

Discussing Darwin

An extended interview
with Mary Midgley

Discussing Darwin

is part of *Rescuing Darwin*, a wide-ranging project exploring the extent and nature of evolutionary and non-evolutionary beliefs in the UK today and their perceived relationship with theism and atheism.

The project is managed and run by Theos, the public theology think tank, in partnership with the Faraday Institute for Science and Religion.

It includes an essay on Darwinism and theism in modern Britain, an extended interview with the philosopher Mary Midgley, and two major independent research studies, conducted by the polling company ComRes, and by the ethnographic social research agency ESRO.

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Mary Midgley, née Scrutton, was born less than a year after the end of World War I to Canon Tom Scrutton, a Dulwich curate, and his wife Lesley. Tom's chaplaincy of King's College soon took the family to Cambridge, followed in 1924 by a move to Greenford, Middlesex, where most of her childhood memories are set.

After boarding school at Downe House School in Berkshire (a school which had originally inhabited the Kent home of Charles Darwin), Midgley went up to Somerville College, Oxford in 1938. There she took her place as one of a remarkable generation of women philosophers [including Iris Murdoch, Elizabeth Anscombe and Philippa Foot] who had the signal advantage of an Oxford philosophical training largely free of the ego battles of their male counterparts, then away at the Front.¹

“To the natural Oxonian self-confidence which assumes that learning is important and foolishness a crime, she adds a belief that the learned are often importantly foolish.”

The next stop was Reading University, where she lectured in the philosophy department, before marrying, in 1950, fellow philosopher Geoffrey Midgley. In his 2001 *Guardian* profile of her, Andrew Brown commented:

She had three sons in five years and stopped working, except for reviewing children's books and novels for the *New Statesman*. This interruption supplies one of the most distinctive qualities of her thought: to the natural Oxonian self-confidence

which assumes that learning is important and foolishness a crime, she adds a belief that the learned are often importantly foolish.²

She returned to actively working in philosophy in 1962, this time in a post in the Philosophy Department at Newcastle University, where Geoffrey was also working. Her first book, *Beast and Man*³, however, would not be published for another 16 years, by which time she was in her late 50s.

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1. David Midgley, ed., *The Essential Mary Midgley* (Routledge, 2005), p. 3.
 2. Andrew Brown, *The Guardian* <http://www.guardian.co.uk/books/2001/jan/13/philosophy>.
 3. Mary Midgley, *Beast And Man: The Roots of Human Nature* (Routledge, 1978; revised edition 1995).

Growing up as a parson's daughter, one might have expected Midgley to find Christian faith herself, but this was not to be; she was never quite able to find it satisfactory. This does not, however, equate to an intolerant or antagonistic attitude towards those who do believe:

Midgley remains convinced that 'the religious attitude' is essential to human thriving, and in her work has repeatedly defended the place of religious belief (rather than particular religious beliefs) against its arrogant critics from the sciences.⁴

The briefest study of her work reveals Midgley's antipathy to the concept that science has conquered religion and taken its place in the world. There can be no conquest, she argues, because there is no contest – the two disciplines operate in different realms and seek to answer different questions. "Science," she says, "deals in facts, while religion deals in meaning."⁵

"Researchers report that people who are asked to give their reason for converting to Creationism often say that they have done so because they see it as the only possible alternative to 'Darwinism', which they equate with atheism and find intolerable."

In an article entitled "Purpose, Meaning & Darwinism" in the January/February 2009 issue of *Philosophy Now*, she wrote:

Researchers report that people who are asked to give their reason for converting to Creationism often say that they have done so because they see it as the only possible alternative to 'Darwinism', which they equate with atheism and find intolerable.⁶

It is Midgley's engagement with this topic, and her reading of the compatibility or otherwise of beliefs in God and Darwinian evolution that concern the following interview.

Nick Spencer interviewed Mary Midgley at her home in Newcastle in November 2008.

4. <http://www.giffordlectures.org/Author.asp?AuthorID=223>.

5. <http://www.philosophynow.org/issue64/64midgley.htm>.

6. <http://www.philosophynow.org/issue71/71midgley.htm>.

contextualising Darwin

One of the things that has most struck me from reading your various books is the concept that we think as whole human beings and our ideas operate within deep political and social frameworks. They do not clash in some kind of platonic ether, they are embedded in people, and people are embedded in society, and so in and around and informing and throughout our ideas are preconceptions and predispositions and prejudices and very rarely, if ever, do you get a naked 'one idea versus another idea'. There are always broader factors coming into play.

Yes, that's right. I am always inclined to think that the movement in thought about progress and in evolution from the late 18th to 19th centuries had something to do with the fact that people on the whole no longer expected to go to heaven, or no longer accepted that the Book of Revelation tells you exactly what is going to happen next.

I don't know how true this is or which way round it may be said to work, but you start to see that philosophies concerned with progress, our progress on Earth – like Comte¹, for example – wouldn't have been thinkable in the 17th century. But that idea gradually did become thinkable during the 18th century. It would be interesting to know which way round it happened - that people saw the chance for improving the future on earth so they lost their trust in heaven, or they no longer trusted heaven so they invented this. I do find it rather striking because even now progress is still believed in, although it's certainly notoriously been abandoned many times.

And of course the need for social justice was becoming noticed; the wars of religion were over and things were a little more stable in the 18th century so you could look at society and consider what to do about it. There was a moral demand for improvement on earth, which is quite compatible with the Christian view of the existence of heaven above. But if you concentrate on the one of them perhaps it distracts your faith from the other.

It is no accident that this all happened in the context of the industrial revolution, in which the social and geographical upheaval also suggested to people in a way that would have been impossible 100 years earlier that a different future was possible. The Greek assumption that the earth is eternal and changeless had been gradually damaged, so during the 18th century more and more people who were concerned about social justice

1. Auguste Comte, French philosopher, 1798 – 1857.

were no longer willing to think of it as an unattainable ideal or something that would depend on some divine intervention, but as something that they could provide.

The idea of evolution was very much in the air at this time – it had been since Darwin's grandfather² and Lamarck³ – but it was supposed to be an idea that only the politically disreputable and the seditious would have. It must somehow have seeped further into people's minds, though, so that they could receive *The Origin of Species* when Darwin published it. What Darwin did was to create the mechanism for it and to make it one great argument, so nobody could fail to see its importance.

It's fascinating isn't it how, given the number of crises of faith his work catalysed, Darwin himself didn't have one. The decline of his Christianity was gentle and gradual and it was no real loss. He certainly lived a life remarkably similar to that of the comfortable, liberal, rural Anglican clergyman he would have been had he gone ahead with his ordination.

Yes, he did. I think that it was probably not much of a shock to lose his faith because of the kind of faith that he had, and he had not lost faith in the society, therefore, not in the ideals of the society. The thing he was not committed to doing was comforting the dying by telling them that they were going to heaven, wasn't it?

What Darwin did was to create the mechanism for evolution and to make it one great argument, so nobody could fail to see its importance.

My father became a pacifist because he was a Chaplain in the First World War for a short time, and he had to tell men in the trenches what they were dying for, and this was a poignant experience. I'm sure that will have been a thought that occurred to Darwin, and he was unwilling to do it. He had a lot of the clerical life, but he didn't have that bit.

He says somewhere, doesn't he, that eternal punishment is an abominable doctrine, so there were enough really off-putting features in Christianity at the time for him not to be too bothered if he had to put a great deal of it aside.

His was a very propositional faith and when some of those propositions got challenged the whole thing collapsed. He was the first person to admit there was no particular emotional commitment; he distrusted the evidential worth of experience, and as Emma⁴ pointed out to him, your experience and your feelings are a very important element of religious life.

2. Erasmus Darwin, physician, natural philosopher, physiologist, abolitionist, inventor and poet, 1731–1802.

3. Jean-Baptiste Lamarck, French naturalist, 1744 – 1829.

4. Emma Darwin, née Wedgwood, wife of Charles Darwin, 1808 – 1896.

Well, of course, it's not only important in religious life. He wrote in his autobiography that he had lost a lot of the emotional side of life generally, and what he recorded and recognised clearly was already happening then – he lost his appreciation for music, poetry, landscapes, even scenery. He was becoming more and more obsessed by the need for formal proof, and the work of putting together the details of his argument obviously was important. But of course experience is also part of the evidence, of the data. You've got to accept what people tell you, and what they tell you is what they've experienced.

Experience is also part of the evidence, of the data.

People talk about 'scientific empiricism', but it isn't very empirical, it seems to me, because it's so selective among the experiences that people have. It's not interested in what you might call strong and positive experiences. The sense that all sorts of things are happening which we don't understand is a very important element of experience, and anyone who doesn't take that seriously is not going to get far.

Different approaches have to work together, you see. I've used repeatedly the analogy of the senses – we touch things and we also see them and smell them. Now, there's no continuity between those things, but we use the relation between them to build the full picture. We know that there are optical illusions and also tactile illusions, and we use the one thing to correct the other.

John Ziman⁵ used a similar analogy with maps – a political map and a geological map describe the same phenomena but they are doing it in different ways, according to different questions. He highlighted how much we think in terms of diagrams and visual things as well. But there's always a temptation to become wedded to one particular map, and I think the economic map is the one that is currently being taken to represent reality – the bottom line. When you find what the profit and loss is, that's the reality. And it's of course the one that's really under attack at the moment.

Myths are about an imaginative background, a way of seeing a problem in the world.

In Science and Poetry⁶ you point out that detailed thinking emerges from imaginative roots, and all science includes philosophic assumptions. I think that's quite an unfamiliar thought to many people today. Do you want to unpack it a little bit, particularly in relation to Darwinism?

5. John Michael Ziman, physicist, 1925 – 2005.

6. Mary Midgley, (Routledge, 2000).

Yes, we all have myths through which we explain the world. The word 'myth' is a bit awkward because it is sometimes used simply to mean 'false', but I find its other meaning very useful. I also talk about dreams and dramas and visions and so forth. Whichever way one talks about it, it's about an imaginative background, a way of seeing a problem in the world which determines what questions you ask, how you select your questions.

The idea that simply, honestly finding the answer to questions is all you need doesn't work – you've got to have the right questions. I think that as the history of science has built up and emerged it's become clear that this has been a very important factor at every stage.

I think it is quite important in that in the 17th century the imagery of clockwork was terribly strong, so when Newton was trying to understand the universe he was seeing it as a one-way clock. It's not surprising that people were terribly impressed with clockwork because at the time it was a miracle, a magic, a mystery. Once you have a way like that of thinking about how things work, you go on using it, it's very gratifying and satisfying – you find you can use it for lots and lots of things, so you don't feel a need to look for another one.

That seems to me a very striking example, and of course it's still with us. We still talk about a mechanism don't we? And the idea that all the bits of our bodies are machines – it's a thought often used. For one thing it makes our bodies less frightening I think, because a machine is something that people make, isn't it, and that people can control and take out and alter. It provides a sense of control.

So this was an angle from which people very much liked to look at things. After a time physics began to find the machine image not very satisfactory, so from Faraday's time instead of little particles, you started having fields and waves and so on. Different imagery needed to be used. Then from Einstein on, the imagery questions got very difficult – there is no comprehensive model or pattern which you can imaginatively see.

In the 19th century, Darwin's time, it seems to me that the market had already begun to be an image that fascinated people. The way in which Herbert Spencer⁷ developed Darwin's ideas to create this terrible idea of 'Social Darwinism' was an attempt to make a direct equation between the processes of the market and the processes of nature. On the one hand you see the idea of the market used to understand nature, illustrating 'the survival of the fittest' with reference to the stock exchange – on the other you see that turned back to say 'the stock exchange is actually just a jungle'. So things are simplified from both sides.

7. Herbert Spencer, philosopher, 1820 – 1903.

If we ask why the crude, brutalist images of Social Darwinism have been so persistent it is because they have this enormous flexibility. They can be used both ways. If people are morally worried about what's happening on the stock exchange, they can shift that worry by saying, 'It's just nature isn't it?' Whereas if they are worried about what's going on in the jungle, they can say, 'It's all a great machine.' You are getting away from agency all the time.

Whatever the mythology of the time is, those inside it don't recognise it as such; they think they are just noticing facts.

So these images, both of which have been very powerful in science, as well as everywhere else, have an appeal because they simplify things. But they simplify them in a way which gets rid of certain awkward frictions. And it is hard to debunk this pattern because it's doing so much for people; soothing their anxieties – making them think it's all quite simple.

It's quite striking, isn't it, how Darwin used the language of creation, not very much of the time, but he did use it.

Marxism was a big feature of the time when I was growing up, so it's the political philosophy I'm most familiar with. It is another striking example of an imaginative system – a fable, a dream, a drama, a vision – within which a lot can go forward. Of course there was a good deal of fairly dodgy stuff on the fringe of science which was Marxist, but I don't think it was any dodgier than the monetarist things that have been going on since then. The mythology of how markets work, of how money can do things on its own, is as remote from solid physical reality as these other things. And of course whatever the mythology of the time is, those inside it don't recognise it as such; they think they are just noticing facts.

It's very important not to allow yourself to become wedded to one particular myth – one way of seeing the world to the exclusion of others - but to be aware of other possibilities.

Would it be fair to say that we cannot think outside myths?

Yes, in the sense of an apparatus whereby you think. I suppose it sounds less surprising if one refers to

'visions'. It's an imaginative framework within which one fits the different elements. We have somehow lost the ability nowadays to fit myths into their place, though. I understand that in Nepal and Tibet Buddhist monasteries would pay a great deal of attention to myths. They would have popular dramas going on with devils and, you know, all this imaginative stuff, and they took it perfectly seriously alongside the very abstract speculation that they did, and one didn't conflict with the other. Now that seems to me to be a very sophisticated and sensible approach.

I think it's very important not to allow yourself to become wedded to one particular myth – one way of seeing the world to the exclusion of others - but to be aware of other possibilities. When you consider your vision of the world, be aware that that's just one building and there are others on the block. And if you begin to find it helpful and a useful framework, you should still be aware that it is one of a number of alternatives and be looking out for the limitations of it. Inevitably, you are going to need different approaches for different topics: private life cannot be understood in the same way as economics, for example, but the temptation to extend what has done a good job for one thing to another is very strong. It seems to me inexcusable for anybody to think that his pattern is the only pattern. You need to have an awareness that other people have views and that your position is just your position and not revelation. The idea of revelations is a dangerous one.

I grew up among intelligent Christians, who seemed to me in many ways to have a very good outlook on the world. There were bits of it that I couldn't assent to but that never seemed to me to be an issue, so I didn't have the problem that either it was making an exclusive claim on me or that I was making an exclusive claim on it. It has always seemed to me to be one way of seeing things, which sometimes I could agree with and sometimes I couldn't. I do not really fully understand the position of somebody who is completely committed to something in that way. But this is not, I think, feebleness or a confusion on my part; I think the world is like that, you know, the world is of many kinds. It has many things in it.

This conviction of Darwin's that whatever is out there is extremely big and nobody is going to understand it, seems to me to be right – it is true of the physical world around us here as well as of the spiritual realities. We have to make up frameworks through which to understand it, but we wouldn't expect any one framework to be final.

You have made the statement that evolution is the 'creation myth' of our age, not that it's not true, or that it is in any way misleading, but in this sense that it is the current framework being used to tell the story of who we are and why we are here.

Starting with Herbert Spencer the notion of evolution was closely linked with progress. It was seen as the earlier stage in the wonderful change that was going on in society at that moment. It altered according to what people were wishing to praise at the time. GE Moore⁸, in the 1930s, was saying that it was right and proper to colonise less developed people because that is the process of evolution – civilised nations are more evolved. Through the whole process of colonisation that story has been very influential, and people talk today about space travel as 'the next evolutionary stage'. Then all sorts of visions of the future are not just expressed but understood in that terminology. So the value judgements become associated with the factual story.

8. George Edward Moore OM, philosopher, 1873 – 1958.

It does seem to me that Darwin may have been disturbed by the political disreputableness of his theory, that he could see it was being used as the name for some process which it really shouldn't be. It became a moral and political tool in all sorts of visions of the future.

Social Darwinism would have absolutely horrified Darwin.

I don't really look at science fiction things much, but there are people, like Kevin Warwick⁹, who think we should be turning into machines and so on. This sort of dream is being justified in evolutionary terms. So if one asks what myth the term 'evolution' is propagating, it is rather a pernicious one in many ways, because whatever the right way to justify some policy may be, it never is that it is the only road to the future.

There does seem to be a tension between two kinds of models or myths that we derive from evolution. One is the one you've been talking about: progress, 'the escalator fallacy'; but also there has been particularly in the last twenty or thirty years, a very reductive agenda around myths that have come from evolution, in which we are divested of our agency, we are divested of our responsibility.

Of course, and that results from not just misusing the story but distorting it, doesn't it? People think that the story is always of the greatest success of bloody-mindedness – and they are mistaken. That's one of the ways in which the idea of human nature gets a bad name, because people mean by 'human nature' just a selection of bad motives that they wish to be regarded as inevitable. There is absolutely no justification for that in evolution. If you look at other animals most of them are not going to be stealing each other's fortunes! It's a very old habit of human nature that when the notion of evolution from animals caught on, it could easily be adopted because animals were traditionally used as symbols of vice, weren't they?

When we look at the question of why people feel that they have to be creationists because to be a Darwinist would be too awful, it is usually these wider myths that they are reacting against.

You can certainly get into fatalism by an obvious route once you start to believe in evolution. But I think there are all sorts of turnings at which you could reasonably come off it. Social Darwinism would have absolutely horrified Darwin. It became quite fashionable in Germany through Haeckel¹⁰ who was a pretty good biologist and Darwinist, and it was used to justify international aggression, particularly in the First World War. So, if we are asking

9. Kevin Warwick, scientist, professor of cybernetics, 1954-.

10. Ernst Haeckel, German biologist, naturalist, philosopher, physician, professor and artist, 1834 – 1919.

'why did Darwinism get a bad name?' it seems to me that this is a key factor. There's a nihilistic materialist element people see in it, too, isn't there, where effectively this universal acid burns through culture and morality and agency and we are left as 'lumbering robots'.

So when we look at the question of why people feel that they have to be creationists because to be a Darwinist would be too awful, and that's the only alternative, it is usually these wider myths that they are reacting against. It's there in Richard Dawkins' manifesto in *River out of Eden*¹¹ about meaninglessness.

I think that the Social Darwinism story is a very persistent and virulent thing, and of course *The Selfish Gene*¹² pretty much gives both messages doesn't it? It's an advertisement for selfishness and the choice of that rhetoric and the persistent 'red in tooth and claw' story really evokes the feeling of Social Darwinism. The meaninglessness story, though, is the more powerful one today. There's something rather odd, isn't there, about the attempt to combine these things? If it's meaningless then it can't have that meaning or any other. But people wish to have their cake and eat it.

Christianity doesn't have to be literalist and Darwinism doesn't have to be bloody or meaningless.

I am depressed and a bit surprised to find that people are not hearing the story which I heard all my life as my papa was preaching it, that Christianity doesn't have to be literalist and Darwinism doesn't have to be bloody or meaningless. I fear that the louder and more ferocious noises do persist to a really alarming extent. I think when people today think of Darwinism as something dreadful, often it is because of the damage it did to the status of man, in the sense that it drags us down, which is a bit separate from Social Darwinist brutality and also from meaninglessness.

Yes, there are different challenges, aren't there – there is this point about dignity, and I wonder if there is also a fear of losing agency?

Yes, oh yes. The notion is that the best of nature is a soulless machine isn't it, so if we are in any way identified with it we become soulless machines. And we do lose agency if agency is held to depend on there being a spirit sent from somewhere different. I suppose that dualism is one bit of Christianity which Darwin did not buy, isn't it? The notion of spirit as this alien, terribly central, valuable thing.

11. Richard Dawkins, (Basic Books, 1995).

12. Richard Dawkins, (Oxford University Press, 1976).

science and Darwin

Shall we talk a little bit about science itself and its social status at the time of Darwin's birth, and how he, paradoxically, was responsible in a sense for it moving from being almost a clerical hobby in the 18th century to being a professional activity in the 19th?

During this time the importance of science was expanding, and even without Darwin it was beginning to be the case that more and more science was needed and very little money was available for it. You couldn't get jobs in it, so it was largely done by parsons simply because they were there. Huxley¹ was extremely aware of this and devoted all the latter part of his life to providing for science because science had to expand. In a sense Darwin helped to make scientific research necessary because he was showing vast vacuums within which things needed to be done.

The original presuppositions about science at this time were fundamentally natural theological ones, but then in the 18th century the geologists made these epoch-making discoveries, that sat ill at ease with those natural theological presuppositions. So people wanted to know more. Yet until that time there were not considered to be serious clashes

between Christianity and science. Had Darwin had a rather different character, had he wished to make his scientific enquiries but also been a bit more interested in his own religious views, might he have taken this issue further?

The idea that the 'science and religion' question is simply a dispute between two beliefs, 'God is there' or 'God isn't there,' is terribly unreal.

It's a pity that Huxley reacted the way he did – he saw no real need to try to reconcile. But I think it does him great credit that he invented the word 'agnostic' because he meant it, didn't he?

Huxley was not particularly comfortable in the scientific community at the time, was he? Whereas Darwin found the door to the halls of British science largely open to him because of who he was, Huxley really had to fight to get in there, so he saw no inner difficulty in opposition to the existing presuppositions – and of course, what he was opposing was often terribly irrational. He saw a monopoly of

1. Thomas Henry Huxley PC FRS, biologist, 1825–1895.

education money in the hands of what he considered rather unimpressive churchmen, and he saw no reason to respect them.

I've been thinking about that in relation to the question of why this feud [between science and religion] is so powerful today, and it seems that Huxley is quite a central figure. All his later life he was busy working to get science funded and established, and his opponent throughout was the church. So it was an economic and political clash, not really a clash of beliefs. The idea which is fostered by Dawkins in *The God Delusion*² and so forth, that the 'science and religion' question is simply a dispute between two beliefs, 'God is there' or 'God isn't there', is terribly unreal.

The prestige of science reached a great peak just after the second world war, with the moon-shot and DNA and indeed the bomb, and people thought it would be able to do everything for us. They got disappointed, and since then they have been disillusioned.

Science is not being respected quite as it was. It's still not seen as taking the place of religion.

I think this is partly the same power phenomenon; not only was science supposed to be wonderful, it was imperialising. It was claiming enormous power, and I think this is quite important to Dawkins and the like – they find that science is not being respected quite as it was. In spite of the great and laudable efforts that they have made to popularise it, it's still not seen as taking the place of religion. It's not that in which people put their trust most profoundly for the most important things. I think that's what they wanted it to be in some way.

*In Science and Poetry*³ you made the point that today's exaltation of science is a response to the 19th century's over exaltation of the Classics.

Yes, there's something a bit mad about the way education in this country, and in quite a lot of Europe, still centred on the Greek and Latin Classics, when so many other things needed to be learned. The effect of that was an awful lot of bad teaching and bad learning. Darwin got it at Shrewsbury school; he just wasn't learning anything of the slightest interest. So science was the refuge, wasn't it? It was always felt to be realistic and part of the world, whereas literature wasn't. It's not an ancient tradition that literature doesn't like science, but it had come to be that way – a divide between two cultures.

I think it's even worse now. There are lots and lots of splits. The social sciences don't talk to each other you know, and the sociologists and the neuro-psychologists, and one lot of

2. Richard Dawkins, (Houghton Mifflin Harcourt, 2006).

3. Mary Midgley, (Routledge, 2001).

Early in the last century it was expected not only that science would conquer the other intellectual disciplines but that it would conquer the natural world.

anthropologists with another. The learned world has expanded so much it has divided into a lot of groups, and feuds pop up all over the place. I suppose it's not so much one big feud and perhaps that's not a bad thing, but it's the sort of thing that constantly needs to be resisted and somehow dealt with.

Early in the last century, though, it was expected not only that science would conquer the other intellectual disciplines but that it would conquer the natural world. You still see similar ideas when people talk of the things science will achieve in the future, when there is more technology. So you get in *New Scientist* remarks about what is going to happen – certain inventions will eventually be made and so forth. This is a faith of a quite extraordinary kind isn't it? And as people have withdrawn their faith from religion they seem to have put it on this stuff.

Dawkins gets cross if anybody says that *The Selfish Gene* has anything to do with Thatcherism but it's always seemed to me that the reason it caught on so is that it came out just then. It is of that time, when there was a strong reaction against having to be unselfish.

In the thirties the big thing was Marxism. Of course, Marxism was around earlier than that but the great polymaths were finding that Marxism did great jobs for them. Marxism is also a very flexible framework and it can be very useful and fertile. But of course everybody used it in their own sense and in their own particular connection, and it gave the sense of infallibility.

John Desmond Bernal⁴ was a crystallographer; not a front-rank scientist, but a good one, and extremely Marxist. The good side of Bernal was that he wrote a book called *The Social Function of Science*⁵ which was, I think, the first really effective stroke against the idea that science is not only very useful but almost sacred – that science is so important it should always prevail over any other ideals. People were saying that for instance splitting the atom might be rather dangerous but it's science; science demands it, and this kind of thing must always just go ahead. Well in 1939 Bernal wrote *The Social Function of Science*, pointing out that the more science could do the more responsibility it owed to all the ordinary moral and social standards.

4. John Desmond Bernal, scientist, 1901–1971.

5. John Desmond Bernal, (MIT Press, 1967 (reprint)).

After the war the bomb and related matters did put us in a state of actual terror for a time, and the cold war was also extremely alarming. An awful lot of people thought 'we really must get things right' and were prepared to go to quite considerable lengths to do so with the Health Service and similar things. And for some 15 years or so that seemed to be going quite well. However, people got tired of being rationed and told that they must behave themselves and not eat too much and so forth, so when Thatcher came along and said 'indulge yourself, it's much more sensible', they rushed off and did it.

Dawkins gets cross if anybody says that *The Selfish Gene* has anything to do with Thatcherism but it's always seemed to me that the reason it caught on so is that it came out just then. It is of that time, when there was a strong reaction against having to be unselfish. So monetarism replaced Marxism as the creed of the time, and everybody went quite mad about capitalism, unbridled capitalism. Well that's just fallen through hasn't it?

I have to say that I find it absolutely astonishing how hopeful people were about this monetaristic offer. The story was that we each try to maximise our own good and, by good luck, because of the amazing hidden hand of the market, it works. It works for everybody. So we don't have to make the slightest effort. And therefore, since this is all so fortunately so, there is an endless progress, it's kind of destined. Which is all just superstitious metaphysics, isn't it?

So Marxism and monetarism were two social hopes which have successively proved not to work.

on mammals and morality

In his almost fevered speculation in his notebooks in 1837-39, when the penny finally drops, Darwin reads Malthus¹, and realises that it's not just our physical form that will have been selected for but also our mental capacities and, possibly, he hints at our moral capacities as well. So right away he starts the train of thought that is very powerful today in some people, which sees all our mental capacity, all our moral capacity as simply derived from, and therefore explicable by, our evolutionary past. I'm inclined to think that you can take that so far, but only so far, and as soon as you try to explain everything you end up explaining nothing.

It depends what sort of explaining you have in mind doesn't it? If one asks about human emotional tendencies it's clear that a great deal is like that of other mammals; we are fond of our young, and concerned about our dignity, ambitious for affection, enjoy play, and so on. But we also form these very complicated societies in which there is a lot of custom which we have to learn once we are here.

If you start asking why we have moral standards I'm not quite sure what kind of a question that is, but I do find extremely interesting the parallels Dawkins makes with other creatures. We plainly have natural pro-social tendencies, but we also have a tendency to look forwards and back and to organise lasting rules and the like which the other species probably don't in the same way.

I think the deepest reason why we need morality is conflict. We have naturally conflicting emotions. These come for a start from our physique, but are also influenced by circumstances and culture. If we didn't have those we wouldn't need morality.

Now if one is asked to explain the existence of morality, that seems to me to be answering the right question, whereas the attempt to say it's been useful evolutionarily isn't. Once we have it, anyone can easily see that it is useful, that it serves a function, but the question 'which function?' is the one that matters isn't it? That question arises because some people are asking 'Well do we need morality at all, is it all a mistake?' – Nietzsche and Hobbes and so on.

1. Reverend Thomas Robert Malthus FRS, scholar working in political economy and demography, 1766 – 1834. Author of *An Essay on the Principle of Population*, 1798.

Now, at that point I think it does become important to say that there are biological sources for our emotions and for the constitution of our mind. People have always taken that for granted to some extent, and science confirms it, because now we know about hormones and much more about *how* this happens. But *that* it happens has probably always been obvious. The interesting question, however, is what the arbitrating 'mechanism' is - what comes in to decide between the conflicting motives? It seems to me that things have gone wrong when it is suggested that there is a special arbitrator who's something separate, and what's more (in the Platonic and Christian tradition) someone who comes from somewhere else.

What one has to say somehow is that *the whole person decides*, and that is a function that obviously has been developed in evolution. This does seem to me to be true – we got this more complicated brain because a more complicated brain allows us to look both further back and forward to envisage more facts, and also to envisage ourselves as a whole more, so the thinking powers have been developed to do that.

At this point I'm inclined to say this isn't unduly reductive at all. One can still say that God comes into it because the whole person exists in the context of God's creation, and is in harmony with Him and it. But people get scared. They get scared either of the reductive physicalist interpretation which suggests that the physical mechanism does it all, pushing us around, and we don't know what's happening. Or they can get scared of the alien element, of course, if it's something that is sent in from outside.

Do you see signs of morality in the other primates?

Yes. I think it's absurd to say that they never wonder what to do or think one thing is better and righter than another. The same is certainly true of dogs. People are drawing more attention to dogs now and so they should. A dog knows what it ought to do. It knows it's done what it shouldn't. It is simpler than what goes on in us, but I don't think we could have invented that from scratch. This is an evolutionary argument. Nature does not make leaps of that kind. We are more in concert and harmony with these creatures when we live with them than would be possible if they were that remote from us.

So conversely, do you see anything that is a definite point of significant difference between humans and other primates, other animals, either on moral lines or mental lines?

Well speech does make such a difference doesn't it? We can talk to each other about it; we can say somebody shouldn't have done what they've done. I'm sure this is communicated a bit without words, but the words allow traditions and expressive rules to grow up, so it all gets more complicated. The conflicts of course are often ones which arise pretty much for everybody, or at any rate for the whole society. So we need to

express them to each other, and in expressing them to each other we make them clearer, more articulate and more definite, so we can do more complicated things.

When the Alpha wolf gets old he tends to be dealt with by the other wolves. If it were put to wolves that perhaps that would not be a good idea, I think the wolves could understand, given time. Customs obviously do grow up in wolf packs and primate groups, and among meerkats. It's clear that they often dither and hesitate and are anxious, and to be anxious is to be aware of conflict, and to be aware of conflict they need to be looking for a better resolution. The crucial elements of all those things are present there and must have been present for our ancestors.

So then we ask how much is peculiar to us, and as we are not inside these creatures, I don't think it makes a lot of sense for us. Wittgenstein² said "If a lion could speak we wouldn't understand him." You never know with these very brief remarks quite how much he meant, but I think he was not saying that a lion can't have thoughts that matter to us, but something more like the point that you have to be in a society to know what's happening in that society. It's only by living in a way of life that you can pick it up.

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That seems to me to be the right point - that conflicts always arise in a social context where people are already living in ways which are meant to serve different motives and they clash. Obviously it makes an enormous difference that humans have all this explicit knowledge of what is happening around them and of the past - so we can go back to precedents and so forth.

There is a thing that the primatologists are quite interested in, to do with what happens after chimps have a fight. After the fight there comes a point where the two combatants hug each other, but it's not the aggressor who apologises - it's often that the victim goes and embraces the aggressor and they become friendly again. So there isn't the concept of 'Oh you shouldn't have done that,' or 'This is something that isn't done in our group.' They aren't looking back. They are in a tense mood but they feel they have to get over it. 'Don't let the sun go down on your wrath'. This always happens before the evening apparently. Resentment of the kind that humans feel doesn't seem to come into it because they simply don't have the past present to them in the same sort of way. We, by contrast, live in this long vista of past and future.

It's only lately that some little attention has been paid to this, and in very few species. And it usually results in the discovery that 'they are much more like us than we thought!'

2. Ludwig Wittgenstein, Austrian-British philosopher, 1889 - 1951.

Darwin certainly would have agreed with that. There is a great equality in his approach, and he really was keen to show the continuity. As early as 1838/1839 he wrote in his notebooks 'Why are we privileging man's intellectual fitness over other species' abilities?' In *The Expression of the Emotions in Man and Animals*³ he was taking very seriously the close parallel between human behaviour and that of other animals. And the worm book⁴ wishes to emphasise how great a part in everything we need is played by these rather despised animals.

It seems to me that the search for some one thing that shows us to be different and better is a very mistaken one. I said this in *Beast and Man*⁵ and I have continued to say it ever since. We don't need it you know, our dignity is sufficient, being what we are – we don't have to be *not something else*. The use that's been made in human morality of just that mistake has been enormous hasn't it? You are told not to behave like a rat or a snake or a tiger or whatever it might be. And of course we consider predators like tigers and wolves to be wicked because they steal our sheep – sheep that we were going to kill and eat ourselves!

So we really ought to try to be a bit more disinterested than we usually are. What we want to be doing is using the faculties that we do have, isn't it, using them rightly and fully, rather than living on a rather arbitrary selection of values that happen to be useful.

The point is, given any state of affairs, some 'Just-So Stories' could be thought up to explain what might have been the evolutionary benefit of that outcome, but that is not an explanation. It doesn't explain.

The best example, I think, is music. Suppose scientists from Alpha Centauri come here and find all this music going on. They can't see the point of it. So they think, 'It seems to be bond-forming and is valued because people ought to be cheerful. No doubt there has been a tendency to develop it for that reason'.

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3. Charles Darwin, (1896).

4. Charles Darwin, *The Formation of Vegetable Mould, through the Action of Worms*, (John Murray, 1881).

5. Mary Midgley, (Routledge, 1978).

Then they look at other human customs, such as football and flower arranging, and the same is true. The function is exactly the same. These things are indistinguishable to them; any of them appear to be able to substitute for any other. That's not an explanation though. What you have to explain if you want to know *why* people are doing something, is what it's doing for them, what the work is, how it differs from other things they might do. Those are the questions which you ask if you wonder why something is being done.

The only point I think where evolutionary history might really be relevant is if you have something really bad like war, and you wonder how it can be that people go on doing something which is obviously destructive and contrary to all ideals. There I am prepared to be interested in the investigations that show that chimpanzees do it – I'm told that chimps do fight in an organised way, you know, they deliberately go and raid, being terribly quiet and careful and so on - I think that is quite interesting. If it had not been for that I don't think that any human activity would have needed a special evolutionary explanation because people, as a result of having all these extra brains and technology and so on, can do things on a much larger scale than most animals can, and quite a lot of animals fight, so it wouldn't totally stagger me if I found that the tendency to fight on a small scale manifested in us on a big scale. But this kind of organisation and deliberateness probably does mean that there is something inherited in it.

To what extent would you say that humans are in some senses post-evolutionary in that unlike other species we act on our environment more than our environment acts on us? We are inclined to protect the weak and the vulnerable, so in effect we have turned off that engine of evolution in which the weak do not survive and reproduce, so only 'positive traits' are passed on.

Once human life gets at all efficient, it puts a stop to the degree of selection that goes on in other species.

It is what has bothered a lot of people who talk about the genetic load, isn't it, and a lot of good scientists are very bothered about it. Once human life gets at all efficient, it puts a stop to the degree of selection that goes on in other species. As soon as there's civilisation, a lot of people are protected who would not survive in the forest. I don't know how far you can take this into the nature of towns, in that some rather successful people in towns are being protected where they wouldn't otherwise. A lot of

people, like Marie Stopes, early in the last century were making a great to-do about this, but once you get contraception going and get good at prenatal diagnosis and so forth, you can do quite a lot about the genetic load. Whether you *should* is quite another thing.

It's an important question raised for people - should they be protecting the weak and vulnerable? And what are the limits to doing this? People are now thinking about euthanasia, that it is not necessarily a good thing to preserve everybody in every state of life. Morality can shift somewhat here. But the general use of contraception and a bit more awareness of the problem should make it possible to deal with it to some extent.

The tendency of humans once they've got some sort of medicine and so on, is to expand well beyond any niche that they can manage. So this is a problem of world management; a very grave one. I quite expect that there will shortly be some kind of disaster, but in order to understand that one has got to understand how evolution works. I mean there is no way round it as far as I know, other than taking necessary measures for contraception.

Another question is the emergence of co-operation – not within evolution but within our awareness of evolution. It seems to me that up to the middle of the last century the story of evolution centred on the idea of competition, and perhaps because of where that got us, not least genocide, we became more alert to co-operation. Do you want to talk a bit about that – how co-operation has shaped our interpretation?

Nature has to be green before it's red.

Brian Goodwin⁶ puts this very well I think and a lot of biologists, Simon Conway Morris⁷, for example, are drawing attention to it, and so they should. I think it's entirely understandable that Darwin had noticed how competition had worked, and failed to notice co-operation. He did notice the destructiveness of competition, and got terribly agitated about that, and said 'It is not the only source of new developments'. This was probably partly because he believed in inheritance of acquired characteristics, but also I think because he could see that competition wasn't adequate. As Charles Lyell⁸ said, it's as if you had only the last member of the Hindu Trinity – you haven't got the creator, you haven't got the preserver, you've only got the destroyer. That's a very shrewd and sensible remark.

And as Brian Goodwin points out, the cooperative relationship between the bugs in our guts and ourselves is much more pervasive in nature than the competitive one – it has to be.

The myth of evolution as totally destructive, totally competitive, was very strong.

6. Brian Goodwin, Canadian mathematician and biologist, 1931-.

7. Simon Conway Morris FRS, palaeontologist, 1951-.

8. Sir Charles Lyell, 1st Baronet, KT, FRS, geologist, 1797 –1875.

You've used the line "nature has to be green before it's red."

That's right. I'm not sure how long this has been being said, the first person I really picked it up in was Goodwin I think, but it's been being said since at least the 1970s, and quite possibly before. It's a very necessary element and it makes a great difference to how frightening you think the idea of being formed by evolution is – doesn't it? The myth of evolution as totally destructive, totally competitive, was very strong.

***The anthropic principle
is fine as long as
the giraffic principle is
also recognised.***

The quite crazy view that Jacques Monod⁹ put forward that evolution is constantly a lottery, that it's sheer chance in what way we will go at any time, depends on the thought that there are an infinite number of paths which are equiprobable, doesn't it? This idea of the casino. Now casinos are extraordinarily artificial things. In order to get things equiprobable in the gambling machines and tables,

great lengths have to be gone to, and there are always complaints that it hasn't worked. It's not possible that nature could be like that or in any way like it. Monod seems to me to be the Dawkins of thirty years ago, but without such a good agent! He got through to the scientists, but not so much to the general public. And of course, although he counts as a biologist – he was a micro-biologist – he didn't actually know how organisms act and interact.

The lottery idea was a symbolic story of which I suppose essentially the point was to make it look as though there wasn't a divine purpose for putting things together, but it gets rid of purpose so thoroughly that it isn't applicable to the organic world at all. One thing organisms do is they make efforts – they try, they go in particular directions. Simon Conway Morris has been doing sterling work in correcting the excesses of the competitive story and the sense of fatalism that goes with it.

There is also the idea, isn't there, that humans are in some senses inevitable, that evolution is bound to produce something pretty much like us. I don't mind that so long as people are seeing that giraffes are inevitable too and all animals are inevitable. The anthropic principle is fine as long as the giraffic principle is also recognised.

It does not follow from Simon Conway Morris' reasoning that we are the point of it all and that we are the apex of the pyramid. That's the story that I object to, and that Darwin objected to. What do we know about what goes on inside a giraffe's mind? It is that ambition that is bothering I think. I can't think of any way in which people could say that the point is to produce us.

9. Jacques Monod, French biologist, 1910 – 1976.

Barrow and Tipler, [in *The Anthropic Cosmological Principle*¹⁰], say that the point is the development of intelligence, and the point of intelligence is to store information and you end up storing an awful lot of information. But invariably information when stored still has to be used. This is supposed to exalt the intellect, particularly the scientific intellect, but it doesn't work. One rather dotty thing about Monod's vision is that in this casino world of total chance science is still terribly important – this is the one value that survives. Steven Weinberg¹¹ says that notorious thing about the more everything becomes intelligible the more it becomes pointless. But he still thinks that it's a good thing that everybody is doing astrophysics. Well how can anything be a good thing if it's pointless?

10. John D Barrow and Frank J Tipler, (Oxford University Press, 1985).

11. Steven Weinberg, American physicist and Nobel laureate in physics, 1933-

Christianity and Darwin

There are some voices today, from both ends of the spectrum, which argue, often quite badly, that Darwinism and Christianity are somehow incompatible.

Yes, I have been thinking a bit about this business of how compatible Christianity is with belief in evolution. It has long seemed to me that Charles Kingsley¹ was right in that as far as the creation goes there is really no difficulty. Everybody understands that the first part

Everybody understands that the first part of Genesis is a spiritual explanation of our dependence and the gloriousness of the world.

of Genesis is a spiritual explanation of our dependence and the gloriousness of the world. There is no problem about the process by which this happened. Indeed, as Kingsley said, it works better if you see God as behind the laws of nature than as interrupting them. Of course, there is more of a problem about miracles, because if you accept the literal testimony of the gospels about the incarnation and particularly the Virgin Birth, then it's difficult to rule out other miracles which break the laws of physics.

I was brought up with a rather different view – I can remember my headmistress preaching about the Virgin Birth and saying “There is no need for any such notion, probably it was a perfectly normal process.” My father, who was a parson, I think took the same view. The resurrection is something you can't get round, and that's where the clash is, it seems to me. To be a Christian you really do have to accept the incarnation and the resurrection.

And you see 'faith' is another word that is often misused today. We are quite familiar with saying that people believe in or have faith in democracy, or some such ideals system and we know very well what that means. 'Belief in' doesn't have to be factual. I think Christian faith is something more like that isn't it? – not so much a factual belief or the acceptance of certain propositions, like 'God exists', but the sense of having one's place in a greater whole.

1. Charles Kingsley, professor, historian and novelist, 1819-1875.

Our difficulty at present is that the various faith positions - the resurrection and so on - have begun to get the status of factual propositions – like ‘there aren’t any penguins in the Arctic’. The prestige of science means that people find it hard to be religious today unless they are supplied with something which looks like a scientific story. But of course even science doesn’t really consist of factual propositions of that kind. Much of it is understanding the meaning of the general terms that are used, and the kinds of evidence that are suitable, and the methodology of how to think about particular facts. But the model of particular empirical facts has somehow got terribly extended.

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As long as Christianity has been around people have believed a good deal of the Bible when it didn’t conflict with anything else. They took it that it was probably true. But to put confidence in it when it does conflict with lots of other evidence seems to me to be treating it like a superior kind of science; superior by the standards of science.

The attitude that people now have to progress or to market forces seems to me to be a faith of a radically similar kind to what people have in God and of course much more superstitious. The great advantage of traditional religions is that some of the bugs have been got out of them. Any sensible Christian can tell you why you shouldn’t have faith in market forces and horoscopes and so forth.

I still see some people speculating about why people are more credulous today, ‘believing in religion and horoscopes’. In fact they are not more credulous. Religion is a natural part of human life and we have tendencies that way which need to be brought together and given scope in some sort of institutional way. Any belief system that people have has standards of what is a good sort of belief and what isn’t.

The attitude that people now have to progress or to market forces seems to me to be a faith of a radically similar kind to what people have in God and of course much more superstitious.

I think that being a Christian is essentially about the things that Jesus said and what his life in general illustrates, and that one shouldn’t focus too much on any of the details like Virgin Birth and miracles. The details, the imagery, the formulae that you find useful vary from one person to another. And the stories that seem to make sense about these vast and mysterious things can change in the course of your life.

I think that Darwin felt this, that the important thing is the spirit in which you do this and how it plays out in your life, more than the details of the formula. The Buddha takes a similar line that it's how it causes you to live that matters; he wasn't too keen on dogmatising about metaphysics.

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*Another area which I think is particularly relevant to Darwin himself is the question of suffering. In my book *Darwin and God*², I suggest that, putting aside the nature of his Christian faith in the 1820s and early 1830s, it was the problem of suffering that caused him greatest difficulty, first theoretically and then practically in the death of Annie. The theoretical angle is very interesting because prior to Darwin you could identify the reason for suffering in a historically locatable and contingent Fall. What evolution by natural selection seemed to suggest to Darwin was that somehow or other suffering and waste was a necessity within nature.*

I think there are quite a lot of difficulties about the doctrine of the Fall, and this is one of them. We can see that the Fall might have made human life more complicated but why should the rabbits suffer for it? Come to that, why should the rest of us suffer for what Adam did? That has never made much sense, and I don't suppose it was important in the mind of the early Christians. Darwin was asking for a more universalist and less historical story wasn't he?

But I've been thinking about what you have to keep, if you are trying to be an intelligent Christian. The whole Fall and Redemption story is a historical story isn't it? Christ died and lived at a certain time, and the change he made is so crucial it does rather need to be balanced by a change, like the Fall, made at a particular time.

It's how it causes you to live that matters.

I wonder whether one of the messages of the Fall is that the story describes the human condition, but it does so in a way to suggest that there is another way of being, in other words that our fallenness, our brokenness, our bad choices are not inevitable but can be other...and that is what is redeemed in the cross.

Yes, this can be a very saving doctrine. It's just if you try to work it out in historical detail it gets implausible, but it seems to me no more implausible than creation. Darwin wasn't

2. Nick Spencer, (SPCK 2009).

spending all his time thinking about how to get Christianity a bit more plausible, he took it as it was and it's very understandable that he did.

In the particular context of a death there's not much that is consoling. My husband, Geoff, used to say that if the problem of suffering hasn't occurred to you when you take on your religion in the first place, then you don't know what to do with it later. Religions start from the problem of suffering. Buddhism certainly does. And many people only start to see the point of religion when something awful happens to them. It's the wrong way round, but it's very understandable.

With Huxley it was the same thing. His child died and he thought it was an absolute finisher – as if it was the first time that a Christian thought had been confronted with this.

Belief in Creationism or Intelligent Design seems to be a more modern phenomenon and it seems to be a growing one. Why do you think that is?

Well it comes from America doesn't it as so many things do. And it comes with the promise of greater hope and joy and so forth. Americans are very confident about this sort of thing. They are not embarrassed to believe something and say that they believe it, whereas a lot of Brits are. Belief of that positive kind is cheering isn't it – people want certainty.

Part of the diminution of the reverence in which science was held was because it didn't seem to be doing things quickly enough. The sort of discoveries it made didn't seem to actually help people's lives all that much. So I suppose the shifting of the wish for certainty from science to Creationist or Intelligent Design solutions is not that surprising. Christian congregations in this country have been more or less dropping for some time, haven't they, although Charismatic ones have been going up, and they tend to be Creationist.

My youngest son lives in London and has a friend who has lately converted to Creationism and he is very upset about it, and he is trying to help her. She's quite a bright woman and she's joined a congregation, and she obviously gets on very well with them. He went to church with her and they were so nice, he could see why she likes to be there, but he's trying to point out to her, that the more you get into this the more you are cutting

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If the problem of suffering hasn't occurred to you when you take on your religion in the first place, then you don't know what to do with it later. Religions start from the problem of suffering.

Surveys show that people who are asked why they have converted to Creationism say, 'It's the only alternative to Darwinism and scientific atheism'. And it isn't you see, that's what is so dreadful.

yourself off from a lot of other people, and from something very important in your culture. I sent him Ken Miller's book³ and good luck to them.

The sort of atheism and a-religion which has been growing in this country is rather un-nutritious emotionally because it isn't linked with a reverence for nature. Reverence for the natural world appears to me to be quite useful and important, but if it's linked with the thought that nature is this deadly competitive, savage, 'red in tooth and claw' stuff then it's actively depressing. Dawkinsism is really rather toxic in this way – people get excited about it and

feel 'there's something wonderful I'm being told here', but next time they have a decision to take, they find the limitations of it.

I do see that Intelligent Design could be, not scientifically satisfying, but less off-putting than Young Earth Creationism. It's Young Earth Creationism that this lady has discovered, you see. My son had a talk with the pastor and said 'What about x and what about y?' The pastor said there were papers that had been written contradicting the evolutionary evidence. The awful thing is, for some time chemists and physicists have been converting to creationism because they don't know any biology and they pontificate.

When asked why all this is happening, I say on the one hand there's Biblical literalism, which is pretty irrational, and on the other there is this pseudo-Darwinism, which is totally unacceptable and people are quite right to resist it, and when they are told these are the only choices - as they *are* told by both sides - it puts them in a very bad position. Surveys show that people who are asked why they have converted to Creationism say, 'It's the only alternative to Darwinism and scientific atheism'. And it isn't you see, that's what is so dreadful.

3. Kenneth R Miller, *Finding Darwin's God: A Scientist's Search for Common Ground Between God and Evolution* (HarperCollins, 2000).

appendix: books by Mary Midgley

Beast And Man:

The Roots of Human Nature (Routledge, 1978; revised edition 1995).

Heart and Mind:

The Varieties of Moral Experience (Routledge, 1981).

Animals And Why They Matter:

A Journey Around the Species Barrier (University of Georgia Press, 1983).

Wickedness:

A Philosophical Essay (Routledge, 1984).

Women's Choices:

Philosophical Problems Facing Feminism (with Judith Hughes) (Weidenfeld and Nicolson, 1983).

Evolution as a Religion:

Strange Hopes and Stranger Fears (Routledge, 1985, reprinted with new introduction 2002).

Can't We Make Moral Judgements? (Bristol Press, 1989).

Wisdom, Information and Wonder:

What Is Knowledge For? (Routledge, 1989).

Science As Salvation:

A Modern Myth and Its Meaning (Routledge, 1992).

The Ethical Primate:

Humans, Freedom and Morality (Routledge, 1994).

Utopias, Dolphins and Computers:

Problems of Philosophical Plumbing (Routledge, 1996).

Science And Poetry (Routledge, 2001).

Myths We Live By (Routledge, 2003).

The Owl of Minerva:

A Memoir (Routledge, 2005).

Earthy Realism:

The Meaning of Gaia (Imprint Academic, 2007) (Edited Volume).

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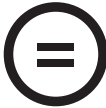
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