently have in physics are, in combination with the anthropic principle, better than the designer hypothesis.

With regard to Dawkins's master argument, I have several questions or points to make: it is unclear to me why an entity which is able to design something as improbable as the universe has to be even more improbable than the universe. That is, I don't see why God has to be very complex and therefore very improbable. Just because someone has an enormous bandwidth (154), doesn't mean that he has to be very complex. After all, computers which are able to accomplish a lot are also built on a very simple foundation, just being able to code everything into zeros and ones. Moreover, even if God were irreducibly complex, this would only cause a problem if God had to be created from something, and if the laws which hold for life on earth also have to hold for God. But the latter is an unwarranted assumption.

Furthermore, even if God were very improbable, for Pascal's Wager even a very improbable God, as long as his probability is not infinitesimally small, is sufficient to lead one to bet on God's existence. Also, the idea of a lazy God who wouldn't have anything to do, because everything goes by evolution and natural selection (118) doesn't seem as ridiculous to me as Dawkins proposes. I actually think it is quite rational not to waste one's energy and let the laws do the work for you. It is also unclear to me (1) why the regress cannot stop at the designer – surely this could be possible? – and (2) why the question of the designer of the designer is such a problem. Surely one could assume that a meta-God has created our God? It might not be the most economical solution, but apart from that, I don't see any problems with it.

Chapter 5 advances the view that religion is a by-product gone wrong of, for instance, the fact that there is a selective advantage for child brains which adhere to the following rule of thumb: believe without questioning what adults tell you (174). Moreover, Dawkins maintains (199–200) that there are several religious memes – units of cultural inheritance – which might have survival value in the meme pool, so that not only genetics might speak in favour of accounting for the phenomenon of religion, but also memetics.

In chapter 6 (219–220), Dawkins claims that there are four Darwinian reasons for individuals to behave altruistically, namely (1) because of genetic kinship; (2) reciprocation; (3) the Darwinian benefit of having a reputation for generosity; and (4) perhaps also the additional benefit of conspicuous generosity, so that we don't need religion as a source for moral behaviour. Chapter 7 advances the idea that the Bible is at odds with the changing moral *zeitgeist* which allows for fewer and fewer casualties in wars (268) and that religion has been a prevalent motive for war (278).

In chapter 8, Dawkins explains why he is so vehemently arguing against religion, for – besides its detrimental consequences with regard to homosexuals and with regard to the abortion debate – fundamentalist religion undermines science (286), and even moderate religion, because of its virtue of unquestioned faith, enhances an atmosphere in which extremism flourishes naturally (303). In particular, he states (286) that he 'is hostile to religion because of what it did to Kurt Wise', who started out as a promising scientist but then gave up science in favour of religion. But on the other hand, he says (264) that the sexual inclinations of people are none of the business of others as long as no-one is harmed. Yet he doesn't state anywhere why religion is his business, whereas others' sex life is none of his business. Of course it seems reasonable to suppose that he thinks that religion does considerable harm and that that's why it should be his business. Chapter 9 advances the idea that it is a form of child abuse to label children as Christian, Muslim etc. In chapter 10, Dawkins makes clear that science can also give consolation, not only religion (355–356), and he also points out that science can inspire, so that there is actually no gap to fill if one were to gave up religion.

This book stands in the tradition of Dawkins's previous books, *A Devil's Chaplain*, *Climbing Mount Improbable*, *The Blind Watchmaker*, etc., and can be seen as the popular-science counterpart to Daniel Dennett's more scientifically grounded *Breaking the Spell: Religion as a Natural Phenomenon* (London: Allen Lane, 2006). Dawkins's most recent book has already led to critical response, in *The Dawkins Delusion? Atheist Fundamentalism and the Denial of the Divine* (London: SPCK, 2007) by Alister McGrath (whom one can consider a Dawkins scholar) with Joanna Collicutt McGrath. I think that *The God Delusion* and the general discussion on Darwinism vs creationism would have benefited tremendously from a more scientific writing style. After all, although Darwinism, or even neo-Darwinism, is the best explanation of the data to date, this doesn't mean that it is beyond reproach (because of being post hoc and having limited predicting capability). But perhaps this is easy for me to say, because as a German who hasn't been exposed to creationism in daily life, one doesn't feel the need to defend oneself against unscientific views.

MARION LEDWIG
University of Nevada, Las Vegas

https://doi.org/10.1017/S0034412507009134 Published online by Cambridge University Press