

TRAHERNE'S COSMIC CONSCIOUSNESS

John Powell Ward

Jeremy Maule Lecture, 2004

1. Preamble

It is an honour to be invited to give this lecture. I met Jeremy Maule just two or three times. He had great learning and a hyper-accurate mind, and was a most kind man. He is much missed.

According to the Oxford University chemist Peter Atkins, modern science still confronts two major mysteries. They are the origin of the universe and the nature of consciousnessⁱ. They may not be solvable even in principle. Either way, both topics are also held central to our very notion of the world. There is a cosmos, and we who inhabit it know that there is. Maybe the centrality and the insolubility entail each other.

My suggestion tonight is that, in his very different era, Thomas Traherne was much interested, and in a way scientifically, in the same two concerns. It was seldom central, but always important. You have kindly billed me as a literary academic and a poet; but I choose this unusual topic because I have recently been reading about the relationship between religion and science in our own time. But I won't offer detail tonight on how far Traherne actually investigated the science of his time; who he knew, or what he read. For that we need Julia Smith's long-awaited book, which will surely out-date, and probably correct, anything I could say here. But Traherne's lifetime was certainly a crucial one for science. Kepler, Bacon, Newton, Harvey, Thomas Sprat, Robert Boyle and Galileo himself all lived then or immediately before. The Royal Society was established in 1662, when Traherne was twenty-five. And Traherne's extraordinarily out-flowing mind could hardly fail to have been interested. He knows at least something of Albertus Magnus, Galileo, Helevius, Galen and Hippocrates as well as Aristotle, and he writes knowledgeably about "natural philosophy", as science was then called (CM III-41).

Traherne believed in wide learning, once calling it "the true exemplar of Gods infinity ... (which] *excludeth nothing*" (CM II-24, my emphasis). But he also knew of science's *analytical* methods. "The true way of reigning over [nature's features], is to break the world all into parts, to examine them asunder?" (CM I-23). At university he studied the heavenly bodies, fauna and flora, and the elements, and found all such science "nobly subservient to the highest ends; for it openeth the riches of God's kingdom and the natures of His territories, works and creatures in a wonderful manner..." (CM III-44).

2. Modern Science on the Cosmos

And so to our two areas, the origin of the cosmos and the nature of consciousness. I will refer to them first as to themselves, and then as to how they figure in Traherne.

Forgive me, but we do need first a brief run-through of these two areas of modern science. So we must briefly put Traherne aside; but we *shall* reach him! I am no scientist, as you'll shortly realise, and we must beg many questions anyway.

Our universe, it seems, did have an origin. It has not been here from infinity. From the second law of thermodynamics – roughly, that hot can flow into cold but not cold back into hot – we know the universe is disordering and cooling down; that is to say, it has 'entropy'. We know from *gravity* that the universe is expanding, otherwise it would already have imploded completely. So the universe *must* have begun some time, for if it were of *infinite* age, such cooling-down and expansion would long have finished and we would never have existed.

But how did the universe begin? In Stephen Hawking's words, "Why does the universe go to the bother of existing [at all]?"ⁱⁱ

Our universe exhibits striking regularities. Things 'obey' the 'laws of nature'. But where did those *laws* come from? On current spacetime theory, our scientific 'laws' are conceived *within* time and space. They too began at the start of the universe, not before it. And so the Big Bang, the origin itself, would have to have been caused by something else. That 'something else' could be either a great cosmic mind – 'God' – or yet further laws, but *outside* the universe, not God-given but necessary, independent, and there from infinity. The only other way, a third way, would be the universe arriving simply by chance, from nothing at all.

All three views have problems. First, those ultimate but not God-given laws. Holders of this view see cosmic minds as beyond science's remit, but are unhappy with chance and nothing, for equally scientific reasons. But if this view is the answer, then such laws must have generated this new universe suddenly from some factor *within themselves*. But how on earth then *suddenly*? Only from some further factor, *beyond* even those laws! – which would thus be not so necessary and self-contained after all. The danger here is of an infinite regression of such laws.

Secondly, a *chance* beginning, from *nothing* at all, would entail no starting laws, only what scientists call “initial boundary conditions”, in a *singularity*. Things just came as they came, with nothing further before, behind or beyond them. This is the materialist view: the cosmos is just matter and nothing else. But materialism cuts out *both* necessary laws *and* God. Only the pure-chance option is left. And so how do we avoid smuggling back in to that original ‘nothing’ various conditions *from* which a universe is to spring? In his book *Creation Revisited* Peter Atkins offers us ‘self-reference’, ‘spacepoints’ clashing with ‘anti-selves’, and something called ‘chance’ too. But that isn't nothing; *nothing* is nothing; and that is a problem indeed.

So then to the third explanation, an ultimate cosmic mind. If so, says theologian-scientist Keith Ward (no relation), it possessed immeasurable care, skill and art. For with even the tiniest change in the universe's structure at the beginning, or in the rate of expansion even one second after, the universe would simply have recollapsed long before it reached its present sizeⁱⁱⁱ. This exquisite ‘fine-tuning’ of the universe impressed the sceptical Fred Hoyle, who concluded the universe is a ‘put-up job’. It relates too, of course, to the so-called ‘argument from design’ more generally. But sceptics turn the point back on itself. If life evolves to suit the prevailing conditions *whatever* they are, then *naturally* such life is well adapted. Things *must* have evolved as they have, otherwise present conditions wouldn't exist. What's so special about that? On that argument the God-choice remains open.

So, as we have said, the cosmic origin problem may not be solvable even in principle. Some say it is: Atkins and Hawking look to the famous “Theory of Everything”, which will link large and small; cosmic gravity to the microscopic quantum. But Paul Davies, a theoretical physicist, holds that “there will always be mystery at the end of the universe”^{iv}. We must leave it there - and yet, believe it or not, much of this can be seen to pertain to Traherne.

3. Modern Science on Consciousness

And so to the other remaining mystery; consciousness and self-consciousness. This is just as difficult but for different reasons. There may be simply nothing to research. Consciousness may quite simply not be a ‘thing’ at all. (Perhaps it is more like a surface.) There are a couple of issues here.

First is the massiveness of the ME. To myself I am simply overwhelmingly ‘ME’ however tiny and unimportant I feel I am to the cosmos or anything else. Gerard Manley Hopkins wrote of this with rare vividness: “...My selfbeing my consciousness and feeling of myself...is more distinctive than the taste of ale or alum, more distinctive than the smell of walnutleaf or camphor, and is incommunicable by any means to any man...Nothing else in nature comes near this unspeakable stress of pitch, distinctiveness and selving, this selfbeing of my own...”^v

How can a particular person be ME? How does the item known to the world as John Powell Ward uniquely seem to be ME? Why don't millions of other people seem ME? But we can reverse the question. How can what seems ME be a particular objective person? As American philosopher of science Thomas Nagel puts it: “There was no such thing as *me* for ages, but with the formation of a particular physical organism at” a particular place and time, suddenly there is.....How can the existence of one member of one species have this remarkable consequence?”^{vi} As we shall see, Traherne was hyper-alert to both these questions.

But secondly, there is the relation of the mind to the brain. And there is a big space between them. Our experiences, memories, emotions, hopes, self-knowing awareness and the rest are one thing; the neurons, the synapses which carry electrical brain circuits, the cells and their projecting fibres at their base, are quite another. If we examine a living person's brain in the laboratory, we find no trace of her subjective experiences - whether she likes music, speaks French, or believes that Blair will win the next election. Researchers themselves say that on this front they have got simply nowhere. So mind, though entailed with brain, somehow floats way above it. As a result some consciousness theorists, like David Chalmers and Benjamin Libet, believe that consciousness is an independent item in nature, indeed perhaps in the cosmos itself. It is as though the human *brain* gradually evolved to the point where it could

I ‘reach up’ and grab this independent *mind*, consciousness, and make it its own. For whatever reasons in our struggle for survival, an individual ‘ME’ may have come to be needed.

But consciousness, too, is an unsolved mystery for science. This is what is called the “qualia”, the redness of the red, the painness of the pain. You will never quite know what I call red or painful, and I will never quite know what you do. The late Francis Crick, of DNA fame, believed we would never understand the qualia. As someone has put it, we can no more research consciousness than we could make love to our own reflections in a mirror or lake. Yet others, like Susan Greenfield, Lewis Wolpert and the American consciousness philosopher Daniel Dennett, have thought consciousness *will* be understood; it is merely a matter of time. And interestingly, any such breakthrough may well come via examination of *eyesight*. This is to do with the way eyesight dominates our apprehension of the world. Daniel Dennett, and nearly two millennia earlier St Augustine himself, have noted how we say things like “I see what you mean”, “see how loud it is”, “see how it tastes”, and “in my mind’s eye”^{vii}. This too, albeit indirectly, will be important when we consider Traherne.

4. Meeting of the Cosmos and Consciousness

So much then for consciousness too. But, just quickly, there is an important footnote here. For the origin of the cosmos and the nature of consciousness are *linked*.....

As science philosopher Mary Midgely has put it, the universe is inherently observable^{viii}. It is as though the cosmos evolved humans precisely so that they could understand it. We don’t know whether this just happened, had to happen or even enabled the universe to exist at all, as pure subjectivists would maintain. Whatever the truth, this is commonly referred to as the anthropic principle: the principle of the human criterion. But there is also the remarkable interlocking or ‘fit’ between human perspective and the cosmos it perceives. “The reason why we may be conscious of the world”, says Peter Atkins, “may be that our brains are material portrayals of the same deep structure”^{ix}. And some scientists go into raptures over the beautiful exactness of this fit – fit which may then also have been somehow entailed, or at least implied, at the cosmos’s origin’.

And so to Traherne and what he made of these matters.

5. Traherne on Consciousness

I will take Traherne’s ideas about consciousness first. Endearingly, he faulted himself for so much self-reference. ‘Were am I censured for speaking in the singular number, and saying I’ (SM III-65). But the first key item, well known to Trahernians, is that the whole world is, as Traherne puts it again and again, ‘MINE’ As far as I know this is unique for anyone writing at his time. We have referred already to ‘the massiveness of the ME’, but for Traherne it seems to have been overwhelming. “All things were spotless and pure and glorious: yea, and infinitely mine.....(CM III-2). “The streets were mine, the temple was mine, the people were mine, their clothes and gold and silver were mine, as much as their sparkling eyes, fair skins and ruddy faces. The skies were mine, and so were the sun and moon and stars, and all the World was mine; and I the only spectator and I enjoyer of it” (CM III-3). His poetry is full of it. “The streets were pav’d with golden stones/The boys and girls were mine” (‘Wonder’). I was as high and great, as kings are in their seat. All other things were mine” (‘Speed’). “All mine! And seen so easily! How great, how blest!” (‘The Design’). “That all things should be mine:This makes His bounty most divine” (‘Amendment’). There are many more cases of this reference. Indeed in a passage too long to cite here - it’s in the *Centuries of Meditation*, I-6 – Traherne even gives several proofs of this feeling of possession of the world.

The conclusion he draws from it all is quite startling. So *that I alone am the end* [i.e. the purpose] *of the World.. angels and men being all mine*^x (CM I-15). I can only think of John Henry Newman as a comparable case, of someone who also wondered whether the universe had been invented just for him, though for quite different reason in his case. Even Wordsworth never suggested nature was made just for himself.

Furthermore, this ‘ME’ element in Traherne is not just there but *already* there. “The infancy of this sublime and celestial greatness [i.e. felicity].....I had from the womb” (CM III-1). Consciousness came to Traherne early. It did not evolve with the introversion of adolescence or the maturity of adulthood. And it was so acute that he wonders whether not only the world but he too was there, somewhere, before his earthly birth * birth – just possibly, again, from the cosmic origin itself. Plato, Henry Vaughan and Wordsworth all spoke comparably, but none from the *point of view* of pre-birth experience. Only Traherne anticipates what we’ve already quoted from Thomas Nagel: “There was no such thing as *me* for ages, but

with the formation of a particular physical organism at a particular place and time, suddenly there is.....”

Now, as to this ‘MINE’: *why should Traherne claim what is palpably untrue?* He knew perfectly well that he didn’t own all these marvellous things he saw about him. Was it a compensation for the great poverty of his early years that he sometimes bewails? Perhaps at first. But I think his ardent feelings about it suggest much, much more. This will take a moment to explain and I ask you to indulge me.

Earlier we mentioned *eyesight* as a possible key to consciousness. But eyesight entails light. Everything in Traherne seems to be under the light. This comes with his massive attention to the Sun. “Is not the Sun glorious?” (CM 1-9). “It was [God’s] wisdom made you need the Sun” (CM 1-46). “The Sun serves us as much as is possible, and more than we could imagine” (CM I-14). In the second century of the *Centuries of Meditation* the Sun is given *five consecutive sections* (CM II-7/11) – far more than we get for any other material phenomenon. He notes the same emphasis in Plato and Plotinus, but he then adapts that as peculiar to himself.

But - and here’s the point – Traherne hardly ever refers to just *what* the sun shines down *on*. He cites it generally, but there is simply no detail. It is all “the trees, the fields, the hills, the houses, the people” - and so on. For example, John Speede’s 1610 map of Hereford names Wyebridge Street, Northgate Street, Brode Street, Packers Lane, Castle Lane, King Diche, Wydmarsh Street, Cabbage Lane, and well over a dozen more. Traherne names none of them – at least none I have come across – anywhere in his work. On trees, in the famous passage about the ‘orient and immortal wheat’, he is ecstatic. “The green trees when I first saw them transported and ravished me, their sweetness and unusual beauty made my heart to leap, and almost mad with ecstasy.....”(CM III-3). But no *species* is named. He never identifies his parishioners. There are no *individual* stars, mountains or seas, he describes no birds, insects, flowers, processes of farming labour, illnesses, meals, hedges, or variations of the weather^{xi}.

Even more curious as to detail, the smallest item of all, the ‘sand’ [i.e. a grain of sand], reminds him here and there that the tiny does exist. “You never enjoy the World aright, till you see how a [grain of] sand exhibiteth the wealth and power of God” (CM I-27). Yet the implication is never pursued elsewhere.

By contrast, other writers from this border region where Traherne was born and lived so long, give us detail in abundance:

Margiad Evans. “A tractor was shunting round a field below. We heard dogs, voices, cocks crowing, a bell, a trumpet, a sergeant screaming, sheep calling their lambs, birds whistling, trains shunting”^{xii}.

Francis Kilvert In a dark secluded recess of the wood near the river bank an ice-cold never-failing spring boils up out of the rock. Mrs Jones said it makes her arms ache to the shoulder to put her hand into the water from this spring [even] in the hottest day of the summer”^{xiii}.

Arthur Machen I remember an old man named Timothy.....About his cottage there were three or four, or maybe half a dozen, greengage trees.... A really plentiful crop, when the big boughs were heavy and dropping with rich green, sun-speckled fruit, meant to him abundance and luxury”^{xiv}.

So we can see the contrast there. But most remarkably, Traherne himself refers explicitly to this absence of detail. I saw moreover that it did not so much concern us *what* objects were before us, as with what eyes we beheld them, with what affections we esteemed them, and what apprehensions we had about them” (CM III-68) And *here* then is the connection with consciousness. Traherne’s interest is not in consciousness of this or that, not of detail, but of the whole, and, with an almost tingling intensity, via consciousness itself. Only as a general matter does the Sun shine down. Rather than detail, “We love we know not what, and therefore everything allures us” (CM I-2). Here too is where Traherne rushes right over that mysterious mind-brain gap we mentioned earlier. If human *brains* reach up to a consciousness independent in nature, as some theorists believe, then comparably Traherne reaches up to the Sun, which seems almost the very fact of consciousness itself.

Finally then Traherne’s response to the entire cosmos^{xv}.

6. Traherne on the Cosmos

Of the three modern theories we listed earlier; God, chance and necessity, Traherne of course goes for God. Indeed he first gives us the standard *theological* reasons for the creation, and that does remind us that that Western science was probably deeply enabled by Western theology. God wanted to manifest his love. God wanted an arena in which to be known to his creatures, and a place they might enjoy. God also required an arena for action. Paradoxically too, we humans would need some vantage point from which to contemplate eternity. And finally there is the Incarnation, which also needs an actual scene and place. All these are found in the *Centuries of Meditation* (II-62,I-68, V-7,I-53 and II-40).

Not much there to do with modern science, you may say. All the more notable then that, in the third of the *Centuries*, the autobiographical one, Traherne comes very close to that science. “Sometimes [when young] my thoughts would carry me to the Creation, for I had heard that the World which at first I thought was eternal, had a beginning: how therefore that beginning was, and why it was, why it was no sooner, and what was before, I mightily desired to know” (CM III- 8). The four aspects there closely match our own science’s pressing questions on this matter, already mentioned; the origin itself, what was before it; the ‘laws’ governing it; and their status before and after. That is surely remarkable.

Traherne does touch too, here and there, on what modern science sees as special aspects of the cosmic origin. For example, the extremities of large and small - despite his writing’s lack of detail we have mentioned. We mentioned the possible cosmic origin solution in the “Theory of Everything”, linking *cosmic* gravity to the *microscopic* quantum. Well, Stephen Hawking measures the universe as one million million million miles across, and the quantum as one millionth of a millionth of an inch^{xvi}. Traherne too: “Suppose it [is] millions of miles from the Earth to the Heavens, and millions of millions above the stars, both here and over the heads of our Antipodes” (CMP I-9). And equally, “O what a treasure is every sand when truly understood!” (CM II-67). As I said, I can’t offer detail on Traherne’s practical approaches to these thoughts; but it is notable here, that the *telescope* and the *microscope* – the large and the small – were both first constructed in the early part of the seventeenth century.

Traherne also knows how dependent scientific *evidence* is on the phenomenon of motion. This is again entropy, the universe’s disordering, for all action, all human and other re-ordering, has to move, against that constraint. Traherne lists wind, sea, vapours, stars, animal breath and even the movements of watches, concluding that “God created living ones: that by lively motions, and sensible desires, we might be sensible of a Deity.....O what a world of evidences!” (CM II-22). The emphasis on ‘evidence’ there is telling.

He speculates on why God is *invisible*. *Being* infinite too, if God were visible we would see nothing else (CM II-19). And this too has its curious modern parallel, in that for scientific atheists like Susan Blackmore, the hypothesis of God is ‘untestable’^{xvii}

And finally Traherne’s central interest – via the Sun – in light, squares with light’s cosmic significance in modern science. Light is central to quantum theory and is the focus of Einstein’s special theory of relativity. Light is everywhere, it is always moving, and we measure all cosmic speeds by the speed of light, than which nothing can travel faster. Traherne’s observation already quoted, that “The Sun serves us as much as is possible, and more than we could imagine”, takes on new meaning.

But there is more than these local examples. As to the cosmic origin, Traherne is closest to today’s theist scientists, I suggest, in an unexpected way. In an intriguing passage in the *Centuries of Meditation* he states that God gives, but also *wants*.

God *wants*. Of course theology had noted this before him. But Traherne is perplexed indeed – in the *Centuries of Meditation*, uniquely so. Nothing else puzzles him as much. “It is very strange; want itself is a treasure in Heaven.....This is very strange, that God should want.....Want is the fountain of all His fulness.....It is incredible, yet very plain.” (CM I-42). I find this passage very compelling. Its unique stress on the ‘strange’ and ‘incredible’ clearly parallels what we saw about the origin of the cosmos and the nature of consciousness, that they haven’t been solved and may be unsolvable in principle. My suggestion here would run as follows. Surveys reveal that some twenty-five percent of scientists believe in God. A distinct minority, but hardly a fringe group of epistemological eccentrics. A notable number, it seems, believe that science at some point exhausts its own possibilities, and must turn to theological explanations. At some point explanation will modify into desire. There is a gap, which no formal *scientific* explanation can fill, between our desire to see it filled, and God’s own ‘wanting’, a kind of magnetic pull toward his creatures to seek a different epistemology, and turn their desire into a dimension of faith. And here is where Traherne most finds the link, the fit, between consciousness and cosmos we

have considered. We want God, and God wants us; and the Creation is the medium of that uncompleted meeting. This is divinity's love, the ultimate self-denial; it entails of course the vexed questions of suffering and evil, a topic too large to enter on here though Traherne was fully aware of its presence^{xviii}; and for Christians, of course, a love embodied in the divinity's Incarnation in planetary conditions^{xix}

7. Happiness

So what do we conclude from all of this? I think there's an answer in Traherne's other quest, his real quest; epistemological too, but here for the nature of *happiness*. This too was a quest, and parallel to the scientific one. As Traherne said, soon after he finished his university education: "When I came into the country.....I resolved to spend [all my time], whatever it cost me, in search of happiness, and to satiate that burning thirst which Nature had enkindled in me from my youth" (CM III-46). What did he find from this quest? I suggest that our two topics, the origin of the cosmos and the nature of human consciousness, again merge here for Traherne, but in an extraordinary way, and now centred on the search for happiness itself. It is inscribed in Traherne's perhaps greatest poem, 'The Salutation' (SPP, page 3), with the last stanza truly special:

A stranger here
Strange things doth meet, strange glories see;
Strange treasures lodg'd in this fair world appear;

Strange all, and new to me.
But that they mine should be, who nothing was,
That strangest is of all, yet brought to pass.

'Yet brought to pass'. Those last four words are astonishing. Why add them? He could have ended quite simply, "That strangest is of all". But there is a clincher; "yet brought to pass"; that is to say, it *happened*. It *happened* - and we suddenly remember that 'happening' and 'happiness' are etymologically connected.

And here's the point. "Happy" the Oxford English Dictionary traces for us, was originally a 'hap', as in 'perhaps'; that is to say a *chance*. It then becomes a *fortunate* chance, as in "a happy coincidence", and from that further, *regular* such good chances; as in 'oh yes, we've had a happy life'. And Traherne's own term, 'felicity' is much the same, as in 'a felicitous expression', 'a felicitous outcome', and so on; for in Latin it means fortuitous, 'lucky', as well as happy,

So such definitions all have the chance element in them. Perhaps the cosmos too, then, by divine will can make us happy; a kind of divinely-intended fortunate chance; as Alan Guth (quoted famously by Stephen Hawking) has put it, "the ultimate free lunch"^{xx}. So: of our three theories of the cosmos's origin, namely cosmic mind, necessity, and chance, by a wonderful twist we can choose not just one but two of them together. The cosmos, by 'hap' or chance, is deeply enabled to make us happy, precisely because it is also a kind of gratuity.

That I suspect is what drew Traherne. The cosmic gratuity is its grace, evoking Traherne's gratitude – another etymology there – and given of God's entirely free will. And the modern theist-scientific view is the same. As Paul Davies has put it: if God created the entire universe from nothing, then it follows that it did not have to exist at all^{xxi}.

Entropy, which disorders the *cosmos*, is what lets 'happenings' occur against the grain of entropy itself. Humans have *consciousness* of such events and can perhaps be 'happy' with them. I am left wondering whether Thomas Traherne was alive to this verbal connection of cosmic happening and human happiness.

ⁱ Peter Atkins, *Galileo's Finger: The Ten Great Ideas of science* (Oxford: Oxford University Press 2003), pages 360-361.

ⁱⁱ Stephen Hawking, *A Brief History of Time* (London: Transworld (Bantam Books) 1994), page 174.

ⁱⁱⁱ Hawking, pages 121-122.

^{iv} Paul Davies, *The Mind of God.. Science and the Search for Ultimate Meaning* (Simon & Schuster 1992, Penguin 1993), page 226.

^v From “Notes on die Spiritual Exercises” in *Gerard Manley Hopkins*, edited by Catherine Phillips (Oxford: Oxford University Press 1986), page 282.

^{vi} Thomas Nagel, *The View From Nowhere* (Oxford: Oxford University Press 1986) page 55, Nagel’s emphasis.

^{vii} Augustine, *Confessions* Book X Section 35; Dennett, page 56.

^{viii} Mary Midgley, *Science as Salvation* (London: Routledge 1992), chapter 2.

^{ix} Peter Atkins, *Creation Revisited* (London: Penguin Books 1994), page 111.

^x For traditional Judaeo-Christian theology a key figure in this meeting has been Adam, created to be both inhabitant and spectator of God’s great work. The contemporary biologist Steve Jones comments intriguingly on this point. “The birth of Adam, whether real or metaphorical, marked the insertion into an animal body of a post-biological soul that leaves no fossils and needs no genes.” Steve Jones, *Almost Like A Whale: The Origin of Species Updated* (Random House: Transworld: Anchor 1999), page 437.

^{xi} Any such detail, and it is very rare indeed, merely illustrates his theme at the time; for example, that pigs eat acorns but aren’t aware of the heavens (CM 1-26).

^{xii} Margiad Evans, *Autobiography* (Oxford: Blackwell 1943), page35.

^{xiii} Francis Kilvert *Kilvert’s Diary 1870-1879*, selection edited by William Plomer (Harmondsworth: Penguin Books 1944/1977, 13 October 187 1), page 161.

^{xiv} - Arthur Machen *Far Off Things*, in *The Collected Arthur Machen*, edited by Christopher Palmer (London: Duckworth 1922/1928) page 112.

^{xv} A note here on style, rather too long to include in the main body of the lecture. . Traherne’s has two clear main features. This absence of detail, just described, is one of them. The other pertains to his treatment of the cosmos. It is the *unhindered forward movement of so* much that he writes; the sentences rushing on, commonly without counter-arguments, conditional clauses or anything else to stop the incessant movement outward. It is as if he will not stop until he reaches the very perimeter of the universe. Here are just two examples, out of many.

On how man can reach understanding: “[Man’s] love can extend to all objects, [can] see and examine all beings, survey the reasons, surmount the greatness, exceed the strength, contemplate the beauty, enjoy the benefit, and reign over all it sees and enjoys like the eternal Godhead” (CM II-24).

From a paean to Love lasting approx 50 sections (II-26-69/75): Nothing is more glorious, yet nothing more humble. Nothing more precious, yet nothing more cheap. Nothing more familiar, yet nothing so inaccessible. Nothing more nice, yet nothing more laborious.....for “Excess is [Love’s] true moderation it excludeth nothing” (CM II-24).

It is hardly surprising that in the alphabetical *Commentaries on Heaven* Traherne could only get halfway through the letter B. Yet the style engenders great riches, at times, and to Traherne’s purpose.

^{xvi} Stephen Hawking, page 11.

^{xvii} Susan Blackmore, *The Meme Machine* (Oxford: Oxford University Press 1999), chapter 15.

^{xviii} “~”See for example Keith Ward, page 196; Paul Davies, chapter 7; John Polkinghorne, “Religion Since Darwin”. (Lecture, St Mary’s Church, Down, Kent, 18 May 2004). 12

^{xix} xix A note from Keith Ward is pertinent here. If our material accounts of the cosmos are evidence of “an immense and patient wisdom” (Keith Ward, page 63), then that patience might be the ‘wanting’ dimension of God which Traherne detected. It led him into, not just worship, prayer, or even philosophy, but an *enquiry* close to that of modern scientist-theists, who see here the best prospect of an intellectual equilibrium where modern science may finally come to rest.

^{xx} Cited in Stephen Hawking, page 129.

^{xxi} Paul Davies, pages 44-45.

BIBLIOGRAPHY

Thomas Traherne, *Centuries of Meditation*, edited by H.M.Margolioth (London & Oxford: Mowbray 1960)

Thomas Traherne, *Select Meditations*, edited by Julia Smith (Manchester: Carcanet Press/Fyfield Books

1997) Thomas Traherne, *Selected Poems and Prose*, edited by Alan Bradford ((London: Penguin Books 1991)

(In the text, references to the *Centuries of Meditation* and the *Select Meditations* are given as ‘CM’ and ‘SM’ respectively. References to the poems are given as ‘SPP’.)

Peter Atkins, *Creation Revisited* (London: Penguin Books 1994)

Peter Atkins, *Galileo’s Finger: The Ten Great Ideas of science* (Oxford: Oxford University Press 2003)

Susan Blackmore, *The Meme Machine* (Oxford: Oxford University Press 1999)

Paul Davies, *The Mind of God.. Science and the Search for Ultimate Meaning* (Simon & Schuster 1992, Penguin 1993)

Daniel C. Dennett *Consciousness Explained* (London: Penguin Books 1991)

Stephen Hawking, *A Brief History of Time* (London: Transworld (Bantam Books) 1994)

Steve Jones, *Almost Like A Whale: The Origin of Species Updated* (Random House:Transworld: Anchor 1999) Mary Midgley, *Science as Salvation* (London: Routledge 1992)

Thomas Nagel, *The View From Nowhere* (Oxford: Oxford University Press 1986)

Keith Ward, *God, Chance and Necessity* (Oxford: Oneworld 1996)