Without Gods: A Defence of Atheism

Associate Professor Christopher R Strakosch

Published by Emmetchester Pty Ltd Sherwood, Queensland, Australia 2013 ISBN 978-0-646-90541-9

Without Gods: A Defence of Atheism

"Faith means believing the incredible, or it's no virtue at all".

G K Chesterton, renowned Christian author

"The Bible is not my book, nor Christianity my profession."

Abraham Lincoln, 16th President of the United States

"Religion is an illusion and it derives its strength from the fact that it falls in with our instinctual desires."

Sigmund Freud, Psychiatrist

"There has never been a time without unicorns. We live forever!"

Peter S Beagle "The Last Unicorn"

Introduction

The little girl looked up at me with sad brown eyes. The scene made such an impression on me that, though years ago in 1970 when I was a medical student at Royal Children's Hospital, Sydney, I can still see her bandage covered body, the ward bed and even the colour of the walls. Above her a large sign read "If this child asks, tell her that her parents are in the hospital for adults". In fact both parents had been killed in an horrific motor vehicle accident and she was the sole survivor, but the doctors knew that if the little girl were to become aware of this she would lose hope and die. What mattered to her at this desperate time was not whether her parents were alive or not but that she believed they were.

So it is with many people. Without the comfort of a Heavenly Father to watch over them, and eternal life to look forward to, they can see little point in living at all. Can this brief life be all that there is? A fleeting spark in the vast chasm of the black. And without the promise of eternal joy and the threat of eternal damnation what would there be to prevent people just devoting themselves to a selfish pursuit of pleasure to the exclusion of all else and the ruin of civilisation itself?

In the end, however, the little girl would have had to have been told the awful truth; that though she would have loving relatives, in the end she would be alone and have to make her own way in life. Debates about whether there is a reason for living if there is no God and whether society would collapse into a "dog eat dog" anarchy without a higher authority are, in my opinion, beside the point. All that matters is whether there is a Supreme Being who watches over us, has a purpose for all of us, and whom we may join in death, or there is not. If we are really alone without any Supremely directed ultimate purpose, and there is no afterlife, then so be it.

Christopher R Strakosch MD, FRACP Associate Professor and Head of the Discipline of Medicine Department of Medicine, Greenslopes Campus University of Queensland 2013

The Reason for this Monograph

If religion were a personal matter and that one's religious belief were only between the believer and their god, then there would be no need to write a monograph such as this. The problem, however, is that many religious persons feel that their God has instructed them to enforce his laws on all society and the rest of us must follow or face retribution. Sunday still has special laws even in our secular Western society. In the US especially, there are laws requiring the religious concept of special creation be taught and in the United Kingdom recently, the London suburb of Tower Hamlets was declared by some of its inhabitants to be an area where the Islamic Sharia law was to be enforced on everyone. At the time of writing people were fighting and dying in the name of one religion or another in at least half a dozen places in the world.

The freedoms we value so much and which have been a feature of Western society since the Enlightenment are under serious threat. This loss would be particularly tragic if it were incurred in the name of an atavistic god who may have been conjured up to fill a need in the past but who now is now really surplus to requirements. The aim of this monograph is to look into the almost universal phenomenon of a religious belief and more specifically to examine what is actually known about the history and present state of the monotheistic religions which hold such sway in our part of the world. The religious position of persons known as "Deists" is not discussed. Deists hold the belief that there was a perfect founding god who set the universe in motion with such precision that no further intervention has ever been required. This version of a god, who has not been in evidence since the "Big Bang", is little different from atheism and posits a god whose existence can never be proven but is of no consequence one way or the other. This deist god certainly doesn't demand adherence to any laws nor offer any hope of an afterlife.

What do we mean by "God"

In our part of the world the question "Do you believe in God?" refers to the single God who was first revealed to the ancient Hebrews and then further to the Christians and Muslims. In other parts of the world or in other times it could have referred to Ra, Isis, Thor, Zeus, Shiva or the countless Gods of smaller tribes past and present. In the present, though there are said to be more than 700 established religions in the world, only about 20 may be referred to as major world religions. The adherents of each religion tend to regard themselves as holders of the whole truth and members of other religions either to have only part of the truth or be totally deluded. This conviction seems to be especially strong in the Middle Eastern Monotheistic religions of Judaism, Christianity and Islam. Here, despite proclaiming belief in the same God, each religion

regards itself as the one true religion and to tolerate members of earlier versions of the religion as being part holders of truth, but to utterly refuse to accept members of later versions. Christians will name their sons Abraham but Jews don't use Christopher. Muslims may use Isa (Jesus) but move against later versions of Islam such as Druze, Baha'i or Alawis. The older polytheistic religions, such as Hinduism, don't seem to be as exclusivist since they tend to see all religions as being versions of the same thing and it causes little concern to add another god to the pantheon.

It would seem therefore an easy matter to demonstrate the fallibility of all religions by simply using the arguments that each major religions makes against the other nineteen. It is however not as simple as that. Religious belief is deeply ingrained and it is held to be a special virtue to have faith that something is true even without any evidence for it and to be an especially great virtue to continue that belief even if evidence demonstrates the belief to be false. An example would be the persistence in the belief that the universe is only 6000 years old, as is held by fundamentalists of the Middle Eastern Monotheistic religions, despite overwhelming evidence that it is billions of years older than that. As the famous author and Catholic theologian G K Chesterton pointed out "Faith means believing the incredible or it's no virtue at all".

In the end, however, all religions perceive the reality of a god or gods who have extraordinary powers and who need to be appeased either by sacrifice or constant prayer and who, in most cases, threaten devastation in this life or the next if the laws they have ordained are ignored or the very existence of the god is questioned. It does therefore seem to be worth looking further into the origins of this uniquely human attribute which has such a hold on us and which colours the worldview of what seems to be the majority of our species.

The Evolution of God

Virtually every tribe discovered in recent history, or which has left evidence of its existence in the past, seemed to have belief in powerful invisible forces directed by human-like beings. These spirits and gods (and demons) reflect the political views of the persons holding the beliefs. When the human race consisted of small hunter-gatherer groups who had only vague ideas of the world beyond their immediate areas, the supernatural forces tended to be concerned only with the local areas. There might be a god who inhabited or controlled a nearby river and who could cause a flood or the river to dry up if not appeased by some means or other. Other spirits could control the wind or rain and be the driving force for the sun to come up every day.

As human society coalesced into larger groups and developed political leaders or chiefs, then the concept of the supernatural also underwent a change. The god or gods who needed to be appeased now controlled the whole of the valley or group of valleys. Similarly as human society became larger still and more complex and saw the development of city states, gods became yet more powerful and could be enlisted in wars against enemy gods. States then grouped together either peacefully or by conquest and the concept of an empire with a single person in command of the whole of the known area developed. Gods then needed to be even greater than the resident emperor. Finally the concept of a single God who controlled the whole world, such as was known at the time, came into being. This may have seemed reasonable at the time, but within living memory we have seen the known universe expand until it includes 10 thousand billion billion stars. More stars can be seen than there are grains of sand in all the beaches of all the world. Though they are separated by billions of light years, the single God is thought by believers to control all these stars and attending planets in real time. Defenders of the faith tend to counter this problem by positing that the single God is outside the concept of time. Their God, however, does seem in his interactions with humans to operate on our timescale. The Monotheistic religions all date their origin to Abraham who lived only 4000 years ago and these religions all look forward to the coming of a messiah figure and the end of the world in the foreseeable future. In other words, we are dealing with a few thousand years in the life of a universe which is thought to be 13.8 billion years old. With the recent idea that there might be an infinite number of universes existing, this single God will need to be thought of as being in control of all of them while at the same time being interested in the minutiae of the actions of each of the seven billion people on this planet.

Religious Belief can be Understood in Science

With religious belief being almost universal in human society, extending across all cultures and back to the dawn of human understanding, it clearly has been strongly selected for in the evolution of the human species. There is nothing special about the belief itself and it can be studied in science as can any other human phenomenon.

All the Monotheistic religions which hold such sway in Australia are of the belief that God intervenes in human affairs.

Exodus 3:8 "And I am come down to deliver them out of the hand of the Egyptians, and to bring them up out of that land unto a good land and a large, unto a land flowing with milk and honey; unto the place of the Canaanites, and the Hittites, and the Amorites, and the Perizzites, and the Hivites, and the Jebusites".

James 5:16 "Therefore, confess your sins to one another and pray for one another, that you may be healed. The prayer of a righteous person has great power as it is working."

Quran 42:20 "Whosoever desires (through his deeds) the reward of the Hereafter, We give him increase in his reward, and whosoever desires the reward of this world (through his deeds), We give him thereof (what is written for him), and he has no portion in the Hereafter."

A god who intervenes in the world should leave evidence of the interventions that would be observable. An intervening god is thus a testable hypothesis in science. One such area in which prayer is used very frequently, and is thought to be of great benefit, is for the assistance of the sick. Several experiments have indeed been carried out to test the power of prayer on the health of hospital patients. The Cochrane database (an organisation that provides systematic reviews and analyses of medical research), however, found no basis for the efficacy of prayer in a review of ten studies. In my field, there are hospital chaplains and, despite the lack of evidence of the benefit of prayer, it doesn't seem to have prevented them from continuing to advocate it. The medical practitioners at the hospital, on the other hand, rely on "evidence based medicine". Treatments that have no basis in science are not used.

I should mention at this point that some years ago, when I was seriously ill, my dear old mother organised a prayer circle for me. I recovered, due to the medical attention I received, but she, no doubt, harboured the belief that her efforts had been rewarded. I was, in fact brought up in a devout household. My late mother was a committed member of the Anglican Church of the "sleeves rolled up" variety and I very much liked the Anglican minister, a World War II veteran padre. He was a kindly man who never said anything derogatory about other religions (which when I was a kid meant the Catholic Church). I remember in a Bible class he handed around a copy of a Hebrew Bible and asked us to be very careful with it since it had been given to him during the Desert Campaign by a Jewish soldier who was later killed in action. I remember being very impressed at the time though I was only about 12 years old. I also liked the Christian story, one of sacrifice and redemption: a theme that runs through many classical tales. The doctrine of the Trinity, which seems to exercise a lot of people, seemed to me to be relatively easy to explain compared with the profound difficulties in accepting other teachings of the faith. My father was a Jewish refugee, who, though not believing in a personal god, did feel "zere is somezing zere". I found the study of religion very interesting and received Bible prizes in my Sunday School, but just never believed the Bible stories to be based on fact. I didn't know anyone else of this opinion as a child, and kept my lack of belief to myself. I still attended church services with my mother as a matter of family loyalty and didn't really "come out" as an atheist until I read "The God Delusion" by Richard Dawkins which really resonated with me. He also had been

brought up in the Anglican Church and still harboured warm feelings towards it, but just felt the basis of the belief to be without any foundation at all.

The Benefits of Belief

The belief that others have knowledge beyond understanding is very common in children. If an object is placed in a wooden box which is then closed, children until the age of about five will believe that their mothers would know what was in the box. If they are familiar with the concept of God they will believe that God also would know what was in the box. After the age of five children realise that their mother would in fact not know what is in the box but religious believers will continue to be of the opinion that their God, who has all knowledge, would, like the childhood mother, also be aware of the contents of the box.

The aetiology of this belief that there is an entity which has all knowledge and all power is rooted deep in the origins of the human race. It is safer and therefore confers survival advantage to see causes in phenomena when there are none, than to not see causes when they do exist. If a person striding through the African Savannah were to hear a rustle in the grass behind him, it is much safer to imagine that it is due to a lion sneaking up on him and to turn and present his spear when it is only the wind, than it is to imagine that it is only the wind and be taken down from behind by a lion. We are therefore constantly trying to explain and make sense of phenomena in nature which, before the beginning of our scientific understanding, could only be explained by some intelligent and invisible agent. How to explain a prolonged drought in which a life-giving river dries up and the game all die and the weaker members of the tribe starve? Then there is a flood which drowns many of the survivors. Something which has both the intelligence and understanding of what needs to be done and the power to enforce the drought and flood, in this example, must be responsible. The only intelligent and forceful agents we know of are other humans who can often be very irritable, vengeful and to need to be placated. It was therefore logical to imagine that whatever was behind the drought or the flood also needed to be placated by gifts or sacrifice, or by constant entreaties for mercy. In the end the drought was broken and the flood dried up, thereby reinforcing the success of whatever had been offered to the power behind these phenomena.

In the science of psychology, this tendency for humans to ascribe causes where there are none is known as the "teleological fallacy". As humans we are constantly seeking to know why things happen: it is part of a survival trait. "What made that branch move?" "Is that a shadow or an enemy creeping up in the dark?" As a continuation of this need to know the cause of what seem to be inexplicable events, a parent may ask a doctor why

their child died of leukaemia. The doctor may give a medical explanation, but the parent does not really want to know about genetic mutations and unsuppressed oncogenes, but how their child's death fitted into the big picture and what was the ultimate reason for it. This question logically leads to a belief that everything in the world that does happen has a reason and that therefore there must be some supreme power that has both the intelligence to make plans and the power to put them into effect. As is stated in the Qur'an 6:59

"With Him are the treasures of the Unseen; no one knows them except Him. He knows whatever there is in land and sea. No leaf falls without His knowing it, nor is there a grain in the darkness of the earth, nor anything fresh or withered but it is in a manifest Book."

Another example may be a little girl who asks her father "why does it rain?" The father may well go into the meteorological causes of rain with explanations involving the partial pressure of water vapour et cetera, but he is more likely to answer simply "it rains so the grass will grow". This is a classical example of a teleological error, but it would, no doubt, satisfy the little girl and very likely the father as well. One can imagine the little girl then looking to the sky and saying "please, please don't rain on my birthday party". An example of both a teleological error and the follow-on idea that there is a power which can be influenced to bring about a desired result and prevent an unwanted one.

Quite apart from offering explanations for otherwise difficult to explain phenomena in the natural world and the reassurance of a heavenly protector, not to mention promise of an everlasting life of joy in the hereafter, religious belief has many benefits in the world of the here and now. Even atheists, such as the eminent philosopher and writer Alain de Botton, note with admiration the positive side of religion with the fellowship and rituals which give meaning to life quite apart from the strictly theological aspects of belief. He wonders in his influential book "*Religion for Atheists: A Non-Believer's Guide to the Uses of Religion*" as to how atheists can borrow some of these facets of belief to enrich the life of non-believers. This monograph, however, is not about the benefits or otherwise of belief in this life, but only endeavours to further understand the causes of, and look at the underlying reality of, the human phenomenon of religious belief.

The Universal Fear of Death

If acid is introduced into a Petri dish containing bacteria, the bugs will move away from the chemical threat. Cockroaches flee if a light is turned on in the kitchen. The fear of death is buried deep in our genes but we are probably the only species that understands that we all will die. In the past, at least, life was very tenuous. I, myself would have died about five times without medical treatment; an appendix abscess causing gut obstruction in 1977, a spontaneous subdural haematoma in 1986, urosepsis and finally complete urinary obstruction in 2009 and 2012. Death came easily and frequently, especially to children up until recent times. Neonatal mortality was so common that the Hebrew Bible doesn't even count children until they are over one month old. The Chinese traditionally didn't name children until they were about 12 years old because of the likelihood that they wouldn't ever get there. Until then they were known as "Number One Son" etc. The immortal Captain Cook fathered six children but none lived to adulthood. How comforting to think that the child had not really died and ceased to exist, but had ascended to heaven and lived with God the Father and was able to "look down" and see what was going on in the world and so in a way continue to be part of the family.

It wasn't only the comfort offered by the belief that children had not really died that strongly reinforced the belief in life after death. Life was also "nasty, brutish and short" for adults who had made it through the perils of childhood. The fear of death, which could, and can still, come at any time, is to some extent assuaged by a belief that the person will not really die at all but will "go to their reward". Religious ministers, priests and no doubt mullahs, comfort bereaved family members by telling of the wonders of paradise. On the other hand, believers who survive, say, a natural calamity, don't seem to be downcast by the postponement of paradise but tend to "Thank God" that their lives had been spared. Speaking of which, I have been a medical practitioner now for more than 40 years and in that time have seen many persons approach death. I think that doctors should be aware of a person's beliefs as part of their duty of care and as such I enquire as to whether persons have a religious belief or not. In the last three years that I have been keeping records, I have seen 92 persons with a serious, incurable, illnessusually a terminal cancer. So far some 42 persons have expressed a religious conviction in life after death, 16 have been uncertain while 34 did not have such a belief even in the face of death. Religious belief does not seem to be as widespread as the surveys would indicate and this observer, at least, can detect no difference in the demeanor of believers compared with nonbelievers. I hope when the time comes, I can accept oncoming death with the calmness and dignity that most of my patients, believers and nonbelievers alike, exhibit. I continue to take pride in, and draw strength from, the courage of fellow members of our (human) race.

Prescriptive Religious Belief Confers Security in Uncertain Times

The twenty first century is an uncertain time. The old securities of close knit families, a job in the same company for life in a cohesive social milieu are no longer with us. In the age of globalisation, families are spread over the globe, jobs are more fluid and temporary and the old Australia where everyone known was of the same culture, and proud of it, has passed. We now have a multicultural Australia and even the mainstream Christian churches have become less dogmatic and more tolerant. Globalisation has meant as well, that external forces beyond the control or understanding of people have enormous consequences in day to day life. Technology is advancing faster than many people can cope with. As pointed out by Bauman, society is now "liquid" rather than "solid" and many people feel they are drowning in it. Since early childhood, we have always been ready to exchange freedom for security; no doubt the reason governments were instituted with the power to make laws in the first place. The Royal Navy was known for its harsh discipline which was accepted by the crew since they knew that if they did not immediately obey the captain's orders in, say, setting the sails in a storm, the ship could sink, which in the days before radio and air-sea rescue, meant the "loss of all hands".

The uncertainty of today's society, which is very unsettling for some people, has resulted in an upsurge in the popularity of religions which offer certainty in this life, not to mention everlasting joy in the next. Persons quite cheerfully say they have "given their life to Jesus" or have become a "slave of God" and accept often quite harsh restrictions on day to day activities. What to eat or drink and when to eat or drink it, what clothes to wear, who is acceptable as a friend or marriage partner, are all mandated. Often the more onerous the duty, the more virtue there is in performing it. Orthodox Jews may regard it as a matter of profound consequence as to whether it is permissible to flick a light switch on the Sabbath. Anyone can follow an injunction against stealing, but only a truly devout person will follow a rule for which there is no obvious reason, so the theory goes.

The regimented prescriptive life, which many find comforting, is reinforced by the fellowship of other persons also following the true path. This togetherness is fostered by the promulgation of an idea that one is suffering for the faith and being persecuted by the wayward, undisciplined, sexually promiscuous members of mainstream society. Fundamentalist Christians may "join Christ on the Cross" as they suffer attacks from the "liberal" mainstream media and many Muslims regard it as given that the wider society is united against them.

Life after Death as a Consequence of Forward Planning

With our high intelligence came the ability to plan ahead and to imagine various actions and consequences. Let us look at a hunting party ten thousand years ago that was planning to take down a mammoth. The leader may speak of a plan in which his fellow hunters use burning tree branches to stampede a group of mammoths so that one or more fall over a cliff and is then able to be harvested. One of the group may raise the objection that the mammoths may panic according to plan but turn and run over the top of the hunters despite their burning branches. The group imagines several hunters squashed flat. Change of plan. The leader decides on a new tactic and like a Roadrunner cartoon, the previously flattened hunters now return to life and proceed on another virtual hunt. So with the ability to plan ahead comes the ability to imagine, not only our own death, but also to perceive a continuation of life after it.

By the way, it is my opinion that our high intelligence evolved to overcome an even greater tactical problem than that incurred hunting mammoths. We were up against the only enemy really worthy of us: other human beings. They also had the ability to plan ahead and devise successful tactics for use against our tribe. An arms race did not start with the competition between the Royal Navy and the German High Seas Fleet in the early 20th century over the number of dreadnoughts each side possessed. An arms race has been in progress since the very beginning of Homo sapiens in Africa several hundred thousand years ago. The successful tribal group with the greatest intelligence and therefore the greatest ability to outwit opponents had the reward of being able to breed with the defeated tribe's females and to propagate their successful genes down through the millennia. Thus are we simultaneously both our greatest friends and our greatest enemies. It is the endless struggle with other human groups that has conferred on us the ability to ponder the reason for our belief in gods and to sit down on a Sunday afternoon in front of a computer and speak to Dragon Dictate.

Watched People are Good People

The small group of Palaeolithic hunter gatherers probably only consisted of a dozen or so adults with their children. The group may have perceived the need to placate whatever power was responsible for the otherwise inexplicable forces of nature which seemed to decide where the game was plentiful or not and what the weather with its terrifying thunder and lightning might have in store. There was, however, no need for a personal God to maintain discipline in the group. It would be obvious who had stolen someone's stone axe or who had assaulted another member of the group. The spirits and gods of earlier peoples were mainly thought to control fertility and forces of nature and were not thought to be particularly caring of individual humans or to demand any

particular ways of living. They did, though, seem to need to be constantly placated with gifts or sacrifices.

The introduction of agriculture meant that land became much more productive and was able to support a much greater density of population. Even in a fertile land with plentiful game, rivers teeming with fish and bountiful fruit trees and berry bushes, a hunter gatherer group still needed about two km² per person to survive. These small groups were constantly on the move and established only temporary camps in which everybody knew everyone else. With agriculture however, villages could be established where the inhabitants were not so intimately connected and the perpetrators of theft or assault could not be immediately identified. In order to maintain discipline and social cohesion the concept of a God who saw everything and was even able to read minds and know "what was in people's hearts" was now necessary. Being watched in itself is enough to give persons an incentive to "do the right thing". Psychologists are constantly dreaming up tests to further our understanding of human behaviour. Long-suffering first-year psychology students are usually the subjects of these tests. In one such, the student is able to play a game on a computer where they are able to win by cheating. If there is even a glass eye lying beside the computer, students are inhibited and tend to play more honestly. A cardboard cut-out of a policeman placed in a supermarket aisle decreases the incidence of shoplifting. Those of us who own dogs and take them for walks carry plastic bags to scoop up the droppings. This is not the most pleasant of tasks and it is tempting, if there are no other persons in the vicinity, to develop a sudden "dog dropping blindness".

A Benefit in Evolutionary Terms Does not make it Right Today

Young men regard themselves as being "ten feet tall and bulletproof". This conferred the ability in the past to fearlessly hunt dangerous game and to provide the tribe with highly valued protein rich meat. This made the successful hunter attractive to females who looked to mate with a male able to provide for them, both when they were heavily pregnant, and less able to fend for themselves, and for later when the woman had a baby at breast. The "bulletproof" gene was inevitably passed on through the millennia. The belief that one was invincible was even more valuable in the conflict with a much more dangerous adversary: other young males. The winner again had greater access to females and again the genes were passed on. Evolution conferred a great reward for this success in hunting or in battle. There is a famous film clip of Japanese pilots skipping in exhilaration on the decks of their aircraft carriers after the successful raid on Pearl Harbour. The famous American Jurist Oliver Wendell Holmes Jr, recalling his service as a junior line officer in the Union Army during the American Civil War, said "Through our great good fortune, in our youth our hearts were touched with fire".

Not all soldiers, of course, found military service rewarding. There were many examples of desertion to the rear in the Allied armies in World War II. On the other hand, many of the 12000 Australians who volunteered for active service in the Korean War were veterans of the Second AIF who missed the feeling of "living life to the top" that they had found in the earlier war.

As society had matured, and governments became stronger, the need for all males in society to be trained as warriors diminished. In American Indian society, the most likely way for a male to die was to be killed by another male; some 60% of males dying in this way. Even in Australian Aboriginal society, which was not noted to be especially warlike, a male still had an approximately 25% chance of dying a violent death. In the 20th century, on the other hand, despite all the great wars and massacres, a male in Europe had only a 2% chance of dying at the hands of another male.

Despite this great decrease in violence in society, in recent history an effort has been made to channel the residual male aggression into more peaceful activities. Though ball games have been depicted in ancient carvings, it is only recently that football played by national teams against other countries has become the modern analogy of war. Teams of young men confront each other and the warlike terms of "tactics", "victory" and "defeat" are used quite freely. The testosterone level of the males in the winning team increases and decreases in the defeated. (There are no hormonal changes in female teams). No doubt the increase in testosterone, in evolutionary terms, was in anticipation of access to the females of the defeated tribe. The teams of nubile young women cheerleaders play to this genetic expectation. Though a victory by a national team in football confers no real advantages, we still are left with a feeling of exultation at the success of our team even in people who would usually take no interest in football at all. The normally staid Dutch danced in the streets when their team defeated Germany in the semi-finals of the World Cup in 2010.

Religious belief also conferred great advantages in the past when our highly intelligent ancestors struggled to make sense of the mysterious and terrifying forces of nature. How comforting to know that there was a god who could control these capricious forces if only he could be seduced by the required prayers or sacrifices. Even in living memory, the Eskimos of Alaska would not camp below the treeline where, at night, they could hear the trees murmuring to each other in a foreign and unintelligible language. Much safer to retreat to the frozen tundra where their gods could look after them. This feeling of warm comfort remains in believers today, though few in Western Society regard trees as conferring in some mysterious and possibly conspiratorial language. This burning ember of belief can ignite into a blazing fire when believers come together. The Pentecostal churches promise "purpose, fulfilment and joy" to members and though, I suspect, few members would do it when alone, in the presence of other believers, attendees often attain an exultant frenzy and shout nonsensical phrases: an activity known as "speaking in tongues" and shown to great comic effect in the recent movie "Borat: Cultural Learnings of America for Make Benefit Glorious Nation of Kazakhstan".

Not all believers are prone to such overwrought expressions of belief, but still can experience such an intense feeling of connectedness with the divine that they may receive personal communication from their gods. The legendary Indian mathematician Srinivasa Ramanujan, when at Cambridge University in the early 20th century, was able to write out advanced mathematical formulae without offering any attendant proofs. These algebraic statements are still being explored with the help of supercomputers and seem to contain concepts that he "could not possibly have known". When challenged by the other mathematical geniuses at Cambridge as to how he derived these advanced formulae, Ramanujan replied that his household Hindu goddess dictated them to him and he simply wrote them down. Few believers in the Monotheistic religions, the main "persons of interest" of this monograph, would accept this to be true. Many believers do still fall back on a statement of personal experience to back up their beliefs, though as far as I can tell, regard the experiences of persons of other faiths as being delusional.

Along the same lines of rewards for activities which conferred advantage in the past, but no longer do so, is the other big challenge of excess ingestion of fatty food. Fat has no intrinsic "taste" but in a past where food was scarce and famine the big threat to our existence, eating the very energy dense and difficult to obtain fat was very beneficial to our survival. Evolution, very helpfully conferred a reward of a delicious creamy taste to fat and a postprandial feeling of warmth and satisfaction. Fat is now readily available but we still love eating it. Unfortunately, though we're in the twentieth century, our genetics are still in the stone age and what was once of benefit, be it "bulletproof" males defending the tribe, the delicious taste of fatty food or the exultation of shared religious belief is no longer so.

Though the tendency for religious belief to lead to wars says nothing about the truth of the religious belief, it does make the suffering in these wars especially bitter if it is incurred in the name of something without any foundation in reality. There does seem little doubt that religion is behind most of the wars being fought in the present time. Now that the colonial liberation wars and the conflicts involving the adversarial political ideologies of Communism versus the Liberal Democracies have died down, we are left with the majority of wars being fought in the Middle East, Northern and Central Africa and the Indian Subcontinent being based on differences of religious belief. The major players in these wars are the Middle Eastern Monotheistic religions: Judaism versus Islam in the Holy Land, Shia versus Sunni Islam in Syria, Christianity versus Islam in Northern Africa and Nigeria, Hinduism versus Islam in the Indian subcontinent and even

Buddhism versus Islam in Burma. Fortunately the Catholic versus Protestant war in Northern Ireland and the three way war between Catholicism, Orthodoxy and Islam in the Balkans seem to have been resolved, at least for the present. I'm not sure how to categorise the war in Afghanistan which seems to be both a religious and ideological conflict.

The Middle Eastern Monotheistic Religions according to Archaeology

The three Middle Eastern Monotheistic religions all date their origins to Abraham and include Moses, who led the Hebrews out of Egyptian captivity. The Jews have further prophets such as Isaiah which the Christians, though not the Muslims, accept. The Christians have, of course, the divine figure of Jesus Christ, which the Muslims accept as a prophet, though do not believe he was crucified, nor that he was divine. Finally the Muslims have the prophet Muhammad, said to be the last of the prophets of the Monotheistic religions. The faithful of the respective religions believe that the major figures of their versions of the religion were all historical persons and that the stories set out in the respective holy books all are accurate accounts of the events related. As such there should be copious archaeological evidence, especially of such major personages as Kings David and Solomon. Fortunately for persons interested in the field, there is now an immense and cross referenced archaeological data bank obtained from centuries of work in the Holy Land.

It is more honest to put aside any preconceptions about the very well-known Biblical and Qur'anic stories, which have played such a major role in the history of the West, and see from primary evidence what these archaeological findings are.

The Ugaritic Texts

Ugarit was a Bronze Age Canaanite port city, on the coast of what is now northern Syria. Though the area had been settled since Neolithic times and the city had been walled since 6000 BCE, it reached its height of importance from around 1450 BCE until 1200 BCE when it was destroyed by raiding "Sea Peoples". It was rediscovered in 1928 and over the next forty years vast libraries of cuneiform inscribed clay tablets were unearthed. Many of these are legal and political documents but there is also a collection of tablets dealing with religious themes. Since the city was at its height just prior to the major events recorded in the Hebrew Bible, these tablets are of great interest to Biblical scholars. There was, apparently, no received holy book in Ugarit, so over the centuries religious belief drifted, no doubt influenced by the doctrines of the other major powers of the time: the Egyptian and Hittite empires. There are many references to a father god known as EI, which Biblical scholars recognise as the name of the Hebrew God in the E Document. El, as was customary for gods at the time, had a wife and children. One of his sons was, according to one of the tablets, the warrior god known by the tetragrammaton of YHWH, usually given as Jehovah, the name of the Hebrew God in the J Document. These documents, incidentally, which are known by the initials given to them by the 19th century German Biblical scholars as the E, J (German version of Y), P, D and R documents, are thought to have originated as separate books which were combined by one or more early Hebrew scribes to form the Bible we have. Each of these documents can be dissected out and read as a complete narrative and is the reason that some thirty stories in the Hebrew Bible are given in two versions. For example, the usually related story of Noah has him collecting a pair of each animal for his ark, whereas the P Document refers to seven of each kind. The connecting passages between the books are thought to have been added by R, the redactor or editor.

Thousands of clay figurines of female fertility goddesses have been found in the Holy Land dating from the time of the Biblical Hebrews and it is said that, going on archaeology alone, the Hebrew religion at the time was a fertility cult. An early example of Hebrew graffiti asks for blessing from Jehovah and his Asherah- the name given to the fertility goddess and thought to be identical to the Ugaritic goddess Atharit, consort of El. The name also crops up in Hittite religious texts as Asertu, consort of Elkunirsa (El, the Creator of the Earth).

The Origin of Hebrew Monotheism

There is no archaeological or palaeographic evidence of Hebrew Monotheism, which is traditionally thought to have originated with Abraham who lived around 2000 BCE, until the time of the Hebrew kings Hezekiah (sometimes given as Ezekias) and his great grandson Josiah who lived in the seventh century BCE. The Hebrew Bible does state that Hezekiah abolished what was considered idolatry and "reinstituted" the tradition of monotheism. The evidence is, however, that he in fact founded the tradition, but it is always easier to institute reform if it is presented as going back to the ways of the fathers of the nation rather than as constituting something altogether new. Hezekiah needed all the help he could get- his kingdom was under threat from the Assyrians Sargon and his son Sennacherib. It is postulated that he instituted the idea of the great and powerful kings David and Solomon, servants of the one true God to bolster his position. If he were to "re- adopt" a similar position then the power and the social

cohesion traditionally attributed to their rule would be his as well. As pointed out by Professor Israel Finkelstein of the University of Tel Aviv, however, at the time of these Great Kings, their capital of Jerusalem was a small iron-age hill fort of perhaps 1000 people. There is no mention of them in any of the very extensive Assyrian, Egyptian or indeed Hebrew writings of the time. A small inscription uncovered at Tel Dan in Northern Israel, which has been dated to more than one hundred years after the time of the Kings, does mention the House of David, but there has never been anything found at all that refers to Solomon. If Kings David and Solomon existed at all, they would have been minor hill fort chieftains unworthy of mention by the other kings of the time.

Hezekiah's great grandson, Josiah, became king of Judah from 641 to 609 BCE. During renovations of the Jerusalem temple, his chief priest "discovered" a copy of the Book of the Torah as had been written by Moses some 1400 years before. Though this book was apparently written in Hebrew script which was not invented until 1000 years after the book was supposedly written, Josiah used this discovery to outlaw worship of any other gods but the Hebrew Jehovah and to destroy the altars and images of competing pagan deities. The "discovered" book of Moses was then used as the basis for the composition of the holy writings which would eventually become the Hebrew Bible. Various legends and misremembered folk stories were gathered and written down. The expulsion of the Semitic Hyksos from Egypt by Pharaoh Ahmose I in the 16th century BCE became the story of the Exodus of the Hebrew slaves from Egypt under Moses. The story of Noah and the flood reflects the earlier Sumerian 'Epic of Gilgamesh' of the 18th century BCE which introduced the ark, dove and olive branch familiar to readers of the Bible. As might be expected in a text which purported to be historical but which was written without any of the aids that modern historians rely on, there were many inaccuracies. The founding father, Abraham, was reported to have used camels though these were not to be domesticated for a further thousand years. Many of the towns mentioned, though existing at the time of writing, had yet to be established at the time they featured in the Biblical stories. The famous David versus Goliath story from the First Book of Samuel goes into great detail describing the armour worn by Goliath. The passage reflects the armour of a Greek hoplite of the sixth century BCE, whereas the historical Philistines of the time of the engagement- some four hundred years previously, wore little or no armour. Indeed, the whole story is very similar to the Greek legend of the young Nestor defeating Ereuthalion, the giant champion of an enemy host, and then going on to be a great king.

The Hebrew Bible continued to be extended and edited over the next four hundred years. The Jewish version, which was finalised by the Masoretic scholars in the first centuries of the Common Era, contains 24 books, whereas the Protestant "Old Testament" has 39, the Catholic version 46 and the Eastern Orthodox collection 51

books. The books which are missing from the Protestant version were labelled Apocryphal and thought, by Protestants at least, to be of doubtful authenticity.

The Coming of Christianity

The Kingdom of Judah soldiered on until conquered by Alexander the Great in the fourth century BCE. Judah became part of the Seleucid empire and was exposed to Greek learning; a combination which was to have a major influence on Western civilisation. Jews had a tradition of scholarship based on study of the religious texts which contained a major new concept, now taken for granted in the West, but which differed from previous religious narratives. The world, according to the Jewish Bible, had a definite beginning, was brought into being for a purpose and would have a definite end. Other narratives tended to see the world as going through endless cycles-a view that tended to avoid change. This combination of Jewish learning, which contained the view that society is evolving towards an end, and the secular study of the natural world of the Greeks resulted in a dynamic, forward looking society which has remained the basis of the ethos of the West.

Then came one of the problems which crops up again and again in history: that of a disputed royal succession. In the civil war resulting from a dispute over the Judean monarchy, one of the protagonists invited the nearby great power of Rome to intercede on their behalf with the result that Judah was added to the Roman Empire. Though the Jews maintained their monarch, he was seen as a puppet of Rome and not the Great King of the House of David which had been prophesied. Judah became a tinderbox with endless riots and assassinations which the Romans dealt with in their usual steely way.

One day, "on the Road to Damascus", a trip which would have taken several weeks in those days, a Jewish Temple official by name of Saul had a revelation from the Hebrew Jehovah. One of the Jewish insurgents who had been crucified by the Romans for armed rebellion was revealed as being, not just another in the long line of executed Jewish rebels, but as a divine manifestation sacrificed to redeem not just the Jews but the whole of humanity. The official took the name of Paul and spread the word of his revelation regarding the Jewish insurgent Joshua (Jesus in Greek) through the known Roman world. This new religion, a daughter religion of Judaism and which came to be known as Christianity, was extremely successful, offering as it did eternal salvation. Though, for some reason, this benefice was extended only to persons who believed Paul's revelation to be true.

Over the next three hundred years the stories which constitute the Christian Bible, referred to by believers as the "New Testament", was written. There were many books in

existence reflecting many versions and extensions on the theme of Jesus, his ministry, crucifixion and resurrection. The final canon (from the Greek; measuring rod or standard) was not closed until the time of Bishop Athanasius of Alexandria, when in 367 CE, he identified the twenty seven books which now constitute the Western Canon. The Eastern, Armenian and North African canons contain differing numbers of books. The famous fourth century Codex Sinaiticus in the British Museum, one of the oldest and most complete Christian Bibles in existence, includes the Shepherd of Hermas and the Epistle of Barnabas which are missing from the modern received canon. As with the Hebrew Bible, many of the stories were taken from previous religious accounts. Virgin birth was a common way for gods to come to Earth, thereby circumventing the need for an earthly father. The Christmas story of Luke seems to have been heavily influenced by the story of the Egyptian god Horus which had been circulating for many hundreds of years. Also, as with the Hebrew Bible, inaccuracies crept in. Jesus was said to come from Nazareth, which wasn't founded until well after his time and, for a census, the Romans required persons to return to their usual dwelling place, not their place of birth. In the Christian Bible this return to the birthplace was given as the reason the Holy Family journeyed to Bethlehem, which was, incidentally the birthplace of the legendary King David, and which thereby reinforced the prophesy that the awaited Messiah would be of the House of David. As well, the date of the known census of the time does not match that given in the Christian account. During the time of writing the Gospels, various adjustments and additions were made to bolster differing religious or political positions. The first Gospel to be written, Mark 6:3 says, when referring to Jesus, "is this not the carpenter, the son of Mary ... " implying the father was unknown, whereas the later Matthew 13:55 changes this to the much more acceptable "is this not the carpenter's son...". The Catholic Church derives much of its authority from Matthew 16:18-19

"And I say also unto thee, That thou art Peter, and upon this rock I will build my church; and the gates of hell shall not prevail against it.

And I will give unto thee the keys of the kingdom of heaven: and whatsoever thou shalt bind on earth shall be bound in heaven: and whatsoever thou shalt loose on earth shall be loosed in heaven."

This is an extraordinary statement from a theological point of view and is not repeated or supported in any other part of the New Testament. It appears to have been added to reinforce the authority of the Catholic bishops who claim to have inherited the "Keys of Saint Peter". Luke 22:44 depicts Jesus praying in terror before the crucifixion

["] And being in an agony he prayed more earnestly: and his sweat was as it were great drops of blood falling down to the ground."

Again, this appears nowhere else, and doesn't even appear in earlier extant versions of Luke. It seems to have been added to bolster the position of the Trinitarians, who

believed Jesus to be both God and Man, rather than being a purely divine manifestation and therefore presumably beyond human experience.

At the time of Jesus, the Roman Empire was at its height. Jesus was said to have had thousands of followers but though there were several historians working at the time, none mention Jesus. They did however, refer to the Sadducees, Pharisees and even John the Baptist. Such references as there are were written after the event when Christians were becoming a known phenomenon in the Roman Empire. On the other hand, most scholars do seem to accept that there was a person known as Jesus, who was crucified at the hands of the Roman governor Pilate. The Gospels added to this over time in much the same way that, though there was probably a great knight known as Arthur in fifth century Britain, the legend of Camelot with Merlin and magical swords was added later. If Jesus did exist, he was not the Biblical "Jesus of Nazareth", since this town was not in existence at the time and therefore much of the Gospel story cannot be true.

Though there were continuing disputes between various Christian factions, mainly over the nature of Christ, Christianity spread like wildfire through the Roman world. The new religion promoted human fellowship among believers and promised eternal salvation as theirs. The great Roman emperor Constantine apparently converted to Christianity later in life and encouraged its acceptance as the Roman State religion during his reign from 306 to 337 CE. He moved the capital to "New Rome" which became the centre of the Roman world with the fall of the original Rome to the Germanic tribes in the fifth century. The city was later to be renamed "Constantinople" in his honour.

The continuing disputes between the Christian factions over the nature of Christ were a major embarrassment to Emperor Constantine. On one side were the Orthodox Christians (at least they became Orthodox since they were on the winning side of the dispute) who proclaimed the Doctrine of the Trinity. The One God of the Jews was said to consist of three persons: God the Father, God the Son- the Divine Manifestation Jesus Christ, and the Holy Spirit which Jesus had left on Earth as a "comforter" when he ascended into heaven. Confronting this position were the followers of the Alexandrian priest Arius who were of the opinion that Jesus was just a human prophet in the tradition of Abraham and Moses. Constantine called the Christian bishops to a council at one of his imperial resorts at Nicaea to hammer this out. The result was the adoption of the Orthodox Trinity, on the basis that if Jesus were just a man, as the Arians advocated, then his sacrifice could not atone for the whole of the human race. Opponents were given the choice of converting to this position, going into exile or death. Many fled north into the territory of the German tribes or south into Arabia.

The Coming of Islam

By the seventh century the Roman Empire, now based in Constantinople, and the Persian Empire out of Ctesiphon had been at war, on and off, for over eight hundred years. Finally, a Persian Emperor, Chosroes II "The Undefeatable" (ruled 590 to 628 CE), gathered his forces and launched them against the Romans. His troops swept down into the Holy Land and captured Jerusalem where they ran wild with an immense slaughter of the inhabitants. The "True Cross" was carried off in triumph by the Zoroastrian Persian forces. The Roman Emperor Heraclius, then, taking advantage of the long supply lines of the Persians launched vigorous counterattacks and defeated the Persians in several major battles fought between 622 and 628 CE. The inhabitants of Jerusalem, in their turn, rose and threw the Persians out of their city. Both the Romans and Persians were exhausted by the titanic struggle which had gone on for twenty years and which had seen hundreds of thousands of deaths from the battles and ensuing famines. The Romans advanced to Jerusalem, restored the "True Cross", then withdrew their forces north to keep watch on the Persians.

Nothing is so unbecoming of an Empire, which owes its legitimacy to the security offered to client states, as to be unable to fulfil this duty of protection. Just as the European kingdoms of France, Germany and Britain had declared independence in the fifth century, with the decline of the Rome of the West, now the Christian Arab kings in the Holy Land declared independence of Byzantine Rome in the seventh. To underline this independence they started minting coins with their own likeness, holding prominent crosses, but now with inscriptions in Arabic. Previously, minting coin was the sole province of the Roman Emperor and the coins always bore his visage with the inscriptions in Greek.

The names of these kings is lost to history, but then came an Arab leader who is well known as founding the Arab Umayyad Dynasty. He took the name Mu'awiya (The Weeping One). Prominent persons tended to use pseudonyms in those times since a person's real name was needed to be known for the casting of malicious spells. He styled himself "Commander of the Faithful", founded a powerful navy and challenged the Byzantine Romans for dominance.

These are the historical facts, but there is now a major problem reconciling these with the traditional history related by later Muslim writers. Traditionally there had been an Arab leader who had been visited by Archangel Gabriel and who had received verbal revelations which were later written down and collected as a new Holy Book, the Qur'an (Recitation). It was revealed to this leader Muhammad (The Praised One in Arabic) that he was the latest and, in fact, the last prophet of the One God who had been chosen to return the Jews and Christians to a strict monotheism. According to this tradition it was

the followers of Muhammad who conquered Jerusalem. The coins of Arab kings bearing crosses are said to indicate the tolerance of these new rulers. Crosses are, however, anathema to Muslims since the Qur'an relates that Jesus was not crucified at all and the basis of Christianity- the Divine Sacrifice to redeem humanity- is false. The leader Mu'awiya is said in this tradition to have been one of the select "Companions of the Prophet"- the very tungsten core of Islam. Though he left many coins, inscriptions and documents to history, none, however, mention Muhammad, or for that matter, the new Holy Book, the Qur'an. In fact, a coin from about 650 CE depicts Mu'awiya carrying a cross tipped with a crescent- the latter being the heraldic device of the Persian Sassanid kings. When he visited Jerusalem, he prayed at Golgotha, the traditional site of the crucifixion of Jesus. Many of the documents and inscriptions in his name bear crosses. Again these actions are said by defenders of the traditional Islamic history to indicate the tolerance of the early Muslim leaders. Given that the whole basis for Islam is a return to the monotheism of the early Prophets which was said to have been corrupted, this explanation seems most unlikely. Indeed, in the final days, according to Muslim eschatology, Jesus will return to Earth, break all the crosses and turn all the churches into mosques.

In the first part of the eighth century, a Christian monk, John of Damascus, wrote a major work entitled "The Fountain of Wisdom". One section is devoted to refutation of Christian heresies, with chapters entitled "Against the Nestorians", "Against the Jacobites" and the "Heresy of the Ishmaelites". This last referred to the Muslim Arabs who were said to have descended from the Prophet Abraham through his son Ishmael by his slave girl Hagar. John includes Islam as an Arian heresy of Christianity. In other words Islam is treated as a version of the Arian doctrine which denied the divinity of Christ and which had been proscribed by the Council of Nicaea. To avoid forced conversion or death many Arians had fled into Arabia but had now proclaimed independence in the previously Roman province of Palestine. To add to this understanding, a coin has been found dating from 660 CE which has an image of Christ with the Arabic letters MHMD- Muhammad, (in those times Arabic was written without diacritic points indicating vowels). The use of the name or title Muhammad (The Praised One) on a coin bearing the image of Christ would indicate an Arian name for Jesus to distinguish this idea of Jesus from the Trinitarian one which would have been perhaps entitled "The Divine One".

The Dome of the Rock on Temple Mount in Jerusalem is said to be the most beautiful and most controversial building in history. Traditionally it was said to have been built by Caliph Malik in 691 CE, though has been damaged by earthquakes and repaired many times since. It was retiled by Suleiman the Magnificent in the seventeenth century and the walls are covered by inscriptions in modern Arabic with diacritic points (indicating vowels) which had not been introduced at the time of Malik. The Southern Panel states "The Praised One is the servant of God and His Messenger." The Eastern Panel "The Messiah, Jesus son of Mary was only a Messenger of God... So believe in God and His messengers and say not three". Though usually taken as being a statement in support of Islam and the Prophet Muhammad, it may simply be a Christian Arian statement against the Orthodox doctrine of the Trinity.

Initially it seems that the title "Muhammad" -the Praised One- may have been used to refer to any person of great significance and not just to the one person now known as the Prophet Muhammad. Followers of Islam are able to describe in great detail day to day events in the life of Muhammad, but everything that is thought to be known about the Prophet Muhammad comes from the pen of Ibn Ishaq, an Iraqi writer who was working about 130 years after the death of the Prophet. Even this work has been lost and is only known at all from quotes by a later author Ibn Hisham writing 60 years after that. The many details and conversations, which could not have been known to these authors, appear to have been written to add authenticity to the text.

Early Christian writers do refer to the followers of an Arab leader Muhammad. It seems that there is a common theme in the traditional stories of Judaism, Christianity and now Islam. Historical figures, the details of whose existence is lost to history, gather legendary accretions over time. The minor hill fort chieftains, David and Solomon become the fabulous Kings of the Bible. The Jewish insurgent Joshua becomes the Divine Sacrifice of Jesus Christ and the Arab military leader Muhammad becomes the "Seal of the Prophets".

The Islamic Holy Book, the Qur'an, was said to have been **revealed** to Muhammad in stages until his death in 632 CE and was thus different to the previous Holy Books of the Jews and Christians which were said to have been written by men who were only **inspired** by the One God. It is thus thought to be completely valid and, in fact, to be a copy of a book kept in heaven. There is however, no evidence of a Qur'an dating from before 750 CE, some one hundred and twenty years after the death of the Prophet Muhammad. Indeed, the authors of the Qur'an followed the tradition of the authors of the Hebrew Bible and Christian "New Testament" in that they included stories and legends from prior sources. The account of Mount Sinai being held over the heads of the Jews as a threat for abandoning the divine law (Sura 7:171) is taken from the Jewish apocryphal book "The Abodah Saran" and the story of the infant Jesus moulding birds from clay (Sura 3:49) is from the Christian apocryphal "Thomas' Gospel of the Infancy of Jesus Christ" (Chap 2:4). Christians are referred to in the Qur'an as "Nasara" - Nazarenes or followers of Jesus of Nazareth- but as demonstrated above, Nazareth had yet to be founded at the time of Jesus. The story of the Samaritans leading the Hebrews astray during the Exodus from Egypt with the worship of a golden calf (Sura 20:85) is taken from the Hebrew Biblical story (Exod 32) but the inclusion of the

Samaritans in the story is also anachronistic since Samaria and the Samaritans would not exist for another thousand years. There are many instances of the Qur'an following the Ptolemaic view that the Sun and stars orbit the Earth, which was the accepted wisdom at the time, but later, of course, was shown to be incorrect. Indeed, the stars are viewed as heavenly lamps which the angels can use as missiles to throw at the malicious Jinn, (Sura 67:5).

Synthesis

Religious belief has been strongly selected for in the evolution of the human race and is deeply embedded in the human genome. Belief conferred many benefits in the past, offering certainty and security in a mysterious and terrifyingly capricious world. It still offers comfort and fellowship in the world of today and many people would be devastated, and even see little point in carrying on with their lives if somehow there could be demonstrated that there is no God (here taken to include any religious belief of a powerful intelligent supernatural force). Proving a negative, however, is not really possible as shown by the debate between a young Wittgenstein and the famous mathematician and philosopher Bertrand Russell with Wittgenstein refusing to accept Russell's assertion that there was no rhinoceros in the room. Perhaps it was very small or invisible or in another dimension, but in the end I think we can safely act as if there is not, in fact, "a rhinoceros in the room", without conclusively proving the fact to the satisfaction of everyone.

We could take up the assertion of the late and much lamented scientist and author Stephen J Gould that religion and science occupy "Non Overlapping Magisteria"- the NOMA position that holds that neither can say much about the other. With the greatest respect to Gould, I think this avoids rather than settles the issue. The US Academy of Science did appear to support this position when it asserted in 1988 that "Science can say nothing about the supernatural" and this would be acceptable if the supernatural were to have no influence on human activities. The religious of the Monotheistic religions, however, are of the unanimous opinion that the One God of Abraham constantly intervenes in the affairs of this world, and that nothing happens at all without his permission. If that were so we should be able to detect this influence and we can not. The universal physical laws are followed everywhere they can be observed in the universe and have never been shown to have been circumvented. The (British) Institute of Psychical Research published its findings, having investigated apparently supernatural phenomena for over a century, but found that in all cases no natural laws had been broken and all reported events could be explained without invoking the supernatural.

Many people, some of them very eminent and highly intelligent and for whom I have the highest respect, feel that this world is just too marvellous to have "just happened" and that there must, therefore, be an omnipotent power to explain it. I could never see this. I recall asking my mother when I was about five years old the ancient question "who made us?" She answered "God made us", so I asked, as might be expected, "who made God?" She replied "He made himself". I found this answer very unsatisfying then and even though it might be expressed in different ways, I have never had a convincing answer. "He is outside time", "He is eternal" etc are no better. If He is Eternal, then why can't the universe be eternal without Him? Explaining the wonders of nature by the simple answer that "God made it that way" may be convincing to some, but how much more wonderful if it did just emerge from the Big Bang via the laws of physics. One of the great geniuses of the last century, the physicist Stephen Hawking, said;

"Because there is a law such as gravity, the universe can and will create itself from nothing. Spontaneous creation is the reason there is something rather than nothing, why the universe exists, why we exist. The universe didn't need a God to begin; it was quite capable of launching its existence on its own,..."

Nature itself is a source of endless wonder. Life derives its energy from tiny three stroke motors- the ATP'ase molecules which buzz along at 9000 revs/minute to create high energy phosphate bonds for the body to use. We have so many of them (2x 10¹⁶) that if each were the size of a grain of sand, the pile would be a square mound measuring one hundred metres on each side and would be ten metres high. The amount of energy produced is so great that if the sun were made of these molecules it would be several thousand times hotter than it is. How wonderful is that? And how much more wonderful if, as Stephen Hawking says, it all originally came simply from gravity.

I've never found the offer of eternal life all that enticing either. It's a simple matter of supply and demand. If something is of infinite quantity, then it is of very little value. This brief life of ours makes it very precious. We cannot afford to waste a single minute. Rather than make life not worth living, it gives life, to me at least, much greater value.

Bibliography

Seeking God in the Brain- Efforts to Localize Higher Brain Functions. New Engl J Med 2008

The God Issue. New Scientist 2856: April 2012

Alper M. The God Part of the Brain. Sourcebooks Inc. 2008

Bauman Z. *Liquid Times: Living in an Age of Uncertainty.* Polity Press, Cambridge, UK, 2007

Bering J. The God Instinct. Brealey, 2011

de Botton A. *Religion for Atheists: A Non-believer's Guide to the Uses of Religion.* Pantheon, 2012

Gould SJ. Rocks of Ages: Science and Religions in the Fullness of Life. Vintage, 2002 Lipton BH. The Biology of Belief. Hayhouse, 2008

Newberg A. *How God Changes your Brain.* Ballantine Books, New York, 2009 Shermer M. *The Believing Brain.* Holt 2011

Dever WG. Did God Have a Wife? WB Eerdmans, 2005

Finkelstein I. The Bible Unearthed. Freepress, 2001

Schneiderwind WM. How the Bible Became a Book. Cambridge University Press, 2004 Smith MS. The Origins of Biblical Monotheism: Israel's Polytheistic Background and the Ugaritic Texts. Oxford University Press, 2001

, ..., , ..., , ..., , ..., , ..., , ..., , ..., , ..., , ..., , ..., , ..., , ..., , ..., , ..., , ..., , ...,

Ehrman BD. Misquoting Jesus. HarperCollins, 2005

Gardner J. Jesus Who? Myth vs Reality in the Search for the Historical Jesus. Booklocker, 2006

Murdoch DM. Christ in Egypt: The Horus-Jesus Connection. Stellar House, 2011 Palmer A. The Seventh Century in the West-Syrian Chronicles: Translated Texts for Historians Volume 15. Liverpool University Press, 1993

Spong JS. Rescuing the Bible from Fundamentalism. HarperCollins, 1992

Bucaille M. *The Bible, The Qur'an and Science: The Holy Scriptures Examined in the Light of Modern Science.* Inner Traditions, Saudi Arabia, 2006 Holland T. *In the Shadow of the Sword.* Hachette Digital, 2012 Lings M. *Muhammad: His Life Based on the Earliest Sources* http://archive.org/MartinLings Nevo Y. *Crossroads to Islam.* Prometheus Books, 2004 Ohlig K-H. *The Hidden Origins of Islam.* Prometheus Books, 2010 Sfar M. *In Search of the Original Koran.* Prometheus Books, 2008 Spencer R. *Did Muhammad Exist?: An inquiry into Islam's obscure origins.* ISI Books, Delaware, 2012