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SPECIAL DIVINE ACTION

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EDITORIAL

'Special divine action' (SDA) is what John Austin might have called a 'trouser-term', in the sense that its function is to exclude possible ways in which divine action is not special. For SDA, what is excluded is deism or some similar conception of divine action limited to that of first or uncaused cause, or cosmic designer, or sustainer. A positive definition of SDA is more challenging, but within theology, it is common practice to take account of various distinct modes of SDA, especially grace, inspiration, miracles, and providence. Such action is usually considered as particular to time and place, as in the case of the inscription in Nazareth that reads, "The word became flesh *here*." Such action is also generally considered to take place in response to some state of affairs in the world and often understood in terms of an intervention in the ordinary course of nature.

For obvious reasons, the possibility, meaning, and purported occurrences of SDA are central concerns of theology and religion, and they are the issues associated with divine action that are usually of greatest personal, social, and political interest. Since views about divine action also tend to shape views about human action, the topic also has implications beyond theology and religion alone. The study of such matters, however, has often been framed in terms of a fairly narrow set of concerns, questions and approaches, with the terms of debates since the eighteenth century often set by David Hume, *An Enquiry Concerning Human Understanding*. Given subsequent advances in philosophy and science, a growing appreciation of the vast amount of neglected scholarship on SDA, and the hopes and fears raised by a resurgence of religious beliefs concerning divine intervention, it is timely to re-examine what the philosophy of religion can contribute.

For these reasons, we have welcomed the generous opportunity provided by the *European Journal for Philosophy of Religion* to dedicate this issue specifically to SDA. The papers presented in this issue are based on presentations from a conference at the University of Oxford, 13-16 July 2014, organised by the Ian Ramsey Centre for Science and Religion, Faculty of Theology and Religion. This conference was under

the auspices of a major project on special divine action at the University of Oxford, made possible thanks to a grant from the John Templeton Foundation, and carried out in collaboration with the Department of Philosophy of the University of Western Michigan, with digital humanities tools for future research on SDA being developed by the Texas Center for Applied Technology.

The first two papers of this edition, by Alister McGrath and Benedikt Göcke, set the scene by examining hesitations about the study of SDA and the changing situation today. Papers by Daniel von Wachter, Robert Larmer, Joel Archer, Ignacio Silva, and Andrea Sangiacomo challenge details of the various frameworks that often shape arguments concerning SDA. Lenn Goodman examines the notion of God's governance, drawing especially from Maimonides. Colin McGinn presents problems raised by God's purported interaction with the world, especially as regards the mind of God, and Andrew Pinsent examines a model for how divine understanding might be communicated, drawing some practical implications for catalysing insights in daily life. Aside from their intrinsic merits, we hope that these papers encourage further research by showing some of the many new possibilities for the study of special divine action in the philosophy of religion.

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HESITATIONS ABOUT SPECIAL DIVINE ACTION: REFLECTIONS ON SOME SCIENTIFIC, CULTURAL AND THEOLOGICAL CONCERNS

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Abstract. The new interest in special divine action has led to a close reading of the great debates and discussions of the early modern period in an attempt to understand contemporary resistance to the notion of divine action, and to develop strategies for reaffirming the notion in a refined manner. Although continuing engagement with and evaluation of the Humean legacy on miracles and divine action will be of central importance to this programme of review, there are other issues that also need to be addressed. In this article I identify some of the factors that have caused or continue to cause difficulties for the articulation of a concept of special divine action and I suggest how they might be engaged.

The last two decades have witnessed a renewed surge of interest in the question of whether, and to what extent, God may be said to act in the world. Can God be understood to act entirely in and through the regular structures and capacities of nature, or does a robust account of divine action also require us to affirm that God acts *specially* in order to redirect the course of events in the natural world, thus delivering outcomes that would not have occurred if God had not acted in this way? Although this discussion is sometimes framed in terms of a generic notion of divinity, the most significant recent engagements with the question have reflected Judeo-Christian conceptions of God, and the questions arising from these.

The language of divine action is integral to both Old and New Testaments. The God of Israel is regularly and definitively depicted and

¹ See, for example, Jeffrey Koperski, *The Physics of Theism: God, Physics, and the Philosophy of Science* (New Malden, MA: Wiley-Blackwell, 2015), pp. 146-65.

described as a God who acts in history.² God's identity and character are understood to be made visible in the sphere of human action and reflection.³ This concentration on God's actions in nature and history could lead to the neglect of important themes (such as the more subtle unobtrusive forms of divine activity in everyday experience), as well as creating an essentially impersonal notion of God as a spiritual force.⁴ Yet despite these important qualifications, Israel understood and represented God as one who acted in nature and in history.⁵ The New Testament maintains this tradition, and focuses it on the life, death and resurrection of Jesus of Nazareth.⁶

So how do we account for this resurgence of interest in the question of divine activity? One factor is the increasing awareness of the inadequacy of the theologies of the 1960s to accommodate this notion. The noted theologian and philosopher Ian T. Ramsey (1915-72) was alarmed at the failure of the 1960s to recognize the importance of affirming divine activity. To lose sight of this central theme, he argued, was to drift into a theological atheism.⁷ There was a need for 'justified talk of God's activity' if the situation was to be retrieved. Process thought began to emerge around this time as a potential solution to this dilemma, offering an approach to divine activity which seemed to meet at least some of the inadequacies of the regnant neo-Orthodoxy within Protestantism.⁸

² For a good review of the primary and secondary sources on this point, see Terence E. Fretheim, 'The God Who Acts: An Old Testament Perspective', *Theology Today*, 54 (1997), 6-18.

³ The narrative of God's action is thus seen as disclosing or 'rendering' God's character: see, for example, David Kelsey, *The Uses of Scripture in Recent Theology* (Philadelphia: Fortress, 1975), pp. 39-50.

⁴ See the comments in Fretheim, 'The God Who Acts', p. 7. For a detailed examination of one such instance of divine action, see William Stacy Johnson, 'God's Ordering, Providing, and Caring for the World', *Theology Today*, 54 (1997), 29-42.

⁵ For an analysis, see William Paul Griffin, *The God of the Prophets: An Analysis of Divine* Action (Sheffield: Sheffield Academic Press, 1997), pp. 76-191.

⁶ See, for example, N. T. Wright, *The Resurrection of the Son of God* (London: SPCK, 2003), pp. 20-8; Richard Cross, *The Metaphysics of the Incarnation: Thomas Aquinas to Duns Scotus* (Oxford: Oxford University Press, 2005), pp. 152-5; Kevin J. Vanhoozer, *Remythologizing Theology: Divine Action, Passion, and Authorship* (Cambridge: Cambridge University Press, 2010), pp. 33-80; Denis Edwards, *How God Acts: Creation, Redemption, and Special Divine Action* (Minneapolis: Fortress Press, 2010), pp. 57-141.

⁷ Ian T. Ramsey, *Models for Divine Activity* (London: SCM Press, 1973), pp. 56-66.

⁸ Gary J. Dorrien, *The Making of American Liberal Theology: Crisis, Irony, and Postmodernity, 1950-2005* (Louisville, KY: Westminster John Knox Press, 2006), p. 204.

Modern Pentecostal theologians have developed theories of divine action within the world based on the complex activity of the Holy Spirit, which ultimately transcends frameworks of interpretation. Other readings of the Christian tradition which offer an illuminating engagement with the theme of divine action include Thomist accounts of God's agency in nature, which have been widely applied to physical and biological processes. Recent accounts of Aquinas's concept of causality suggest that, while some questions need to be addressed, this is likely to remain a fertile field of exploration in the near future.

The extended project of interdisciplinary conferences and publications entitled 'Scientific Perspectives on Divine Action' (1988-2003) is a particularly good example of this renewed interest in the notion of divine action. This project – generally referred to simply as the 'Divine Action Project' [DAP] – brought together scholars from the fields of natural science, philosophy, and theology in a sustained discussion over a period of fifteen years to consider whether the notion of divine action remained meaningful and defensible. Important though this project may have been, particularly in identifying and evaluating possibilities, its constructive outcomes remain unclear, even elusive, as may be seen from the concerns expressed in a retrospective volume published to mark the formal end of the project. ¹² There is clearly a need for further exploration

For further discussion, see David Ray Griffin, *Reenchantment Without Supernaturalism:* A Process Philosophy of Religion (Ithaca, NY: Cornell University Press, 2001).

⁹ Amos Yong, *The Spirit of Creation: Modern Science and Divine Action in the Pentecostal-Charismatic Imagination* (Grand Rapids, MI: Eerdmans, 2011), pp. 72-137. Ramsey also notes the importance of such Spirit-based approaches: Ramsey, *Models for Divine Activity*, pp. 1-14.

¹⁰ Armand Maurer, 'Darwin, Thomists, and Secondary Causality', *Review of Metaphysics*, 57 (2004), 491-515; William E. Carroll, 'Divine Agency, Contemporary Physics, and the Autonomy of Nature', *Heythrop Journal*, 49 (2008), 582-602. For contemporary critiques of the idea of secondary causality, see Alfred J. Freddoso, 'Medieval Aristotelianism and the Case against Secondary Causation in Nature,' in *Divine and Human Action: Essays in the Metaphysics of Theism*, ed. by Thomas V. Morris (Ithaca, NY: Cornell University Press, 1988), pp. 74-118. For early modern concerns about such notions of causality, see J. A. van Ruler, *The Crisis of Causality: Voetius and Descartes on God, Nature, and Change* (Leiden: Brill, 1995), pp. 107-66.

¹¹ See especially Michael J. Dodds, *Unlocking Divine Action: Contemporary Science & Thomas Aquinas* (Washington, DC: Catholic University of America Press, 2012).

¹² Robert John Russell, Nancey Murphy, and William R. Stoeger, S.J., eds. *Scientific Perspectives on Divine Action: Twenty Years of Challenge and Progress* (Vatican City State: Vatican Observatory, and Berkeley, CA: Center for Theology and the Natural Sciences,

of the issues. Since the affirmation of the existence of God does not entail that this God should act in any way – whether 'special' or 'general' – this article will focus on the specific question of God's *activity*, not the more general (and quite distinct) question of God's *existence*.

A central theme of recent discussions of special divine action has been the reassessment of David Hume's arguments against miracles. It is well known that there are difficulties with these arguments – such as the problematic definition of the term 'miracle', Hume's limiting conception of a law of nature, and his somewhat unconvincing description of the evidence for natural laws and the role of historical testimony. These revisionary readings of Hume, particularly when taken in conjunction with the criticisms of Hume developed by his contemporaries, are likely to create an intellectual environment more hospitable to the notion of special divine action.

So how is the notion of divine action to be sustained, in the light of multiple suspicions of the notion on the one hand, and continuing interest in it on the other? There is no doubt of this interest and commitment, and of the willingness on the part of scholars to engage the issues at stake, including the important question of whether the conventional distinction between 'general divine action' and 'special divine action' can be maintained.¹⁴

^{2008).} For an assessment of the project, see Wesley J. Wildman, 'The Divine Action Project, 1988–2003', *Theology and Science*, 2 (2004), 31-75; F. LeRon Shults, Nancey C. Murphy, and Robert J. Russell, *Philosophy, Science and Divine Action* (Leiden: Brill, 2009); Leigh C. Vicens, 'On the Possibility of Special Divine Action in a Deterministic World', *Religious Studies*, 48 (2012), 315-36. Vicens' analysis should be read alongside the earlier reflections of Arthur R. Peacocke, 'God's Interaction with the World: The Implications of Deterministic "Chaos" and of Interconnected and Interdependent Complexity; in *Chaos and Complexity: Scientific Perspectives on Divine Action*, ed. by Robert J. Russell, Nancey Murphy and Arthur R. Peacocke (Vatican City State: Vatican Observatory, and Berkeley, CA: Center for Theology and the Natural Sciences, 1995), pp. 263-88.

¹³ John Earman, *Hume's Abject Failure* (Oxford: Oxford University Press, 2000). For a response, see Robert J. Fogelin, *A Defense of Hume on Miracles* (Princeton, NJ: Princeton University Press, 2003); Peter Millican, 'Earman on Hume on Miracles', in *Debates in Modern Philosophy: Essential Readings and Contemporary Responses*, ed. by Stewart Duncan and Antonia LoLordo (New York: Routledge, 2013), pp. 271-84. See also Aviezer Tucker, 'Miracles, Historical Testimonies, and Probabilities', *History and Theory*, 44 (2005), 373-90; Graham H. Twelftree, ed., *The Cambridge Companion to Miracles* (Cambridge: Cambridge University Press, 2009).

¹⁴ See especially the concerns noted in Niels H. Gregersen, 'Special Divine Action and the Quilt of Laws: Why the Distinction between Special and General Divine Action

This article identifies some of the chief concerns that underlie resistance to the notion of 'special divine action', and reflects on how these can be engaged. Although these concerns can be allocated to the broad categories of culture, the natural sciences, and theology, these boundaries are porous and poorly defined and policed. While the importance of philosophical arguments for the topic under consideration will be obvious, this article will focus on three additional fields which have in the past raised certain difficulties for the notion of special divine action: culture, the natural sciences, and Christian theology.

I. CULTURAL CONCERNS ABOUT SPECIAL DIVINE ACTION

The notion of special divine action caused relatively little mental discomfort in the Middle Ages and Renaissance; indeed, the notion of special divine action in healing or other miraculous events lay at the heart of much popular religion of the age. 15 In England, Catholic attempts to rebuff the growing influence of Protestantism were often linked with an appeal to miracles wrought by saints or through relics as a sign of God's presence and favour. 16 Yet this would gradually give way to a marked cultural disinclination to take the notion of special divine action seriously, discounting this as superstition or the vestiges of an outdated popular religiosity which had no place in the modern world. One of the reasons for the rise of 'natural theology' in British Protestant religious thought of the late seventeenth and eighteenth centuries was the presumption that God did not act directly within nature, but that God's wisdom in creation – understood as a past event – could be seen from an intelligent and committed study of the world of nature.¹⁷ The natural theology of the modern age offered an apologetic for faith based on the assumption that God had acted in the past, reflecting a growing

Cannot Be Maintained, in *Scientific Perspectives on Divine Action: Twenty Years of Challenge and Progress*, pp. 179-99. There are some interesting parallels here with the distinction between 'general' and 'special' revelation in systematic theology, which cannot be explored further here: for these concepts, see Gerald O'Collins, *Rethinking Fundamental Theology* (Oxford: Oxford University Press, 2011), pp. 56-92.

¹⁵ Jane Shaw, *Miracles in Enlightenment England* (New Haven, CT: Yale University Press, 2006).

¹⁶ Alexandra Walsham, 'Miracles and the Counter Reformation Mission to England', *Historical Journal*, 46 (2003), 779-815.

¹⁷ Alister E. McGrath, *Darwinism and the Divine: Evolutionary Thought and Natural Theology* (Oxford: Wiley-Blackwell, 2011), pp. 56-74.

cultural disinclination to believe in direct divine action in the present.¹⁸

The philosopher Charles Taylor rightly asks how this transition is to be explained. 'Why was it virtually impossible not to believe in God in, say, 1500 in our Western society, while in 2000 many of us find this not only easy, but even inescapable?' Taylor's answer is presented in terms of the social dominance of a cluster of modern prejudices which he designates 'The Immanent Frame'. This cultural metanarrative weaves together a number of themes, including the disenchantment of the world, an understanding of nature as an impersonal order, the rise of an 'exclusive humanism', and an ethics which is framed primarily in terms of discipline, rules, and norms.

Taylor notes that this 'exclusive humanism' advocates a view of human flourishing which denies or suppresses any notion of a transcendent source of morality, such as God or the Tao, and which refuses to recognize any good beyond this life and world. The outcome of the dominance of this narrative is the cultural exclusion of a transcendent reality in general, particularly the notion of a God who can be considered to act within the world. For Taylor, contemporary understandings of human flourishing, the natural order, and the moral life, and nature are all framed in a self-sufficient, naturalistic, and immanent manner.²⁰

Being rational now comes to mean taking some distance from ordinary, embodied human existence and striving to acquire mastery over the self and the world. The disengagement that this involves is mental or intellectual; the mind tries to prescind from its involvement in ordinary existence and aspires to a more detached, disinterested perspective on the world.

¹⁸ A good example is William Paley's *Evidences of Christianity* (1794), which affirms the apologetic and evidential importance of miracles in the apostolic period, but without any expectation that they recur outside that era. Paley's rebuttal of David Hume's critique of miracles in this work merits close study, especially in relation to the theme of 'special divine action'. See, for example, Michael J. McClymond, *Encounters with God: An Approach to the Theology of Jonathan Edwards* (Oxford: Oxford University Press, 1998), pp. 85-8.

¹⁹ Charles Taylor, *A Secular Age* (Cambridge, MA: Belknap Press, 2007), p. 25. For assessments of Taylor's approach, see Michael Warner, Jonathan VanAntwerpen, and Craig J. Calhoun, eds., *Varieties of Secularism in a Secular Age* (Cambridge, MA: Harvard University Press, 2010); Carlos D. Colorado, and Justin D. Klassen, eds., *Aspiring to Fullness in a Secular Age: Essays on Religion and Theology in the Work of Charles Taylor* (Notre Dame, IN: University of Notre Dame Press, 2014).

²⁰ Charles Taylor, *Sources of the Self: The Making of the Modern Identity* (Cambridge, MA: Harvard University Press, 1989), p. 149.

Echoes of Taylor's analysis can be found in older critics of western culture. For example, C. S. Lewis's writings of the 1940s show a growing anxiety over signs that the category of the transcendent was being intentionally sidelined within English intellectual life. His *Abolition of Man* (1943) noted how the educational system of the day seemed designed to eradicate any intuitions of transcendence in morality or religion.²¹ The sermon 'The Weight of Glory' (1941) asserts that people are now held spellbound, caught up in a secular and secularising metanarrative that insists that human destiny and good lie in this world alone. We are told – and come to believe – that the ideas of transcendent realms, of worlds to come, are simply illusions. The educational system, Lewis notes with obvious sadness, has colluded with the modern myth that the sources and goals of human good are 'found on this earth'.²²

Lewis declares that the time has come to break free from this 'evil enchantment of worldliness'. Lewis has no doubt about what has to be done. So deeply has this 'evil enchantment' saturated English culture that the 'strongest spell' is needed if its power is to be broken. Lewis reminds his readers that 'spells are used for breaking enchantments as well as for inducing them'. For Lewis, Christianity has to show that it can tell a more compelling and engaging story that will capture the imagination of its culture. In the end, of course, Lewis provided such a counter-narrative in his *Chronicles of Narnia*.

Taylor's point is that the culture of our 'secular age' now makes a sharp distinction between the natural and the supernatural, the human and the divine, so that making sense of the world around us now seems to be possible in terms of this world alone. Nature became emptied of the spirits, signs, and cosmic purposes that once seemed a fact of everyday experience. It came to be conceived fundamentally as an impersonal order of matter and force, governed by causal laws, making the notion of special divine action counterintuitive, if not conceptually incredible. Taylor notes the importance of Weber's concept of the 'disenchantment of nature,' while offering his own reinterpretation of this in terms of

²¹ Michael D. Aeschliman, *The Restitution of Man: C. S. Lewis and the Case against Scientism* (Grand Rapids, MI: Eerdmans, 1998).

²² C. S. Lewis, *Essay Collection* (London: HarperCollins, 2002), p. 99.

²³ On which see Michael T. Saler, 'Modernity, Disenchantment, and the Ironic Imagination', *Philosophy and Literature*, 28 (2004), 137-49; Alison Stone, 'Adorno and the Disenchantment of Nature', *Philosophy & Social Criticism*, 32 (2006), 231-53.

'disengagement'.²⁴ There has been a marked shift to 'Closed World Structures' that tacitly accept 'the immanent frame' as normative, seen in the fact that most people no longer see natural events as acts of God.²⁵ Nature has become reduced to the predictable and quantifiable. For Taylor, this means that the dominant cultural narrative leaves no place for the 'vertical' or 'transcendent', but in one way or another closes these off, renders them inaccessible, or even unthinkable. 'Closed World Structures' now function as unchallenged axioms in western culture.

Taylor here describes a cultural predisposition, an axiomatic way of seeing and conceiving the world, which simply excludes the notion of special divine action as a matter of principle. This notion is now deemed 'unthinkable'; to run counter to this cultural mindset is a symptom of a fundamental irrationality. So what can be done about it? How can this cultural narrative be challenged? Taylor's response is complex, and rests partly on understanding how this narrative achieved social dominance in the first place. It involves grasping an alternative 'master narrative', one of several 'broad framework pictures of how history unfolds' which helps us understand how 'disenchantment' led to the elimination of the transcendent.²⁶

In exploring these issues, Taylor sets out an account of secularization which has analytical, phenomenological, and genealogical components.²⁷ Taylor's account of the historical origins of this 'master narrative' emphasises its historical contingency. 'It is a crucial fact of our present spiritual predicament', he declares, 'that it is historical; that is, our understanding of ourselves and where we stand is partly defined by our

²⁴ Luc van den Berge and Stefan Ramaekers, 'Figures of Disengagement: Charles Taylor, Scientific Parenting, and the Paradox of Late Modernity', *Educational Philosophy and Theory*, 64 (2014), 607-25.

²⁵ For a succinct account of this notion, see Charles Taylor, 'Geschlossene Weltstrukture in der Moderne', in *Wissen und Weisheit: Zwei Symposien zu Ehre von Josef Pieper*, ed. by Hermann Fechtrup, Friedbert Schulze and Thomas Sternberg (Münster: LIT Verlag, 2005), pp. 137-69. Taylor's reflections should be set alongside Alvin Plantinga's comments about the problems of framing divine action within a 'Laplacean' paradigm, which assumes 'the causal closure of the universe': Alvin Plantinga, 'What is "Intervention"?', *Theology and Science*, 6 (2008), 369-401.

²⁶ Charles Taylor, A Secular Age, p. 573.

²⁷ For comment, see José Casanova, 'A Secular Age: Dawn or Twilight?', in *Varieties of Secularism in a Secular Age*, ed. by Michael Warner, Jonathan VanAntwerpen and Craig J. Calhoun (Cambridge, MA: Harvard University Press, 2010), pp. 243-64.

sense of having come to where we are, of having overcome a previous condition.²⁸

Taylor's innovative and engaging account of how this cultural mindset developed questions the validity of what he terms 'subtraction stories', understood as 'stories of modernity in general, and secularity in particular, which explain them by human beings having lost, or sloughed off, or liberated themselves from certain earlier, confining horizons, or illusions, or limitations of knowledge'.²⁹ For those committed to 'subtraction stories', divine action and transcendence belong to the past, and have no place in the present or future. For Taylor, however, the western mindset remains open to the notions of transcendence and divine action; the problem is that it is not *perceived* to be so. Taylor's account of the emergence of a 'secular age' emphasises the constitutive God-reference that still 'haunts' the secular age.

A similar point was made by the Polish philosopher Leszek Kolakowski (1927-2009). 'God's unforgettableness', Kolakowski argued, 'means that He is present even in rejection.'30 Developing this point further, Kolakowski suggests that the 'return of the sacred' is a telling sign of the failure of the *ersatz* Enlightenment 'religion of humanity', in which a deficient 'godlessness desperately attempts to replace the lost God with something else'. Taylor concurs, arguing that this persistence of a God-reference should not be seen as an empty vestige, a dead metaphor, but rather as a sign that interest in the transcendent remains embedded within culture, and has the potential for future development.

Taylor's analysis is intended to hold up a mirror to our present, allowing us to discern its regnant implicit narrative – the 'immanent frame' – and grasp that this can be understood as both 'closed' and 'open'. The outcomes of this 'immanent frame' are thus not determined by the frame itself, but by how we choose to interpret and apply it. Taylor opts for an 'open' interpretation of the 'immanent frame', where Weber endorses a 'closed' reading. Both are defensible interpretations (or 'spins') of the

²⁸ Charles Taylor, A Secular Age, p. 29.

²⁹ Charles Taylor, A Secular Age, p. 22.

³⁰ Leszek Kolakowski, 'Concern about God in an Apparently Godless Age', in *My Correct Views on Everything*, ed. by Zbigniew Janowski (South Bend, IN: St. Augustine's Press, 2005), pp. 173-83 (p. 183). For further reflections on Kolakowski's significance, see Alister E. McGrath, 'Atheism and the Enlightenment: Reflections on the Intellectual Roots of the "New Atheism", in *Mere Theology: Christian Faith and the Discipleship of the* Mind (London: SPCK, 2010), pp. 139-54.

'immanent frame'; both, however, are to be seen as acts of faith, in that neither are demanded by this frame.³¹

The immanent order can, therefore, slough off the transcendent. But it doesn't necessarily do so. What I have been describing as the immanent frame is common to all of us in the modern West, or at least that is what I'm trying to portray. Some of us want to live it as open to something beyond; some live it as closed. It is something which permits closure, without demanding it.

Taylor thus notes that, as a matter of fact, far from being uniformly antireligious or atheist, Western culture displays 'a whole gamut of positions, from the most militant atheism to the most orthodox traditional theisms, passing through every possible position on the way.'32

So where does this leave us? What are the implications of Taylor's reflections on the regnant narrative of western culture for special divine action? Taylor helps us to grasp that suspicion of the notion of special divine action rests partly on a dominant cultural narrative, rather than specifically philosophical objections. The 'immanent frame' is the default position for contemporary discussion of these issues; it is shaped, in part, by philosophical considerations, but has developed a plausibility which goes beyond its philosophical roots. It is impossible to debate the issue of divine action without taking account of this cultural predisposition against this notion. 'We have here what Wittgenstein calls a "picture", a background to our thinking, within whose terms it is carried on, but which is often largely unformulated and to which we can frequently, just for this reason, imagine no alternative.'33

If Taylor is right, the plausibility of special divine action is shaped by cultural pressures and imaginative constructions which ultimately transcend the rational arguments which underlie it. The best way of engaging a closed reading of the 'immanent frame' is to provide an imaginatively compelling alternative, which is seen to have rational plausibility. To revert to the language of C. S. Lewis, noted earlier, we need to break the 'spell' of a closed world system, and open up alternative readings of our world – and perhaps that is best done, not by rational argument, but by capturing the cultural imagination with a richer and deeper vision of reality.

³¹ Charles Taylor, A Secular Age, p. 544.

³² Charles Taylor, A Secular Age, p. 556.

³³ Charles Taylor, A Secular Age, p. 549.

II. SCIENTIFIC CONCERNS ABOUT SPECIAL DIVINE ACTION

The debate about special divine action takes place against a framework of scientific discourse, framed in terms of the 'laws of nature', which raise significant Humean concerns about the notion of divine 'interference' with the regular structures of the world.³⁴ With the benefit of hindsight, it can now be seen that the important 'Divine Action Project', noted earlier, was haunted by the fear that interventionist approaches to divine action seemed to call into question the validity of the laws of nature.³⁵

The 'divine action project' tried to be sensitive to issues of theological consistency. For example, the idea of God sustaining nature and its law-like regularities with one hand while miraculously intervening, abrogating, or ignoring those regularities with the other hand struck most members as dangerously close to outright contradiction. Most participants certainly felt that God would not create an orderly world in which it was impossible for the creator to act without violating the created structures of order.

The concern within the Divine Action Project was to secure an account of divine action in the world that had scientific 'traction', while at the same time maintained maximal continuity with traditional views on God's action within the world.³⁶ Three main approaches emerged within the Divine Action Project, as follows. They are not to be considered as mutually exclusive, in that each could be considered to represent a perspective on the question.

(1) *Quantum Theory*. A number of writers within the DAP – particularly Robert John Russell and George Ellis – argued that special divine action could be conceived as taking place at the quantum level.³⁷ God can be

³⁴ See the influential article by John W. Carroll, 'The Humean Tradition', *Philosophical Review*, 99 (1990), 185-219. For his mature views, see John W. Carroll, 'Nailed to Hume's Cross', in *Contemporary Debates in Metaphysics*, ed. by Theodore Sider, John Hawthorne, and Dean W. Zimmerman (Oxford: Blackwell Publishing, 2008), pp. 67-81.

³⁵ Wesley J. Wildman, 'The Divine Action Project, 1988–2003', *Theology and Science*, 2 (2004), 31-75; quotation at p. 38. See further Thomas F. Tracy, 'Scientific Perspectives on Divine Action? Mapping the Options', *Theology and Science*, 2 (2004), 196-201. For a more critical assessment, see Nicholas Saunders, *Divine Action and Modern Science* (Cambridge: Cambridge University Press, 2002).

³⁶ Philip Clayton, 'Towards a Theory of Divine Action That Has Traction', in *Scientific Perspectives on Divine Action: Twenty Years of Challenge and Progress*, pp. 85-110.

³⁷ For a collection of essays assessing Russell's approach, see Ted Peters and Nathan Hallanger, eds., *God's Action in Nature's World* (Basingstoke: Ashgate, 2006).

understood to act in the world by determining quantum events within the ordinary probability patterns, which permit wide variation in their outcomes. Divine action could thus be envisaged in terms of God's micromanagement of otherwise indeterminate quantum processes and events, whose outcomes eventually percolate through to the macroscopic world.

- (2) *Complexity Approaches*. Divine action is here understood as God working in a 'top-down' manner, such as by influencing the boundary conditions of the natural world, or by influencing conscious embodied human beings. Arthur Peacocke was particularly influential in developing the notion of a 'top-down' causality, by which God's intentions and purposes are implemented in the shaping of particular events, or patterns of events, without any abrogation of the laws of nature.³⁸
- (3) Chaos Theory. John Polkinghorne has championed the potential for chaos theory to illuminate divine action, noting the exquisite sensitivity of chaotic systems to their initial conditions.³⁹ Although Polkinghorne recognises the potential of chaos theory as a means of positing metaphysical openness within nature, he cautions that the 'grave and unresolved difficulties of relating quantum theory to chaos theory' cannot be overlooked.

These three models of divine action have achieved prominence in recent discussions of divine action influenced by scientific considerations, and should be set alongside alternatives – such as the Pentecostal and Thomist approaches. There are clearly viable, even fruitful, options open to those wishing to defend the notion of divine action, including special divine action, in a scientific context. But what challenges do such approaches face? Two major issues emerge in discussion, and will be

³⁸ Arthur R. Peacocke, 'God's Interaction with the World: The Implications of Deterministic "Chaos" and of Interconnected and Interdependent Complexity, in *Chaos and Complexity. Scientific Perspectives on Divine Action*, ed. by Robert J. Russell, Nancey Murphy and Arthur R. Peacocke (Vatican City: Vatican Observatory, 1995), pp. 263-88. See further Taede A. Smedes, *Chaos, Complexity, and God: Divine Action and Scientism* (Louvain: Peeters, 2004), pp. 107-71. Peacocke earlier advocated an 'embodied' approach to divine causality: Arthur Peacocke, *Creation and the World of Science* (Oxford: Oxford University Press, 1979), pp. 142-207.

³⁹ Ignacio Silva, 'John Polkinghorne on Divine Action: A Coherent Theological Evolution', *Science and Christian Belief*, 24 (2012), 19-30. Polkinghorne's views on this question have shifted over time, but can be studied from John Polkinghorne, 'The Metaphysics of Divine Action', in *Chaos and Complexity: Scientific Perspectives on Divine Action*, ed. by Robert J. Russell, Nancey Murphy and Arthur R. Peacocke (Vatican City: Vatican Observatory, 1995), pp. 147-56.

considered further in this article: the notion of 'laws of nature' which govern the universe, and the question of how divine action within nature might be recognized empirically.

One of the most fundamental problems facing the notion of 'special divine action' is that this stands in apparent contradiction to the notion of the laws of nature. The Newtonian emphasis on the regularity of nature, particularly when coupled with the growing trend to conceive nature as analogous to the mechanism of a clock, created difficulties for any notion of divine intervention within the natural world. Intervention entailed disruption of the natural order. Isaac Newton thus took the view that miracles – perhaps the most familiar instance of alleged special divine action – were to be considered an impossibility. Newton had no difficulty with the idea that God has established the 'laws of nature'; he was concerned, however, over the notion that God might break these laws, in what seemed to him to be an act of potential anarchy. The 'laws of nature' thus came to be interpreted as denying causal openness in the structures of nature.

This hostility towards special divine action is clearly mirrored in Newton's religious writings. He regarded accounts of miracles in the early church as 'feigned', and argued that the biblical accounts of miracles were more concerned with the infrequency of their occurrence, rather than their supposed divine origins. And you theologians of the eighteenth century – such as Jonathan Edwards – regarded Newton's view of the world, and particularly of God as *Pantokrator*, as subversive of traditional belief, not least because of its seeming inhospitality to any notion of divine action beyond the primordial act of creation.

Yet however distasteful Newton's idea of a fixed order of nature might appear to some theologians, others found it conducive to social stability. Newton's notion of a law-giving God who created a universe which is regulated and governed in a lawlike manner was easily integrated into

⁴⁰ Peter Harrison, 'Newtonian Science, Miracles, and the Laws of Nature', *Journal of the History of Ideas*, 56 (1995), 531-53.

⁴¹ For alternative approaches which retain a degree of causal openness, see Kile Jones, 'Falsifiability and Traction in Theories of Divine Action', *Zygon*, 45 (2010), 575-89.

⁴² For a detailed analysis, see James E. Force, 'Providence and Newton's *Pantokrator*: Natural Law, Miracles, and Newtonian Science', in *Newton and Newtonianism: New Essays*, ed. by James E. Force and Sarah Hutton (Dordrecht: Kluwer, 2004), pp. 65-92.

⁴³ Avihu Zakai, *Jonathan Edwards' Philosophy of Nature: The Re-Enchantment of the World in the Age of Scientific Reasoning* (London: T & T Clark, 2010), pp. 163-205.

social, as much as scientific, thinking.⁴⁴ At a time when England had experienced intense social upheaval in the seventeenth century through the Civil War and the 'Glorious Revolution', Newton's approach seemed to offer a vision of the world in which the regularity of the natural and social orders complemented and reinforced each other. Special divine action was too easily interpreted in terms of divine interruption or dislocation of the settled physical and social order, and came to be associated with a religiously-motivated political radicalism for which eighteenth-century England had no taste. The 'laws of nature' were thus interpreted as denying causal openness in the structures of nature.

Although the 'laws of nature' were primarily conceived in relation to the physical world, writers such as William Paley emphasised the law-like patterns of behaviour observed within the biological world. Paley's notion of divine action is essentially static, framed in terms of a given, designed, unchanging order to things, established in the past. Charles Darwin's *Origin of Species* (1859) made use of the notion of the 'laws impressed on matter by the Creator', a theme which was given a significantly higher profile in the second edition of the *Origin of Species* than in the first. Darwin's approach at this point led to him being compared to Newton; just as Newton had uncovered the laws governing the worlds of astronomy and physics, so Darwin had uncovered those governing the biological world.

Such conception of the 'laws of nature' implies a causally closed world, within which special divine action is impossible. Yet is this conception right? What if we ought to think of the 'laws of nature' as descriptive, rather than prescriptive?⁴⁸ As enumerations of observations, rather than as stipulations of behaviour? The classical conception of science, which became preeminent during the Enlightenment, regarded science as the

⁴⁴ Neal C. Gillespie, 'Natural History, Natural Theology, and Social Order: John Ray and the "Newtonian Ideology", *Journal of the History of Biology*, 20 (1987), 1-49.

⁴⁵ John T. Baldwin, 'God and the World: William Paley's Argument from Perfection Tradition – A Continuing Influence', *Harvard Theological Review*, 85 (1992), 109-20.

⁴⁶ John Hedley Brooke, "Laws Impressed on Matter by the Creator"? The *Origins* and the Question of Religion, in *The Cambridge Companion to the "Origin of Species*", ed. by Michael Ruse and Robert J. Richards (Cambridge: Cambridge University Press, 2009), pp. 256-74.

⁴⁷ John F. Cornell, 'Newton of the Grassblade? Darwin and the Problem of Organic Teleology', *Isis*, 77 (1986), 405-21.

⁴⁸ There is a large literature. A good starting point is Ronald N. Giere, *Science without Laws* (Chicago: University of Chicago Press, 1999).

rational pursuit of universal laws of nature. Yet this is being increasingly challenged, not least because of the growing realization of the value-laden particulars of social constructivism which can be seen at work within the scientific enterprise. For some, the 'laws of nature' are to be seen as relations of necessity between universals;⁴⁹ for others, they are generalizations which figure in the most economical true axiomatization of all our observations of the world.⁵⁰ Serious questions arise as to whether the laws of nature can be said to 'govern' anything.⁵¹

Contemporary debates about the 'laws of nature' have moved beyond Newton's rather limited and limiting notion, all too easily linked to a deist theology and a determinist metaphysics. The regularities of nature can be affirmed without entailing either of these two unsatisfactory beliefs. One might, for example, think of Nancy Cartwright's emphasis on the natural capacities of domain-specific systems, or Peter Lipton's *ceteris paribus* laws. ⁵² Perhaps more importantly, thinking of the 'laws of nature' in regularist rather than necessitarian terms significantly diminishes the difficulties in speaking of special divine action. ⁵³ 'The validity of most laws – even of a fundamental physical kind – is compatible with the existence of exceptional situations.'⁵⁴

A second major concern arises from the question of how special divine action is to be recognized. Although this question has been given relatively little attention in recent discussions,⁵⁵ it serves to emphasise the importance of empirical observation in relation to the theme of special divine action. Can general divine action and special divine action be distinguished *empirically*? Is the concept of divine action – whether

⁴⁹ David M. Armstrong, *What Is a Law of Nature?* (Cambridge: Cambridge University Press, 1983).

⁵⁰ Frank P. Ramsey, 'Universals of Law and Fact', in *Foundations*, ed. by D. H. Mellor (London: Routledge & Kegan Paul, 1978), pp. 128-32.

⁵¹ Helen Beebee, 'The Non-Governing Conception of Laws of Nature', *Philosophy and Phenomenological Research*, 61 (2000), 571-94. For a response, see John T. Roberts, *The Law-Governed Universe* (Oxford: Oxford University Press, 2008).

⁵² On the former, see Nancy Cartwright, *The Dappled World: A Study of the Boundaries of Science* (Cambridge, UK New York, NY: Cambridge University Press, 1999); 'God's Order, Man's Order and the Order of Nature', *Euresis*, 5 (2013), 99-108. On the latter, see Peter Lipton, 'All Else Being Equal', *Philosophy*, 74 (1999), 155-68.

⁵³ As pointed out by Nicholas Saunders, *Divine Action and Modern Science*, p. 62.

⁵⁴ Max Kistler, 'Laws of Nature, Exceptions and Tropes', *Philosophia Scientiae*, 7 (2003), 189-219; quotation at p. 192.

⁵⁵ See, for example, Paul Gwynne, *Special Divine Action: Key Issues in the Contemporary Debate, 1965-1995* (Rome: Pontificia Università Gregoriana, 1996), pp. 133-8.

special or general – an objective reality or a subjective perception?⁵⁶ There are certainly concerns about whether the distinction can be maintained beyond the level of normative definition. The concern here, however, goes deeper. How are we to understand the relation between theological depictions of the world as the locus of divine action and scientific descriptions of the world as an intelligible structure of natural law, based on empirical observation?

Divine action – whether special or general – is not *observed*, precisely because it is not *observable*. Events in the natural world are observed, which may be – but do not necessarily demand to be – interpreted as instances of divine action, whether general or special. The distinction between the two types of divine action is either to be grounded in the realm of theological *a priori*, or as a matter of intuition. The distinction between special and general divine action is somewhat intuitive. General divine action is normally intuited to mean something like God's 'usual' activity in creating and sustaining the whole world, including the establishment of the laws of nature. Special divine action could be defined in terms of God's 'extraordinary' or particular providential activity within the world, especially as it affects the course of human history and the lives of individual people. These distinctions do not arise, necessarily or plausibly, from the empirical observation of the natural world.

The language of special divine action is difficult, and perhaps impossible, to translate into the language and conceptualities of the natural sciences. Inevitably, this leads to the suggestion that contemporary debates about scientific perspectives on special divine action essentially amount to attempts to accommodate an essentially theological – and non-empirical – notion within the conceptual interstices of a scientific understanding of the world. They add nothing to a scientific understanding of the world, and risk being seen merely as a parallel way of conceiving the world, along the lines of the unhelpful framework of 'non-overlapping magisteria' proposed by Stephen Jay Gould.⁵⁷

Both these questions are capable of being engaged more fully, and we can look forward to some important discussions in the future. Yet we must now turn to a relatively neglected theme, as we consider how

⁵⁶ Paul Gwynne, *Special Divine Action*, p. 33. The 'subjective perception' thesis is developed in detail in Maurice F. Wiles, *God's Action in the World* (London: SCM Press, 1986).

⁵⁷ Stephen Jay Gould, 'Nonoverlapping Magisteria', *Natural History*, 106 (1997), 16-22.

certain theological developments have had a significant impact on this discussion.

III. THEOLOGICAL CONCERNS ABOUT SPECIAL DIVINE ACTION

Earlier in this chapter, we noted Isaac Newton's reluctance to allow any form of divine intervention within the world. In part, this reflects his views on the causal structures of the world, expressed in his laws of motion. Yet it is important to note that Newton vigorously rejected a notion of God which entailed action within the world – namely, a Trinitarian conception of God. Newton's anti-Trinitarianism became well-known after his death, although he went to some pains to conceal it during his own lifetime. Sh Although scholars have tended to focus on the rational and scientific motivations for this outlook, it is important to emphasise that this emphasis on the *foundations* of Newton's anti-Trinitarianism have led to a failure to deal adequately with its *consequences*.

Newton's views were, in certain ways, typical of his age. Most leading theologians of the seventeenth century seem to have held on to the doctrine of the Trinity out of respect for tradition,⁵⁹ while privately conceding that it seemed irrational in the light of the growing emphasis upon the 'reasonableness of Christianity', and that it seemed to provide little in the way of spiritual or theological benefits.⁶⁰ While simplifications are dangerous, defence of this doctrine seems to have been seen as being little more than a formal expectation on the part of orthodox theologians.

Why is this observation important? Because the doctrine of the Trinity provided an intellectual framework that safeguarded an active conception of God, providing a bulwark against a reduced generic notion of divinity which limited action to the creation and ordering of the world. The twentieth-century theologian Emil Brunner spoke of the Trinity as a 'security doctrine (*Schutzlehre*)', protecting Christian theology against deficient notions of God.⁶¹ The theological generations to follow Newton

⁵⁸ The best study is Scott Mandelbrote, 'Eighteenth-Century Reactions to Newton's Anti-Trinitarianism', in *Newton and Newtonianism: New Studies*, pp. 93-112.

 $^{^{59}}$ Philip Dixon, Nice and Hot Disputes: The Doctrine of the Trinity in the Seventeenth Century (London: T & T Clark, 2003).

⁶⁰ Paul Chang-Ha Lim, *Mystery Unveiled: The Crisis of the Trinity in Early Modern England*, Oxford Studies in Historical Theology (New York: Oxford University Press, 2012).

 $^{^{61}}$ Emil Brunner, $Dogmatik\ I:$ $Die\ christliche\ Lehre\ von\ Gott$ (Zürich: Zwingli-Verlag, 1959), p. 206.

tended to adopt an essentially deist notion of God in their public defence of Christianity. Having set to one side an incarnational notion of God entering into the world, and any notion of the Holy Spirit as God's activity within the world, they were left with the notion of a God who designed and created the world, and thereafter ceased to be involved in it.

This is perhaps seen most clearly in William Paley's *Natural Theology* (1802), which speaks of God as an 'artificer' – that is, someone who designs and creates – but which pointedly declined to allow any further divine involvement with the natural order, even if this seemed to evacuate the concept of providence of any meaning. Paley was fascinated with the intricate structures of the human body and other biological organisms;⁶² nevertheless, he interpreted this in terms of God's past activity, which was taken to imply God's continuing existence. Paley's lack of interest in the concept of the Trinity – which, it must be noted, was representative of his age – denied him access to a concept of God which affirmed ongoing divine presence and activity within the world.

Today, the doctrine of the Trinity is central to Christian theological discourse. The work of theologians such as Karl Barth and Karl Rahner has led to a major exercise of theological retrieval, in which the doctrine of the Trinity has been reaffirmed, along with its implications for divine action and presence within the world.⁶³ As we saw earlier, Christianity has always known and affirmed God as one who acts within the world; the problem was that the theology of the modern period adopted a rationally maximised notion of God which secured cultural compliance and conformity at the price of suppressing any expectation that God might act. The emergence of the Pentecostal movement in the twentieth century represents a further correction of this inadequate means of conceiving God.

So where does this leave us? It does not resolve the intellectual issues that we have noted in this paper about the plausibility of the notion of special divine action. Nevertheless, it does present us with a vision of God which encourages us to expect such action, and hence be more responsive towards developing frameworks within which such action may be accommodated.⁶⁴ It also provides a framework for integrating

⁶² Fernando Vidal, 'Extraordinary Bodies and the Physicotheological Imagination', in *The Face of Nature in Enlightenment Europe*, ed. by Lorraine Daston and Gianna Pomata (Berlin: Berliner Wissenschafts-Verlag, 2003), pp. 61-96.

⁶³ See Stephen T. Davis, Daniel Kendall, and Gerald O'Collins, eds., *The Trinity: An Interdisciplinary Symposium on the Trinity* (Oxford: Oxford University Press, 2002).

general and special divine action, holding them together as notionally distinguishable yet functionally inseparable aspects of God's relationship with the world.

Yet there remain questions about the traction of a Trinitarian notion of God within western culture in general, and popular Christian culture in particular. Is this retrieval of Trinitarianism limited to academic theology, or has it a wider impact in popular Christianity? It is important to note that there are good reasons for thinking that a generalized and generic deism – similar to that of the 'Age of Reason' – has gained considerable influence in the west since the Second World War, partly as a means of positioning Christianity, Judaism, and Islam within a common theological matrix that enabled maximal social inclusivity.

Robert Bellah's observations about the emergence of 'American civil religion' during the 1960s should be noted here.⁶⁵ The phenomenon of civil religion requires maximum commonality, which in turn leads to an emphasis on the 'lowest common denominator' of religions and a corresponding de-emphasis of the distinctive features of – for example – a Trinitarian concept of God. This is not a cultural innovation, in that one of the original motivations for embracing a minimalist deism in seventeenth and eighteenth-century Europe was its potential for maximizing religious and social cohesion within religiously divided or variegated contexts.⁶⁶ This 'civil religion' prefers to think of God as a moral legislator, rather than as someone who actively intervenes in the natural or social processes.⁶⁷

A more recent development within American popular culture has been the adoption of what some have called a 'moralistic therapeutic deism' on the part of some younger Christians.⁶⁸ This understanding

⁶⁴ See the points made in Christoph Schwoebel, *God: Action and* Revelation (Kampen: Kok Pharos, 1992), pp. 42-4; Andreas Loos, 'Divine Action and the Trinity: A Brief Exploration of the Grounds of Trinitarian Speech About God in the Theology of Adolf Schlatter', *International Journal of Systematic Theology*, 4 (2003), 255-77.

⁶⁵ Robert Bellah, 'Civil Religion in America', Daedalus, 96 (1967), 1-21.

⁶⁶ Ronald Beiner, 'Machiavelli, Hobbes, and Rousseau on Civil Religion', *Review of Politics*, 55 (1993), 617-38. Note also the issues explored by Patrick Giddy, 'Special Divine Action and How to Do Philosophy of Religion', *South African Journal of Philosophy*, 30 (2011), 143-54.

⁶⁷ See further Robert Corfe, *Deism and Social Ethics: The Role of Religion in the Third Millennium* (New York: Arena Books, 2007).

⁶⁸ This phrase was introduced by the sociologists Christian Smith and Melina Lundquist Denton, *Soul Searching: The Religious and Spiritual Lives of American Teenagers* (New York: Oxford University Press, 2005), pp. 118-71.

of religion as a positive moral and therapeutic factor in life tends to marginalize the creedal and theological dimensions of faith, and speaks of divine intervention primarily – though not exclusively – in terms of the correction or amelioration of personal narratives. It remains unclear what the longer term influence of this trend may be, both in terms of its cultural influence and its potential impact on a future generation's reflections on the notion of special divine action.

CONCLUSION

The new interest in special divine action has led to a close reading of the great debates and discussions of the early modern period in an attempt to understand contemporary resistance to the notion of divine action, and to develop strategies for reaffirming the notion in a refined manner. Although continuing engagement with and evaluation of the Humean legacy on miracles and divine action will be of central importance to this programme of review, there are other issues that also need to be addressed. This article has tried to identify some of the factors that have caused or continue to cause difficulties for the articulation of a concept of special divine action and how they might be engaged, as a means of encouraging the conversation to move beyond the framework of the 'Divine Action Project' into new approaches and paradigms.

THE MANY PROBLEMS OF SPECIAL DIVINE ACTION

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Abstract. Special divine action is an integral part of the Christian worldview. In fact, the plausibility of the Christian worldview depends on and is grounded in the putative reality, and therefore possibility, of special divine action. Without special divine action, Scripture does not make sense, and without Scripture, Christianity neither. However, the possibility of special divine action is highly contested in almost every field of human enquiry. In what follows, I briefly suggest a minimal definition of special divine action and show its indispensability for the internal plausibility of Christian faith. I then argue against the very possibility of special divine action. I end by way of identifying ways in which Christian theologians can respond to the arguments in order to justify the possibility of special divine action. It turns out that special divine action neither contradicts science nor metaphysics.

Special divine action is an integral part of the Christian worldview. In fact, the plausibility of the Christian worldview depends on and is grounded in the putative reality, and therefore possibility, of special divine action. Without special divine action, Scripture does not make sense, and without Scripture, Christianity neither. However, the possibility of special divine action is highly contested in almost every field of human enquiry. In what follows, I briefly suggest a minimal definition of special divine action and show its indispensability for the internal plausibility of Christian faith. I then argue against the very possibility of special divine action. I end by way of identifying ways in which Christian theologians can respond to the arguments in order to justify the possibility of special divine action. It turns out that special divine action neither contradicts science nor metaphysics.

¹ Of course, in making this claim I do not wish to exclude the importance of special divine action for other religions like Judaism or Islam. Christian faith, though, is a particularly rich tradition concerning the analysis of special divine action.

I. THE INDISPENSABILITY OF SPECIAL DIVINE ACTION

Here are some assumptions I take for granted: First, a state of affairs S is constituted by a particular p, a property F and a point of time t. The obtaining of S at t consists in p's exemplifying F at t. Second, a possible world w is a maximally consistent state of affairs. Third, the history h of a possible world w at t is the temporally ordered class of all states of affairs that obtain in w prior to and including t. A future f of a possible world w is the temporally ordered class of all states of affairs that obtain posterior to t. Fourth, the actual world @ is the only obtaining maximal consistent state of affairs. Fifth, as the purpose of this paper is to analyse the possibility of special divine action and not to argue for the existence of God per se, I assume that the existence of the actual world is contingent and presupposes an ultimate and supernatural ground of its existence that properly is referred to as 'God'.²

General and Special Divine Action

I assume the following minimal definition of general divine action: G is a general divine action if and only if G is an action that God engages in at every moment of existence of the actual world. The very existence of the actual world, therefore, is the effect of God's general action: out of the infinity of possible worlds, God chooses one world to be the actual world by way of holding it in existence at every point of time of its existence. Without God's general action, the actual world would not exist.³ In contrast to general divine action, special divine action could, in a first attempt, be defined as follows: A is a special divine action if and only if A is God's actualisation of a *particular* state of affairs S at some point of time t in the actual world.

However, based on the proposed definitions we obtain the following problem: if general divine action consists in God's actualizing a possible world, then God is *eo ipso* causally responsible for the obtaining of each and every state of affairs S in the actual world. After all, a possible world

² Cf. Mautner (1996: 416). For an analysis of the different ways in which the term "God" is used, and for an analysis of the structure of arguments for and against the existence of God, see Göcke (2013). For further analysis of the ontology of possible worlds cf. Göcke (2014a).

³ Cf. Kraay (2008) for an argument to the effect that God cannot be the creator of the world because God neither has a sufficient reason to create a particular world instead of another nor is able to rely on a randomizing device in order to chose which world to create.

is nothing over and above a maximal consistent state of affairs: in order to actualise a possible world w, God has to actualise every state of affairs S that constitutes w. It follows that in the situation at hand the concept of special divine action is absorbed by the concept of general divine action. Occasionalism follows immediately since God would be the only acting agent.

In order to be able to distinguish between general and special divine action (and in order to avoid occasionalism), we have to find a way of understanding special divine action as something *in addition to* God's general action of actualising every state of affairs that is part of the actual world. To do so, we have to assume that God's general action of creating the world is such that it bestows autonomy to the actual world, i.e. a tendency to stay in existence and to direct itself.⁴ More technically, although God's general action holds the world in existence at every point of time, it is nevertheless true that for each point of time t of the actual world, there is a future f of @ that is accountable purely in terms of the history of @ at t.⁵

Based on the assumption of an autonomous world, we can formulate the following minimal definition of special divine action: A is a special divine action if and only if A is God's supernatural actualisation of a state of affairs S at t the obtaining of which was not entailed by the history h of @ at t, whereas S is not entailed by h if and only if there is a future f of the actual world in which S does not obtain. This definition is minimal because any account of special divine action – no matter which further conditions it imposes on special divine action – has to presuppose that a special divine action at least has the features suggested.⁶

Interventionist and Non-Interventionist Accounts of Special Divine Action

We can specify the relation between general and special divine action as follows: God's general action is God's creation of an autonomous world, and if there is special divine action, then at least sometimes God supernaturally actualises a state of affairs S at t the obtaining of which was not entailed by the prior history of the actual world up to

⁴ This is, of course, what Thomas had in mind when he distinguished between primary and secondary causes. See, for instance, Thomas' Summa Theologica, 1q 105 and Griffin (2014: 56/57)

⁵ For an analysis of occasionalism, cf. Perler/Rudolph (2000), Clayton (2008: 120) and Murphy (1995: 332).

⁶ Cf. Alston (1999: 185) and Schwöbel (1992: 36).

and including t. Like a piano player whose left hand constantly plays the same chord, God's special divine actions can be seen as his right hand adding now and then some fine tunes in order to create the overall melody of creation.

Recently a distinction was introduced between so-called interventionist and non-interventionist accounts of special divine action. The distinction, however, is dim and hard to justify. It often seems to be entirely artificial. Here is why: non-interventionists suppose that the ontological gaps associated with some metaphysical interpretations of modern scientific theories, like chaos theory or quantum mechanics, provide a legitimate loophole for God to act in a way that is consistent with the development of the natural order itself.⁷ In contrast, interventionism is said to entail that God's special actions are violations of the natural order of causes.8 This, though, only follows on the further assumption that interventionism, in contrast to non-interventionism, is committed to a deterministic interpretation of the natural order of causes.9 Without this assumption, the distinction between non-interventionism and interventionism collapses. Since interventionism is not committed to a deterministic interpretation of the natural order of causes it follows that the distinction between interventionism and non-interventionism is without support. In fact, even if there was a substantial difference, both interpretations presuppose the suggested minimal definition of special divine action. On both accounts, a special divine action is a supernatural intervention in the actual world that actualises a state of affairs S at t the obtaining of which was not entailed by the history of the actual world up to and including t.10

The Indispensability of Special Divine Action for Christian Faith

Special divine action is indispensable for Christian faith. The Bible is full of references that depict God as actively involved in the history and fate of His people by way of actualizing particular states of affairs the obtaining of which was not entailed by the prior history of the world. Just to mention two prominent examples:

⁷ Cf. Wegter-McNelly (2009: 162-163).

⁸ Cf. Wegter-McNelly (2009: 161).

⁹ Cf. Ward (2007: 119).

¹⁰ Cf. for instance, Murphy (1995: 342).

First, the separation of the Red Sea is described as follows:

Then Moses stretched out his hand over the sea; and the LORD drove the sea back by a strong east wind all night, and made the sea dry land, and the waters were divided. And the people of Israel went into the midst of the sea on dry ground, the water being a wall to them on their right hand and on their left. [...] Then the LORD said to Moses, 'Stretch our your hand over the sea, that the water may come back upon the Egyptians, upon their chariots, and upon their horsemen.' So Moses stretched forth his hand over the sea, and the sea returned to its wonted flow when the morning appeared, and the Egyptians fled into it, and the LORD routed the Egyptians in the midst of the sea.' (Exodus 14, 21-27)

It is clear that in this passage God is described as engaging in special divine action: God actualises a state of affairs – the separation of the Red Sea – that otherwise had not occurred and that was not accountable for in terms of the history of the actual world up to that point of time. Furthermore, God did so on purpose, in order to save His people, and the impossibility of special divine action would destroy the very reliability of Scripture as a story of God's loving relation to His people.

Second, assuming that the resurrection of Christ is *the* paradigmatic special divine action, the New Testament itself is as clear as one could wish that the possibility of special divine action is a necessary condition for the plausibility of Christian faith. As Paul argues:

Now if Christ is preached as raised from the dead, how can some of you say that there is no resurrection of the dead? But if there is no resurrection of the dead, then Christ has not been raised; if Christ has not been raised, then our preaching is in vain and your faith is in vain. We are even found to be misrepresenting God, because we testified of God that he raised Christ, whom he did not raise if it is true that the dead are not raised. For if the dead are not raised, then Christ has not been raised. If Christ has not been raised, your faith is futile and you are still in your sins. Then those also who have fallen asleep in Christ have perished. If for this life only we have hoped in Christ, we are of all men most to be pitied.' (1 Corinthians 15. 12-19)

Paul explicitly states with logical rigour that without the resurrection of Christ, Christian faith is in vain and those who follow Christ are to be pitied.

Therefore, since 'from the call of Abraham and the Exodus from Egypt to the birth, ministry, death, and raising of Jesus and the founding of the church at Pentecost, God is represented as making new things happen' (Russell 1998: 191) we can conclude that special divine action is an indispensable part of Christian faith itself: if special divine action is impossible, then there is no point in being a Christian at all.¹¹

II. THE IMPOSSIBILITY OF SPECIAL DIVINE ACTION

There are several arguments against the possibility of special divine action. In what follows, I ignore basic arguments that are directed against the existence of God, or against the intelligibility of the very idea of a God acting in history. Although it is an important task for Christian philosophers to argue for the existence of God, I focus on arguments that show that even if there is no conceptual problem with an acting God as such, special divine action is nevertheless impossible.

The Argument from Causal Closure

The first argument against the possibility of special divine action is based on the assumption that the actual world is a causally closed system that excludes any non-physical intervention. Although there are different versions of causal closure discussed, the general idea is that the actual world is causally closed because every obtaining state of affairs S has a purely physical causal history that is responsible for S's obtaining. As Clayton (2008: 135) says, 'a basic assumption of many modern physicists is that physical systems are closed to causal interventions from outside (the principle of the conservation of energy).'12 In case of determinism, causal closure states that there is a *sufficient* physical causal history for every obtaining state of affairs. In case of indeterminism, causal closure 'would say that the *chances* of physical effects are always fully fixed by their prior physical histories' (Papineau 2002: 17 FN).¹³

Since a special divine action is a supernatural, and therefore a nonphysical intervention in the actual world we obtain the following conclusion: if the actual world is causally closed, then special divine

¹¹ Cf. Cobb (1973: 207).

¹² Cf. Papineau (2002: 17), Papineau (2000), Göcke (2008) and Lowe (2008).

¹³ Cf. Plantinga (2011: 92-93).

action is impossible. It would be a supernatural actualisation of a state of affairs S the causal history of which was not completely physical. As it were, God pushed too hard on the autonomy of the actual world and created a world that at any point of time t has a future that is accountable for purely in terms of the world's history. Therefore, since the actual world is causally closed, special divine action is impossible. As Saunders (2000: 518) says: 'The causally closed view of science in which every event leads to another seems to many to leave no room for God at all.'¹⁴

The Argument from Determinism

The second argument against the possibility of special divine action does not focus on the causally closed nature of the actual world. Instead it assumes that independent from whether a supernatural intervention as such is possible, special divine action is impossible for quite another reason: it is impossible because the actual world is a deterministic world.

Determinism entails that there are no two possible worlds w and w* that share the same history h at t but differ in respect to their future f. In a deterministic world w, the history at t can be addressed as the sufficient cause of the future of w. As Schaffer (2007: 115) states: 'A world w is deterministic iff: for all times t in w, the total occurent history of w supervenes on the occurent state of w at t together with the laws of w.'15 Since a special divine action is God's actualisation of a state of affairs S that was not entailed to obtain by the history of the world at any arbitrarily chosen point of its history prior to S's obtaining, it follows that special divine action is impossible because the actual world is a deterministic world.

The Argument from Laws of Nature

A third argument against the possibility of special divine action is based on the assumption that the possibility of special divine action contradicts the intelligibility of the world because it contradicts the existence of the laws of nature – no matter whether these are thought of as deterministic or indeterministic. Although the discussion concerning the semantics and ontology of the laws of nature is far from being unanimous, Craver provides a useful summary of some of the most important features

¹⁴ Cf. also Pollard (1958: 12).

¹⁵ Cf. also Earman (1986: 13) and Laplace (1951: 4)

of what the laws of nature are supposed to be. They are '(1) logically contingent, (2) true (without exception), (3) universal generalisations, that are (4) unlimited in scope and (5) hold by physical necessity' (Craver 2007: 56-57). The laws of nature thus understood enable us to explain the past and to predict the future. They are what accounts for the intelligibility of the actual world.

However, if special divine action is possible, then no laws of nature can exist because in this case there is no exceptionless and true universal generalisation that accounts for the history and the future of the actual world. As a consequence, the way the world works would remain unintelligible to us because God could intervene at arbitrary points of time in the future, and could have done so in the past. Therefore, if special divine action is possible, laws of nature are impossible. Since there are laws of nature, it follows that special divine action is impossible.

The Argument from Scientific Evidence

A fourth argument is not directed against the possibility, but against the actuality of special divine action. It is based on the following assumption: if the obtaining of a state of affairs S at t is due to special divine intervention, then there has to be scientific evidence that S is due to divine intervention. There is no scientific evidence, however, for any kind of divine intervention in the actual world. As Papineau (2002: 253) argues, 'detailed modern research has failed to uncover any [...] anomalous physical processes. [...] If there were such [non-physical] forces, they could be expected to display some manifestation of their presence. But detailed [...] investigation failed to uncover evidence of anything except familiar physical forces.' Therefore, based on the absence of scientific evidence, we have to conclude that there is no special divine action: if there was, science would by now have told us. As Clayton (2008: 219) says, 'scientific research has not provided evidence that God did, or does, bring about miracles in the natural world. [...] Worse, the basic methodology of science seems to stand opposed to even the possibility of such events.'

The Argument from Evil

A last argument against the possibility of special divine action is based on the assumption that there is a huge amount of *unnecessary* and thus *purposeless* evil and suffering in the world. However, if God exists and *is*

able to act in the world, and if God is omniscient, morally perfect, and omnipotent, then He is morally obliged to intervene in order to prevent unnecessary evil and suffering in the world. This, though, is not what we observe: God does not prevent unnecessary evil and suffering. ¹⁶ The best explanation for this fact is that – *for whatever reason* – God simply cannot act in the world. If He could, He would. Therefore, given the huge amount of unnecessary suffering and evil in the world, it follows that God cannot act in the world.

There is no Point in Being a Christian

God cannot create a world that is self-directed while at the same time open to supernatural intervention. Even if He could create such a world, the apparent amount of unnecessary suffering and evil shows that *for whatever reason* God cannot act in the actual world in order to prevent unnecessary evil and suffering. Since the possibility of special divine action is an indispensable part of Christian faith, there is no point in being a Christian.

III. SPECIAL DIVINE ACTION AND THE CHRISTIAN WORLDVIEW

In what follows I indicate ways in which the above arguments can be criticised from a Christian point of view.¹⁷ A first and general point to be noted concerns the relation between special divine action and human free action, understood in a libertarian sense. Since apart from the argument from evil, each argument not only entails the impossibility of special divine action, but also the impossibility of libertarian free human action, it follows that any theistic metaphysics allowing for free human action also allows for special divine action. In a theistic paradigm, human free action is possible if and only if special divine action is possible.

Causal Closure Reconsidered

Although the causal closure of the actual world is an often-met assumption in the philosophy of mind and philosophy of religion, it is by no means an uncontroversial assumption. First of all, causal closure itself is not a metaphysically necessary assumption, and it is neither a scientific

¹⁶ Cf. Clayton (2008: 218).

¹⁷ Cf. Göcke (2014b).

assumption: it is neither a consequence, nor a presupposition of science itself. Instead, it is a philosophical assumption that belongs to an atheistic and naturalistic worldview. Science might as a methodological restraint suppose that it should look for physical causal histories whenever it wants to explain the obtaining of a particular state of affairs, but as soon as scientists assume that it is a metaphysical principle that there can only be physical causes, they leave the realm of science and enter metaphysical territory. As Polkinghorne (2006: 67) argues, 'it is clear that physical closure of the causal nexus of the world has not been established, so that claims that science has disproved the possibility of providential agency can be seen to be false. Belief in divine action is no more necessarily negated by an honest science than is belief in free human agency.'

Determinism Reconsidered

In order to refute the argument from determinism one has to show that the actual world is not a deterministic world. In order to do so, we can rely on two sources: first we can rely on arguments according to which human beings can engage in rational discussion. Since the very idea of rational argumentation presupposes that determinism is false, and since any argument for determinism presupposes the possibility of rational argumentation, it follows that determinism is transcendentally selfrefuting. Second, although there is an often-mentioned relation between classical physics and determinism, we can rely on recent developments in physics that presuppose that the actual world is an indeterministic world: As Russell states, 'the total set of natural conditions affecting some process [on the quantum level], and thus the total possible set of conditions which science can discover and describe through its equations, are necessary but insufficient to determine the precise outcome of the process. The future is ontologically open, influenced but under-determined by the factors of nature acting in the present' (Russell 1998: 203).

Laws of Nature Reconsidered

The discussion concerning the scope of the laws of nature often puts the cart before the horse. The only reason to assume that the laws of nature are exceptionless in respect to their predictive and explanatory power is that one yet already assumes that they are descriptions of physical processes in a world devoid of freedom and intervention. Of course,

if right from the start one assumes that there can be laws of nature if and only if there is no freedom, then genuine interventions in the actual world that are not covered by the laws of nature would destroy the very plausibility of our understanding of the fundamental nature of the actual world. However, if we suppose that laws of nature are ceteris paribus descriptions of idealized systems the actual predictive and explanatory power of which depends on whether there is an intervention, then the problem vanishes at once. Although there are laws of nature that regulate what happens in the actual world, not everything that happens is regulated by the laws of nature.¹⁸

Evidence Reconsidered

Although there is no positive scientific evidence that the obtaining of a certain state of affairs S is due to special divine action, there is neither scientific evidence that the obtaining of a state of affairs S* is due to free will. All this, though, is only a problem if one assumes the following further principle: if there is no scientific evidence for p, then p does not exist. However, since this assumption is not a scientific assumption itself, and since there are no convincing arguments to adopt such a restrictive and positivistic philosophy of science, it follows that there is no need for the Christian to share it.

Apart from the fact that the absence of scientific evidence for special divine action is not sufficient to draw the conclusion that there is no special divine action, there is another reason according to which science could not even in principle provide evidence for special divine action: scientific research assumes that, by definition, 'anything that can move a physical thing is itself a physical thing (although perhaps a strange and heretofore unstudied kind of physical thing)' (Dennett 1991: 35). As Lowe states the same point, physics assumes that 'anything which *can* exert a force on physical objects, that is, which can do work on a physical system, is *ipso facto* something "physical" and the force it exerts is consequently a "physical" one. The very definition of the "physical" [...] is that it is something capable of exerting force, or equivalently of doing work or contributing energy to a system' (Lowe 1996: 61). If this is true, then by definition physics cannot discover anything that from a metaphysical point of view could be addressed as a special divine action.

¹⁸ Cf. Foster (1934: 465).

Evil Reconsidered

The problem of evil is the most pressing one. Whereas normally the existence of evil and suffering is used to show that an omnipotent, omniscient, and morally perfect being cannot be the creator of the actual world, our discussion of the argument is based on the assumption that such a being exists. A defence of the possibility of special divine action therefore has to show that either there is no unnecessary evil and suffering in the world or else has to show that there is no moral obligation to prevent the existence of unnecessary evil and suffering. Since it seems to be a conceptual truth that an omnipotent, omniscient and morally perfect creator of the world would prevent unnecessary evil and suffering – that is, suffering that serves no purpose at all – it seems plausible for the Christian philosopher to reject the assumption that there is unnecessary evil and suffering in the world.

If there is no unnecessary evil and suffering, then it follows that every occurring evil and suffering has a purpose. Whereas some may argue that this is a cynical conclusion given the huge amount of suffering and evil in the world that *appears to us* to be without a purpose, the Christian philosopher can point out that in God's providential plan no one, ultimately, suffers without a purpose. This seems to be an existentially tenable view of the world if the alternative is a naturalistic and atheistic worldview according to which people suffer without no purpose at all.

The Possibility of Special Divine Action

None of the arguments presented against the possibility of special divine action is decisive. The argument from determinism is not sound because science itself supposes that the world is indeterministic. The argument from laws of nature, the argument from evidence, and the argument from causal closure are not sound because they presuppose a philosophy of science that is attractive only for those yet already operating in an atheistic and naturalistic framework. The argument from evil supposes that there is suffering and evil without a purpose, an assumption that the Christian does not of necessity share. In sum, then, although there are prima facie sound arguments against the possibility of special divine action, none of the arguments is ultimately convincing. Christians can firmly believe in the possibility of special divine action without contradicting science or metaphysics.

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BIBLIOGRAPHY

- Alston, William P. 1999. 'Divine Action, Human Freedom, and the Law of Nature', in Robert John Russell, et al. (eds), *Quantum Cosmology and the Laws of Nature: Scientific Perspectives on Divine Action* (Vatican: Vatican Observatory Publications), pp. 185-206
- Clayton, Philip. 2008. Adventures in the Spirit: God, World, Divine Action (Minneapolis: Fortress Press)
- Cobb, John B. 1973. 'Natural Causality and Divine Action', *Idealistic Studies*, 3: 207-222
- Craver, Carl F. 2007. 'Structures of Scientific Theories', in Peter Machamer and Michael Silberstein (eds), *The Blackwell Guide to the Philosophy of Science* (Oxford: Blackwell Publishing), pp. 55-79
- Dennett, Daniel. 1991. Consciousness Explained (New York: Back Bay Books)
- Earman, John. 1986. *A Primer on Determinism* (Dordrecht: D. Reidel Publishing)
- Foster, Michael B. 1934. 'The Christian Doctrine of Creation and the Rise of Modern Science', *Mind*, 43: 446-468
- Göcke, Benedikt Paul. 2008. 'Physicalism Quaerens Intellectum', *The Philosophical Forum*, 39 (4): 463-468
- Göcke, Benedikt Paul. 2013. 'An Analytic Theologian's Stance on the Existence of God', European Journal for Philosophy of Religion, 5 (2): 129-146
- Göcke, Benedikt Paul. 2014. *A Theory of the Absolute* (Basingstoke: Palgrave Macmillan)
- Göcke, Benedikt Paul. 2015. 'Did God do it? Metaphysical Models and Theological Hermeneutics', *International Journal for Philosophy of Religion*, 78 (2): 215-231
- Griffin, David Ray. 2014. Panentheism and Scientific Naturalism: Rethinking Evil, Morality, Religious Experience, Religious Pluralism, and the Academic Study of Religion (Claremont, California: Process Century Press)
- Hume, David. 1848. Philosophical Essays concerning Human Understanding (London: A. Millar)
- Kraay, Klaas J. 2008. 'Can God choose a world at random?', in Yujin Nagasawa and Eric Wielenberg (eds), *New Waves in Philosophy of Religion* (Basingstoke: Palgrave Macmillan), pp. 22-35
- Laplace, P.-S. 1951. A Philosophical Essay on Probabilities (New York: Dover)

- Lowe, E. J. 1996. Subjects of Experience (Cambridge: Cambridge University Press)
- Lowe, E. J. 2008. *Personal Agency: The Metaphysics of Mind and Action* (Oxford: Oxford University)
- Mautner, Gareth (ed.). 1996. A Dictionary of Philosophy (Oxford: Blackwell)
- Murphy, Nancey. 1995. 'Divine Action in the Natural Order: Buridan's Ass and Schröder's Cat', in Robert John Russell (ed.), *Chaos and Complexity: Scientific Perspectives on Divine Action* (Vatican: Vatican Observatory Publications), pp. 325-357
- Papineau, David. 2000. 'The Rise of Physicalism', in M. W. F. Stone and Jonathan Wolff (eds), *The Proper Ambition of Science* (London: Routledge)
- Papineau, David. 2002. *Thinking about Consciousness* (Oxford: Oxford University Press)
- Perler, Dominik, and Ulrich Rudolph. 2000. Occasionalismus: Theorien der Kausalität im arabisch-islamischen und im europäischen Denken (Göttingen: Vandenhock & Ruprecht)
- Plantinga, Alvin. 2011. Where the Conflict Really Lies: Science, Religion, and Naturalism (Oxford: Oxford University Press)
- Polkinghorne, John C. 2006. 'Christianity and Science', in Philip Clayton and Zachary Simpson (eds), *The Oxford Handbook of Religion and Science* (Oxford: Oxford University Press), pp. 57-70
- Pollard, William G. 1958. Chance and Providence: God's Action in a World Governed by Scientific Law (London: Faber and Faber)
- Russell, Robert John. 1998. 'Special Providence and Genetic Mutation: A New Defense of Theistic Evolution', in Robert John Russell, et al. (eds), Evolutionary and Molecular Biology: Scientific Perspectives on Divine Action (Vatican: Vatican Observatory Publications), pp. 191-223
- Saunders, Nicholas T. 2000. 'Does God Cheat at Dice? Divine Action and Quantum Possibilities', *Zygon*, 35 (3): 517-544
- Schaffer, Jonathan. 2007. 'Deterministic Chance?', British Journal for the Philosophy of Science, 58: 113-140
- Schwöbel, Christoph. 1992. God: Action and Revelation (Kampen: Kok Pharos)
- Ward, Keith. 2007. Divine Action (Conshohocken: Templeton Foundation Press)
- Wegter-McNelly, Kirk. 2009. 'Fundamental Physics and Religion', in Philip Clayton and Zachary Simpson (eds), *The Oxford Handbook of Religion and Science* (Oxford: Oxford University Press), pp. 156-171

MIRACLES ARE NOT VIOLATIONS OF THE LAWS OF NATURE BECAUSE THE LAWS DO NOT ENTAIL REGULARITIES

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Abstract. Some have tried to make miracles compatible with the laws of nature by re-defining them as something other than interventions. By contrast, this article argues that although miracles are divine interventions, they are not violations of the laws of nature. Miracles are also not exceptions to the laws, nor do the laws not apply to them. The laws never have exceptions; they never are violated or suspended, are probably necessary and unchangeable, and apply also to divine interventions. We need to reconsider not miracles but laws. The main claim of this article is that laws of nature do not entail regularities, and therefore that miracles do not violate the laws. We need a new theory of the laws of nature: the tendency theory.

I. THE IDEA OF MIRACLES AS VIOLATIONS OF THE LAWS

The claim that miracles, or divine interventions in general, are impossible has been exceedingly influential. This claim was used by atheists in order to criticise theism, and led theologians to deny the occurrence of miracles and to re-interpret miracles as something other than divine interventions. Further, it moved many to assume that, although there is a God, in order to create the animals he never intervened, perhaps not even in order to create the first animal. This claim is also connected to the definition of miracles as 'violations of the laws of nature,' which led some to believe that miracles are impossible and others to believe that, although miracles are possible, they are exceptions to the laws and they are the only exceptions. The arrival of the idea of probabilistic laws and processes through quantum mechanics made some authors think that

these revisions finally show that there is room for miracles in the causal order of the world – assuming that if the laws were not probabilistic, then there would be no room for miracles.¹

Let me illustrate this attitude with some quotations. Spinoza (1632–1677) claimed,

Nothing, then, happens in nature which is in contradiction with its universal laws. [... She] preserves a fixed and immutable course. [...] A miracle, whether contrary to nature or above nature, is a sheer absurdity; and therefore that by a miracle in Holy Writ we are to understand nothing more than a natural phenomenon which surpasses, or is believed to surpass, human powers of comprehension. (*Tractatus*, ch. 6)

Similarly Voltaire (1694–1778),

A miracle is the violation of mathematical, divine, immutable, eternal laws. By the very exposition itself, a miracle is a contradiction in terms: a law cannot at the same time be immutable and violated. (1764, *Philosophical Dictionary*, 'Miracles', quoted in McGrew 2014)

Since Friedrich Schleiermacher (1768–1834) this principle was widely accepted as axiomatic in German protestant theology. Ernst Troeltsch in 1898 thus declared the following 'principle of correlation' to be a principle of theology,

[N]o change can occur at one point without changes occurring before and after at other points, so that all events stand in a continuous, correlative interconnection and must necessarily constitute a single flow in which each and all hang together, and every event stands in relation to others.²

The New Testament scholar Rudolf Bultmann expressed it thus:

The idea of a miracle as a divine intervention has become impossible for us today, because we understand all that happens in nature as

¹ A different way to argue for the impossibility of miracles would be to posit the 'principle of causal closure', which Kim (1998: 40) formulates as follows: 'If you pick any physical event and trace out its causal ancestry or posterity, that will never take you outside the physical domain. That is, no causal chain will ever cross the boundary between the physical and the nonphysical.' In Wachter 2006 I object to this principle that it is not a result of physics (cf. Plantinga 2011: 89) and that it can be defended only by providing evidence against the existence of immaterial objects, and a modal version of the principle cannot be defended at all. See also Lowe 2000.

² Troeltsch (1898: 733). For a discussion of this principle, see Plantinga 1998.

law-governed. Thus we understand a miracle as a violation of the law-governed connection between all that happens in nature, and this idea we cannot entertain today any more. (Bultmann 1933: 84f., my transl.)

Later, Anglo-Saxon theologians adopted the claim, e.g. Langdon Gilkey,

[C]ontemporary theology does not expect, nor does it speak of, wondrous divine events on the surface of natural and historical life. The causal nexus in space and time which the Enlightenment science and philosophy introduced into the Western mind [...] is also assumed by modern theologians and scholars; since they participate in the modern world of science both intellectually and existentially, they can scarcely do anything else. (Gilkey 1961: 31)

Even today many follow this approach. For example, Nancey Murphy (1995: 343) states, 'We object to interventionist accounts of divine action because it seems unreasonable that God should violate the laws he has established.' Murphy is part of the 'Divine Action Project' (DAP), co-sponsored by the Vatican Observatory and the Center for Theology and the Natural Sciences in Berkeley.³ The leader of this project is Robert Russell, who gave his view the telling name: 'NIODA' – Non-Interventionist Objective Divine Action. Such authors do not just want to say that there are also divine actions which are not interventions. Instead, they want to affirm the existence of God and of divine action without accepting the existence of any divine interventions.

II. DEFINING MIRACLE AND INTERVENTION

In this article I shall argue that there is no reason for this aversion to interventions since this aversion is based on a misconception of the laws of nature. Usually by a miracle we mean a divine intervention into the ordinary course of material things, an intervention that functions as a sign for someone. We would not, therefore, usually call God's creating of an animal by intervention a 'miracle', if such creation took place before there were humans to whom this event would also function as a sign.

³ For discussions of the DAP, see Plantinga 2011, § 4.2 and Wildman 2004.

⁴ For a thorough defence of a similar definition see Larmer 2014, ch. 2. This is a simplification of the ordinary usage of the word 'miracle' because we also call it a miracle if the apostle Peter heals a lame man, as in Acts 3:7. This too is an intervention into the ordinary course of material things, but through a human action performed in virtue of extraordinary human powers.

In this article I am concerned with the principle of divine interventions in the broad sense. Regardless of the issue of signification I define an intervention as that which those authors whom I quoted above want to avoid: a divine intervention is an event that is brought about by God in an action, has no preceding⁵ cause, and is incompatible with, and occurs instead of, an event towards which a causal process was directed.

More generally, such an event that is brought about by an agent in an action and has no preceding cause I call a *choice-event*.⁶ So a divine intervention is a choice-event of God that interferes with a causal process. In all this I am assuming the existence of causal processes that have a direction. The idea of an intervention implies further that a process can be stopped, which is what the believers in the 'causal nexus' want to deny.

III. REGULARITIES OF SUCCESSION

The quotations above presuppose a certain view of the causal structure of the world – the 'causal nexus'. Its main element is David Hume's idea that laws entail regularities of the form 'All events of type x are followed by events of type y'. I call this 'the regularity view'. It is further assumed that every event is an instance of a regularity of succession (ROS). Every event is, or is a part of, an event of a type x such that all events of type x are always followed by an event of type y. We can call this the 'causal nexus' view. It excludes all divine interventions, for example miracles, because an intervention is an event that is not an instance of a ROS. It is an event of type z following an event of type x while on other occasions events of type x are followed by, and cause (in some sense), events of type y.

Although Hume's view that laws *are* nothing but ROSs is generally rejected today, the most popular theories of laws of nature today still assume that laws *entail* ROSs, i.e. that if a certain law of nature exists or is true, then there is a certain ROS. David Lewis's (1973: 73) 'best system analysis' claims that a law is a description of a ROS which is an axiom or a theorem in the simplest description of all events. The Armstrong-Dretske-Tooley theory (Armstrong 1983; 1997) claims that a law is

⁵ In Wachter 2011 I have argued that events brought about by God have no preceding cause in the divine mind. If one rejects this, then one has to add here that a divine intervention has no preceding cause *in the natural world*.

⁶ For more on this see Wachter 2003 and Wachter 2009, ch. 7.

a universal that relates property universals. If a law holds between F and G, then all Fs are G, or rather whenever some thing is F, afterwards it will turn G.⁷ Brian Ellis (2001), in his 'scientific essentialism', agrees with the others that there are ROSs and that the laws entail ROSs; he just objects to the Humeans (including David Lewis) that they fail to give an explanation of the existence of the ROSs, and to David Armstrong that he gives the wrong explanation (Ellis 2010: 134). Similarly Stephen Mumford assumes that there are ROSs that are described by law statements and that the ROSs are explained in terms of properties and *de re* necessities, but he holds that there are 'no laws in nature, in the metaphysically real sense of laws' (Mumford 2004: 23) (non-realism about laws).

This wide agreement on the regularity view is a serious challenge to the theist. If the laws entailed ROSs, then it would be correct to call miracles 'violations of the laws of nature' and either to take them to be impossible or, as Richard Swinburne (2003: 19) does, to take them to be 'non-repeatable exceptions' to the laws. But I shall argue that these theories are following the wrong track and that laws do not entail ROSs.

IV. LOOKING FOR REGULARITIES

Let us look for regularities of succession that are entailed by the laws of nature. Consider the law of gravity,

$$F = G \frac{m_1 m_2}{d^2}.$$

Is there a regularity which is entailed by this equation? The first candidate is that any two bodies with mass m mutually attract and accelerate towards one another at the following rate,

$$a=G\frac{m}{d^2}.$$

But they do not, because often, in fact *always*, there are more things influencing their movement. For example, if there is a third body with

⁷ For a discussion of the possibility of divine action given this view, see Fales 2010: 3-4.

mass m, that mirrors the state of the first body with respect to the second body, but along a vector of separation that is diametrically opposite to that of the first body with respect to the second body, then the second body will not accelerate at all. There also can be other kinds of influences on the body's movement, for example electro-magnetic forces. Such influences are possible because there can be (and typically will be) a superposition of forces, in other words, forces are additive and can be counteracted.

Perhaps we find a regularity by considering a larger state of affairs, including the other things that influence the body. But a list of things or events does not entail or necessitate that there are no other things or events. Whatever events (at the time in question) you include in x, sometimes an x-event will be followed by a y-event, sometimes by some other type of event. The law of gravity describes what follows an x-event when there are no other forces and no other things at work. But as there can be other forces and other things, the law of gravity entails no ROS, however big an event you consider. Even if U is a complete description of the universe (at the time in question), the law of gravity does not say that a U-state will always be followed by a certain y-state, because U does not entail that there are no things besides U. Only if you add the clause 'and there is nothing else' or 'there is nothing else acting', does the statement make a claim about what will happen. Hence no matter how many additional factors are included in the first event, up to and including the influences of everything else in the universe, regularities still cannot be rescued without including this additional clause, even if only implicitly. For example, one can derive from the law that 'Whenever there are two bodies with mass m, separated by distance d, and no further things are influencing their motion, they accelerate towards one another following an inverse square law, but that is not a ROS.

Perhaps the law of gravity does not entail a ROS but the totality of the laws does. This way we take into account not only gravitational forces but also electromagnetic and all other forces. One could assume that material or spatial things exert no other forces than those described by the laws of nature. It is a plausible but not trivial assumption that all forces exerted by material things on one another can be known by knowing their masses, mutual separations and other characteristics, such as electric charges. We could then assume that the totality of the laws of nature entails, for each description of a material state of affairs, a complete description of the forces exerted by it.

But still we do not obtain a ROS, for two reasons. First, because, as explained above, no list of things excludes the existence of further things, for example other material things, angels, or God. Secondly, because being the result of a causal process, as defined above, is not the only way an event can come about. An event can be the result of a causal process and thus be caused by preceding events, or it can be a choice-event, so that it has no preceding cause but is brought about by an agent. The agent can be immaterial or (a materialist may claim) material. In any case, the totality of the laws of nature also entails no ROSs, but only conditional prediction statements of the form: *If an event is of type x and no further things are affecting what follows, then an event of type y will follow.* The laws also entail general causal statements of the form: *Events of type x cause events of type y if nothing prevents them from causing.*

The prediction statements entailed by laws leave open not only the possibility of intervention by material things but also by God. If an x-event once causes a y-event, then in other cases of x-events the y-event may be prevented by other things, e.g. other material things or God. Some might want to say that the laws allow for interventions only by forces exerted by material things and thus that they entail prediction statements of the form 'If an event is of type x and no other material thing is exerting a force on what follows, then an event of type y will follow. But that is false; the laws do not entail this. The laws would entail this only if they entailed that there are no immaterial things. Even if there were no God, there would be no way to derive this fact from the laws of nature. If someone were to add it to a law statement, then the resulting statement would not be justified by the observations. If there are no immaterial things and no choice-events, then the prediction statements that are calculated on the basis of all the laws and all material things all happen to be true even without the clause 'no further things are acting'. But without that clause they are not entailed by the laws but only by the laws plus the metaphysical assumption that there are no immaterial things and no choice-events.

The laws already do not entail ROSs because of the possibility of intervention by forces exerted by material things. But there can also be interventions by agents through choice-events. Interventions can therefore occur through: non-probabilistic material processes; or probabilistic material processes; or free rational or non-rational actions by embodied agents; or free rational or non-rational actions by non-embodied created agents; or free rational actions by God.

V. WHY DO THE LAWS NOT ENTAIL REGULARITIES OF SUCCESSION?

Why did so many believe that there are ROSs and that laws of nature entail them? This belief is plausible on the assumption that causal processes are unstoppable. This assumption was stated, and declared to be *a priori* and certain, by Thomas Hobbes,

Whatsoever effects are hereafter to be produced, shall have a necessary cause; so that all the effects that have been, or shall be produced, have their necessity in things antecedent. (1655, *De corpore*, § 9)

This is determinism as it is understood today: every event is necessitated by preceding events. If someone believes this, then he may well believe that all events of type x necessitate events of type y, and that the laws entail ROSs which describe what causes and necessitates what and thus how processes develop. Especially in the 19th century belief in determinism was widespread,⁸ which is why quantum mechanics in the 1920s met with disbelief and was such a shock.

But there are no such processes. A rolling billiard ball can be stopped by a ball, a cat, a man, a demon, or God. Non-probabilistic processes cannot stop by chance; they are heading in one direction. But they can be stopped, or deflected, by a thing that is strong enough. Deterministic causes and processes in the usual sense, implying the impossibility of being stopped, do not and cannot exist. A more useful sense would be: A deterministic process is one that can stop only if something stops it. Processes need not be probabilistic in order to be stoppable.

It is illustrative to see how Hobbes' argument for determinism in *De corpore* § 9 fails. He argued as follows: If an event occurred, then its cause was complete, otherwise it would not have occurred. 'An entire cause is always sufficient for the production of its effect.' 'It follows also from hence, that in whatsoever instant the cause is entire, in the same instant the effect is produced. For if it be not produced, something is still wanting, which is requisite for the production of it.' Therefore, 'whatsoever effects are hereafter to be produced, shall have a necessary cause; so that all the effects that have been, or shall be produced, have their necessity in things antecedent.'

⁸ For example, Kant's principle of causation was widely accepted: 'Every event is determined by a cause according to constant laws.' (Kant, *Prolegomena*, § 15)

⁹ For a defence of this claim see Wachter 2012.

As John Bramhall (Bramhall 1655: 172) was quick to point out, Hobbes' mistake was to derive from 'Every event has a sufficient cause' (everything was there that was needed for the causing) that 'Every event has a necessitating preceding cause'. The rolling of billiard ball A before time t caused the rolling of billiard ball B after t. The cause was complete and in this sense sufficient to push B, but the cause did not necessitate B's rolling, because something could have prevented B's rolling, for example B's being glued to the table, another ball, a cat, or a demon. Moreover, non-probabilistic causes do not necessitate their effects, and in addition, non-probabilistic processes can be stopped.

We can and should even question whether there are ROSs at all. In a very small world with just two perfectly similar spheres, the answer might be 'yes'. They might perpetually collide and move away from each other. But consider a middle-sized event like two billiard balls, A and B, colliding in a larger universe like ours. It may happen on other occasions that these two balls or other similar balls move in the same way. But they will not always move in this way, because sometimes there are other balls hitting them, or a magnet or a cat affects them. Or a demon or God. Considering a less than exact description of the objects and the event does not help either: neither 'Balls with some mass moving in way w' nor 'Two bodies with masses m and separation d, with accelerations that follow an inverse square law', yields a ROS. If you consider larger events, such as one consisting of 17 bodies, then you might find some ROSs – but only if there are very few instances of that event type. For event types of which there are many instances, it is probable that they will not all cause events of the same type. God could intervene sometimes in order to bring it about that for some event types, A and B, A-events are always followed by B-events. But without such interventions it is very improbable that there are ROSs of event types of which there are many instances, because the more instances of the first event type there are, the more probable it is that on some occasion something will bring about a different outcome than in those cases in which nothing else is affecting the outcome. This problem is exacerbated by the chaotic behaviour of complex systems, by which even tiny perturbations are rapidly magnified. Besides these considerations, even if there were some ROSs, it would be impossible to acquire a justified belief about them because one can never know whether there will be an exception in the future.

VI. CETERIS PARIBUS LAWS

The contemporary debate about *ceteris paribus* laws also highlights ways in which the laws of nature do not entail ROSs. Many philosophers hold that some or all laws of nature require *ceteris paribus* clauses, for the reasons that I have given above for my claim that laws entail only prediction statements that contain a 'and no further things are acting' clause. Such philosophers want to hold the view that laws entail prediction statements of the form 'All events of type x that are under the same conditions are followed by events of type y'.¹⁰

But John Earman and John T. Roberts (1999; 2002) have argued that the fundamental laws do not contain *ceteris paribus* clauses, and if a formula does contain *ceteris paribus* clauses, then it is not a fundamental law but part of a 'work-in-progress-theory',

If laws are needed for some purpose, then we maintain that only laws will do, and if 'ceteris paribus laws' are the only things on offer, then what is needed is better science, and no amount of logical analysis on the part of philosophers will render the 'ceteris paribus laws' capable of doing the job of laws. (Earman and Roberts 1999: 466)

While they hold that laws do not require *ceteris paribus* clauses, they say that *applications of a theory* require what Carl Hempel called 'provisos'. As an example of an application of a theory, Hempel considers a description of the motion of two bodies that are 'subject to no influences from within or from outside the system that would affect their motions' (Hempel 1988: 158). Discussing the proviso required for this, Hempel touches the issue of miracles:

The proviso must [...] imply the absence [...] of electric, magnetic, and frictional forces; of radiation pressure; and of any telekinetic, angelic, or diabolic influences. (Hempel 1988: 158, also quoted in Earman and Roberts 1999: 444)

So Hempel recognises the possibility of divine interventions, and the need to exclude such interventions by fiat. To achieve this objective, he proposes the proviso, 'the total force acting on each of the two bodies equals the gravitational force exerted upon it by the other body; and the latter force is determined by the law of gravitation.' The expression 'total force' is supposed to exclude telekinetic, angelic, diabolic, etc., influences. As a diabolic influence would be an action and, in my view, not a 'force'

¹⁰ For a comprehensive investigation of *ceteris paribus* laws see Schrenk 2007.

in the strict, Newtonian sense, Hempel should say instead that 'nothing besides the gravitational force exerted by the two bodies is affecting their motion'. But the point is clear: While laws of nature do not require *ceteris paribus* clauses or 'provisos', 'applications of theories' do.

We can find the reason why Earman and Roberts hold, against most other authors, that the fundamental laws do not require *ceteris paribus* clauses if we examine what they write in the light of our question whether laws entail regularities of succession. Earman and Roberts do not address this question explicitly, but what they say implies that laws do not entail ROSs. In a footnote, they take the law of gravitation 'as asserting' this position, using the following words:

(Regardless of what other forces may be acting) any two massive bodies exert a gravitational force on one another that is directly proportional to the product of their masses and inversely proportional to the square of the distance between them. (Earman and Roberts 1999: 473, footnote 14)

Their objections to Nancy Cartwright's claim, which she expressed already in the title of her book *How the Laws of Physics Lie* (1983), that the laws *lie* because bodies do not move in the way which the laws describe, point in the same direction:

Universal Gravity *cannot* misrepresent the motion of a body, because it says nothing specific about such temporal behaviour. Only differential equations of evolution type – which might be derivable from UG together with other considerations – can be integrated to describe the temporal motion of a body or system of bodies. UG cannot be so integrated. Thus, it cannot misrepresent temporal motion. [...] [T]here is more packed into this differential equation than just laws. What is really wrong with the differential equation is that it was derived under the assumption that nothing carried a net charge, a false non-nomic assumption. (Earman, Roberts and Smith 2002: 286f.)

Although Earman and Roberts in other articles (2005a; 2005b) defend 'Humean Supervenience', which probably means that forces are reducible to what happens when and where or to something else that is not a force, ¹¹ this interpretation is in fact leading towards my theory, which

¹¹ Earman and Roberts (2005a: 1) defend Humean Supervenience as the claim that 'what is a law of nature, and what not, supervenes on the Humean base'. By this they mean that 'two possible worlds cannot differ on what is a law of nature unless they also differ on the Humean base'. They propose that 'the Humean base at a given world is the

I shall state below, that laws of nature do not entail ROSs and do not say how bodies move, but say, rather, that there are forces of certain kinds in situations of certain kinds.

VII. LAWS VERSUS EQUATIONS OF MOTION

What I have discussed in the previous section draws attention to an important clarification: We need to distinguish between *laws of nature* on the one hand, such as the law of gravitation and, on the other hand, *equations of motion* ('applications of theories') understood as either specific predictions of what will happen in a particular situation or understood as general statements about how systems of a certain type will develop. A law of nature, in my view, is true always and without conditions or provisos; it applies also to cases in which there are things acting that the law does not take into account and in which, therefore, the conditions are not the same ('ceteris paribus') than in ideal cases in which there are no factors that the law does not describe. By contrast, an equation of motion is true only if a 'no further things are affecting the movement of the bodies' clause is included.

In the title of her book 'How The Laws of Physics Lie', Nancy Cartwright (1983) shows that she means by 'laws of physics' equations of motion or predictions, because the title means that often bodies do not move as the laws predict. I reply that this conclusion is to be avoided by two steps: First, laws of nature, such as the law of gravitation, say nothing about what happens, just about what forces there are. Second, equations of motion, understood as predictions, require not just *ceteris paribus* but 'no further things are acting' clauses – and with these they do not lie.

Miracles violate neither laws nor equations of motion. Miracles do not violate the laws, because laws do not entail ROSs. Miracles do not

set of non-nomic facts at that world that can be the output of a reliable, spatiotemporally finite observation or measurement procedure. (Earman and Roberts 2005a: 17) Does this mean that forces are part of the Humean base? In my view they can be observed or measured, but Earman and Roberts write that their version of HS captures the idea that the distinction between the initial and boundary conditions and the laws from which the differential equations are derived is not a 'metaphysical distinction between two fundamentally different kinds of facts'. (2005a: 15) Thus they mean by the Humean base 'the set of all facts that could serve as initial or boundary conditions'. (2005a: 16) That indicates that Earman and Roberts think that forces are reducible to what happens when and where or to something else that is not a force, because irreducible forces are not the kind of thing that is referred to as initial conditions.

violate equations of motion because these require the 'no further things are acting' clause. Equations of motion without the clause are false because there *can* be further things acting so that things do not move according to the equation. The clause is needed not just because of the possibility of divine interventions but also because of the possibility of a process being interfered with by another material process.

VIII. THE TENDENCY THEORY OF LAWS OF NATURE

Thus far I have defended the negative claim that laws of nature do not entail ROSs. In order to bring out why miracles do not violate the laws, I want to say also positively what a law of nature is. We should take our cue from real examples from physics, for example the law of gravitation¹² rather than from pseudo-examples like 'All swans are white' or 'Metal expands when heated'. This law of mechanics says that *there are forces of certain types in situations of certain types*.

What is a force?¹³ Let me present two thought exercises designed to help us to understand, or describe, what a force is. First, let us consider how we feel or observe forces. You can exert a force with your finger on a ball. You can feel a force that is exerted by a ball on your hand. You can imagine or believe that a ball is exerting a force on a table on which it is lying or on a ball which it hits. The object on which the force is exerted then is *heading in a certain direction*, it is pressed or pushed to move in that direction – even if it is impeded from moving. Likewise, the body that exerts the force is heading in a certain direction.

Second, more generally, consider a universe – for simplicity's sake one without living beings – at some time t. How will it carry on after t? There are many possibilities. There could be after t any one of many possible universes, for example one with just five stones or one like ours was in 1517. But we do not believe that all these possibilities are equally likely. We believe that at each time the universe is heading in a certain direction. There is a tendency in the universe to carry on in a certain way, rather than in one of the many other possible ways. By using the word 'tendency' here, I do not wish to imply any randomness or chance. Let us

 $^{^{12}}$ The physicist Richard Feynman, in his book *The Character of Physical Law* (Feynman 1965), also uses the law of gravitation for investigating what a law of nature is.

¹³ For a defence of the reality of Newtonian forces, resultant and component, see Massin 2009, § 2.

put aside all such ideas for now and consider the universe as if there was no chance and as if Newton's laws were the ultimate ones.

In order to grasp what this 'heading in a certain direction' is, we need to contemplate and consider the things in themselves attentively. Conceptual analysis will not provide us with insights. The heading in a certain direction has to do with, but does not consist in, how the universe or a part of it will carry on after the time under consideration. The bodies have a *tendency* to move in a certain way or direction. I prefer to say: There is a tendency (in the universe) at time t towards the bodies after t moving in a certain way, i.e. towards the bodies being at certain positions at certain later times. Equivalently we can say: 'There is a tendency at t *that* after t the bodies will be at certain positions at certain times.' That there is a force applying to a body at t means that there is, in this sense, a tendency in the universe at time t towards the bodies being at certain positions at certain times after t. More generally, there is a tendency at time t that at certain times after t certain things will be the case, matter will be a certain way.

A force is a tendency in this sense. It is a tendency concerning the positions or movements of bodies. But there are other tendencies, concerning other changes or developments. Therefore my theory of laws does not say that a law says that there are forces of certain kinds in situations of certain kinds, but that a law of nature says that there are tendencies of certain kinds in situations of certain kinds. J. S. Mill already hinted at this in 1843 when he wrote: 'All laws of causation, in consequence of their liability to be counteracted, require to be stated in words affirmative of tendencies only, and not of actual results.' (Mill 1843: book III, ch. 10, § 5)

A tendency depends on a state of affairs. Not everything there is at t is relevant for the obtaining of the tendency. If two planets attract each other, then a cat on a distant planet is irrelevant for that tendency. Likewise, while the mass of and the distance between the two planets are relevant, their temperature is not. Therefore, tendencies are not based on substances, as a philosopher who claims that laws are about 'dispositions' 15 or 'powers' might say, but on states of affairs: complexes of properties at certain places or things at certain times. In order to refer

 $^{^{14}}$ I have developed this notion of a tendency and this theory of laws in more detail in Wachter 2009, ch. 5.

 $^{^{15}\,\}mathrm{For}$ example Lowe 2006, § 8.6 and Göcke 2015 hold that laws are about the dispositional behaviour of natural kinds.

to a certain state of affairs in this sense, and thus in order to refer to the basis of a tendency, one needs to specify which properties at which thing or where at which time one means. ¹⁶ So there is a state of affairs, S, consisting of certain properties at certain bodies or places at a certain time t, which is the *basis* of the tendency. It is impossible ¹⁷ that S exists while the tendency does not. It is also impossible that the tendency exists without its basis.

If a state of affairs of type S is the basis of a tendency of type T, then other states of affairs of type S are also the bases of tendencies of type T. I assume that that is necessarily so and that there is no causal explanation for this. If two states of affairs are bases of dissimilar tendencies, then they are also in themselves dissimilar. But I do not need to explore this possibility here. The core of the tendency theory of laws of nature is that laws describe what kinds of states of affairs are the bases of what kinds of tendencies.

If nothing counteracts a (non-probabilistic) tendency, then things carry on following the tendency; the tendency is *realised*. But there can always be another tendency or an agent that counteracts a tendency, impeding its realisation. I assume that if S is the basis of tendency T at time t towards a certain state of affairs at a certain later time t_2 , then T is also a tendency towards a certain states of affairs at all times between t and t_2 .

Not only changes and a body's acceleration, but also constant movement is a matter of tendency. If there is no force acting on a body, there is still a tendency that the body will be at certain positions at certain times. I assume further that a thing's persisting unchangingly through time is a matter of tendency. It consists in there being a tendency towards there being a thing with certain properties at certain positions at certain times. But not every state of affairs or event occurs through the realisation of a tendency. It can also be a choice-event, i.e. occur in an action and have no preceding cause.

¹⁶ I favour David Armstrong's 1997 conception of a state of affairs, but not much turns on this here. Even the difference that is usually made between states of affairs and events is not relevant here. My point is that one refers to the basis of a tendency by specifying property, thing or place, and time.

¹⁷ I always mean impossibility *simpliciter*, which comes closest to what usually is called 'metaphysical' impossibility. So I recognise only one kind of modality and do not use the usual distinction between 'logical', 'natural' and 'metaphysical' impossibility. Laws are, probably, necessary in the simple, strict sense. See Wachter 2009, ch. 3.

Is not Newton's second law, establishing a proportional relationship between force and acceleration, a counter example to the claim that laws state that there are tendencies of certain kinds in situations of certain kinds? Does not that law describe not tendencies but the actual movement of bodies? If we wanted to interpret the law in this way, then we would have to add a 'nothing else is acting' clause. But it is more adequate to say that the law describes the movement towards which the body on which the force acts is heading - regardless of whether the body will actually move in this way. Without Newton's second law we could not calculate exactly what tendency there is when two planets attract each other. We could calculate the force, but this would only entail the direction but not the velocity of the acceleration towards which the tendency is directed. Newton's second law together with the laws that describe that there are forces of certain kinds in situations of certain kinds is a description of the tendencies there are. So Newton's second law is also a part of the description of tendencies.

We now see a further flaw of the *ceteris paribus* approach. Usually laws are assumed to entail ROSs whose instances are all the instances of the law. *Ceteris paribus* clauses are used in order to express that the law does not apply to those cases in which the conditions are not the same. But it is false that the law does not apply to those cases. Even if the gravitational force exerted on a body by another body does not lead to acceleration, because an electromagnetic force or an animal impedes it, the gravitational force is still there and the law of gravitation applies.

IX. BACK TO MIRACLES

Now we can draw the conclusions concerning miracles. Are miracles violations of the laws? They would be if the laws said or entailed that no miracles occur. Consider the case of Peter walking on the water. God prevents Peter from sinking into the water; he holds him. What do the laws say about that? They say that there are certain tendencies, in this case that there is a gravitational force pulling him down. Is the miracle contrary to what the laws say? Only if God abolishes the gravitational force. Does he? Even if God could do that (which perhaps even an omnipotent person, rightly understood, cannot do), there is no reason to take such drastic measures; God can hold Peter without abolishing

any tendencies. He sustains Peter, the water, and the tendencies, and by holding Peter, God counteracts the tendency towards Peter sinking into the water. Alternatively, God could act on the water holding the water molecules so that Peter does not sink. God would not thereby violate any laws, because he would not abolish any tendencies concerning the water. A miracle is no violation of any law of nature because the laws say that there are certain tendencies, and God does not abolish any tendencies; they are all there. 18

Can God change the laws? If the laws are necessary, as I think, then even an omnipotent or maximally powerful person cannot change them. Of course, God could have created a universe made of different stuff, and he could change the stuff in our universe so that bodies attract each other less. Then different laws would describe the existing tendencies. In some possible cases only the constants would be different. In some cases it might look as if the laws changed, but in fact it is not the laws that changed, but the kinds of things described by the laws. The laws have changed only in the sense that different laws now describe the tendencies that exist. It is impossible that two exactly similar states of affairs are the bases of different tendencies. That is what I mean by the hypothesis that the laws are necessary.

If God intervenes by moving a body, does he thereby produce a force? If one defines 'force' so that any acceleration is the result of a corresponding force, then the answer is 'yes'. But this response is not the most appropriate one (as argued by Massin 2009: 557f.), because, for example, a gravitational force on a body is dissimilar from God moving a body directly, a tendency is different from God bringing about a state of affairs directly. A tendency is based on a state of affairs, but God's acting is not. A tendency can be counteracted and overriden by another tendency, but God's acting cannot. A tendency at t₁ towards state of affairs S at t, is also a tendency towards states of affairs at times between t₁ and t, and at later times. Nothing corresponds to this temporal ordering in God's acting. A tendency is the universe's heading in a certain direction, but God's acting is God's bringing about a state of affairs in an action as a choice-event. Therefore, when God intervenes, he does not bring about a tendency, e.g. a force, but he brings about a state of affairs directly as a choice-event.

¹⁸ For another, slightly different defence of the view that miracles are not violations of the laws, see Larmer 2014, ch. 2.

One possible view about the relationships between miracles and laws is that the laws do not apply to miracles. The laws describe what material things cause and that therefore, if an immaterial agent causes a material event, the laws say nothing about that case. This is C. S. Lewis's view, and it is expressed well by Jan Cover,

... [B]elieving in events having supernatural causes, needn't saddle one with believing that there are false laws of nature, laws having exceptions. Miracles are so to speak 'gaps' in nature, occurrences having causes about which laws of nature are simply silent. The laws are true, but simply don't speak to events caused by divine intervention.¹⁹

Along with this view, which we can call the not-apply view or the silence view, one can say that miracles do not violate the laws, because on this view the laws do not say that there are no miracles. I object to this view, however, since I claim that the laws also apply to miracles and are not silent about them insofar as they describe tendencies, and such tendencies remain, even though God counteracts.²⁰

Richard Swinburne accepts the idea that miracles are violations of the laws but interprets it in the sense of a miracle being 'a non-repeatable exception to a law of nature' (Swinburne 2004: 279). A miracle is a violation of a law in that it is a z-event following an x-event while according to the law x-events are followed by y-events. But because x-events are not always followed by z-events, the law is still a law, the law statement is still true. To this view too I object that a miracle is in no sense a violation of a law because laws apply also to miracles, insofar as they describe tendencies. Further, I object to the idea that miracles are the only exceptions to the laws. The laws apply to miracles no less than they apply to cases where material objects counteract the tendencies. A material object's counteraction is as much a counteraction as a divine counteraction is, and an intervention by a material object or process is as much an intervention as a divine intervention is. Likewise, animals and humans can, by acting, counteract tendencies and intervene in processes.21

¹⁹ Quoted by Larmer 2014, ch. 2. Similarly Plantinga (2011: 78): 'according to Newton and classical mechanics, natural laws describe how the world works when, or provided that the world is a closed (isolated) system, subject to no outside causal influence.' Also C. S. Lewis in his book *Miracles* holds such a view.

²⁰ For the principle of energy conservation, the not-apply view is correct. See Larmer 2014, ch. 2 and Collins 2008.

²¹ For a discussion of Swinburne's view, see Larmer 2014, ch. 5.

Swinburne holds that because miracles are violations of the laws of nature, they are in themselves improbable. The fact that if E occurred, it would have been a miracle is in itself 'evidence against its occurrence',

This is because the past phenomena which make it probable that L is a law of nature make it probable that it holds almost universally and so that on the occasion in question, things conformed to L. (Swinburne 1992: 118)

In my view this is not so. It is true that today, at least in the West,²² miracles are somewhat improbable. One needs stronger evidence to justify the belief that God raised your friend's daughter from the dead than for the belief that she is dead. But the reason for this difference of evidence is not that miracles are violations of the laws, nor that rising from the dead would be a miracle. Rather, the reason is that today, I assume, God does not very often raise people from the dead or intervene very visibly in other ways. The low frequency of miracles today lowers the prior probability of miracles, but the mere fact that they are miracles does not. Imagine that God were to perform miracles very often. Then you would need less evidence in order to justify the belief that God raised your friend's daughter from the dead.

CONCLUSION

The question of miracle led us to question the general view of the laws and of the causal structure of the world, according to which laws entail regularities of succession and even every event is an instance of a regularity of succession. Against this view I have argued that laws do not entail regularities of succession but describe tendencies, e.g. Newtonian forces. Miracles are not violations of the laws because in the case of a miracle the tendencies that the laws describe remain.

This claim is strikingly at variance with all current prominent theories of laws of nature, given that such theories assume that laws do entail ROSs. But I suggest that my claim is not contrary to our intuitions and observations. Nothing in the law of gravitation, for example, indicates that it entails regularities of succession. Rather, the most straightforward interpretation is that there are certain forces in certain situations. We

 $^{^{22}}$ According to Keener 2011, part 3, there seem to be more credible reports of miracles in other parts of the world.

also do not observe or experience ROSs. The idea that there are ROSs (other than regularities with just a few instances) is implausible because we know that for each event in other cases of events of that type there may be something which causes a different outcome. Events of one type often cause and are therefore followed by events of a certain other type, otherwise we could not build cars and computers, but the idea that events of one type are *always* followed by events of a certain other type is a claim of a different order.

Belief in ROSs is most probably based on a more basic commitment, namely to determinism or to empiricism. In my view, belief in determinism prevents philosophers from recognising that processes can be stopped and makes them believe that it is possible that an event necessitates a later event, or even that all events are necessitated by preceding events. As one can then believe that events of type x necessitate events of type y, that paves the way for belief in regularities of succession. Belief in empiricism prevents philosophers from recognising forces and other tendencies and leads them to believe instead in regularities of succession, although, ironically, we do not observe them. Once we put aside these two doctrines, then we recognise a third alternative besides Hobbesian deterministic processes and probabilistic processes: processes that have a unique direction from which they cannot deviate by chance, without a cause, but from which they can be caused to deviate. Then we can accept that laws of nature describe the direction of processes, or, more precisely, tendencies.

Some may even be motivated in part to assume the existence of ROSs because that allows a quick argument against miracles (and against free will). But whether and which miracles have occurred can be discovered only by considering the *evidence*, not *a priori*. The theist as well as the atheist have the tasks of examining, for example, the historical evidence for the resurrection of Jesus in detail.²³ Investigating the laws of nature does nothing to determine whether miracles occurred.

Some theists are worried that there is no room for miracles, for example Keith Ward claims that 'there must be gaps in physical causality if God is ever to do anything' (Ward 2000: 903). Some therefore put their

²³ The evidence for the resurrection of Jesus is investigated, for example, by Swinburne 2003, T. McGrew and L. McGrew 2012, Craig 2000, Habermas and Licona 2004, and Wright 2003. Swinburne points out that not only the detailed historical evidence, such as the reports of witnesses, but also several kinds of background evidence need to be considered.

hope in quantum mechanics, speculating that God acts by determining the outcome of probabilistic processes on the quantum level.²⁴ There is no need for all this. Even if the Newtonian laws, which are as deterministic as any are, were the ultimate laws, miracles would be perfectly possible. Hence we are at fully at liberty to consider the only question that really matters, and to which this paper serves as a prelude, namely whether and which miracles have, in fact, occurred.²⁵

BIBLIOGRAPHY

- Armstrong, David M. 1983. *What Is a Law of Nature?* (Cambridge: Cambridge University Press)
- Armstrong, David M. 1997. *A World of States of Affairs* (Cambridge: Cambridge University Press)
- Bramhall, John. 1655. 'A Defence of True Liberty from Antecedent and Extrinsical Necessity', in *Works vol. 4*. (Oxford: John Henry Parker, 1844), pp. 23–196
- Bultmann, Rudolf. 1933. 'Zur Frage des Wunders', in *Neues Testament und christ-liche Existenz* (Tübingen: Mohr Siebeck), pp. 84–98
- Cartwright, Nancy. 1983. *How the Laws of Physics Lie* (New York: Oxford University Press)
- Collins, Robin. 2008. 'Modern Physics and the Energy-Conservation Objection to Mind-Body Dualism', *American Philosophical Quarterly*, 45.1: 31–42
- Craig, William Lane. 2000. *The Son Rises: Historical Evidence for the Resurrection of Jesus* (Eugene, Oregon: Wipf & Stock)
- Earman, John and John T. Roberts. 1999. "Ceteris Paribus", There Is No Problem of Provisos', *Synthese*, 118.3: 439–478
- Earman, John and John T. Roberts. 2005a. 'Contact with the Nomic: A Challenge for Deniers of Humean Supervenience about Laws of Nature, Part I: Humean Supervenience', *Philosophy and Phenomenological Research*, 71: 1–22
- Earman, John and John T. Roberts. 2005b. 'Contact with the Nomic: A Challenge for Deniers of Humean Superveni-ence About Laws of Nature Part II: The Epistemological Argument for Humean Supervenience', *Philosophy and Phenomenological Research*, 71.2: 253–286

²⁴ For example Russell 2009 and also Plantinga's Divine Collapse Causation (Plantinga 2011: 116-121). For objections to Plantinga see Wachter (2014: 56f).

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- Earman, John, John T. Roberts, and Sheldon Smith. 2002. 'Ceteris Paribus Lost', *Erkenntnis*, 57.3: 281–301
- Ellis, Brian. 2001. *Scientific Essentialism* (Cambridge: Cambridge University Press)
- Ellis, Brian. 2010. 'Causal Powers and Categorical Properties', in *The Metaphysics of Powers: Their Grounding and Their Manifestations*, ed. by A. Marmodoro (Dordrecht: Routledge), pp. 133–142
- Fales, Evan. 2010. *Divine Intervention: Metaphysical and Epistemological Puzzles* (London: Routledge)
- Feynman, Richard. 1965. *The Character of Physical Law* (New York: The Modern Li-brary)
- Gilkey, Langdon. 1961. 'Cosmology, Ontology, and the Travail of Biblical Language', in *God's Activity in the World: The Contemporary Problem*, ed. by Owen C. Thomas (Chico, California: Scholars Press), pp. 194–205
- Göcke, Benedikt. 2015. 'Did God do it? Metaphysical Models and Theological Hermeneutics', *International Journal for Philosophy of Religion*, forthcoming
- Habermas, Gary R. and Michael R. Licona. 2004. *The Case for the Resurrection of Je-sus* (Grand Rapids, MI: Kregel Publications)
- Hempel, Carl Gustav. 1988. 'Provisos: A Problem Concerning the Inverential Function of Scientific Laws', *Erkenntnis*, 28.2: 147–164
- Keener, Craig. 2011. *Miracles: The Credibility of the New Testament Accounts*, 2 vols. (Grand Rapids, MI: Baker)
- Kim, Jaegwon. 1998. Mind in a Physical World: An Essay on the Mind-Body Problem and Mental Causation (Cambridge, Mass.: MIT Press)
- Larmer, Robert A. 2014. The Legitimacy of Miracle (Lanham: Lexington Books)
- Lewis, David K. 1973. Counterfactuals (Cambridge: Harvard University Press)
- Lowe, E. J. 2000. 'Causal Closure Principles and Emergentism', *Philosophy*, 75: 571–585
- Lowe, E. J. 2006. The Four-Category Ontology: A Metaphysical Foundation for Natural Science (Oxford: Clarendon Press)
- Massin, Olivier. 2009. 'The Metaphysics of Forces', Dialectica, 63.4: 555-589
- McGrew, Timothy. 2014. 'Miracles', *The Stanford Encyclopedia of Philosophy* (*Winter 2014 Edition*), ed. by E. N. Zalta. Available at: http://plato.stanford.edu/entries/miracles/ [accessed 05/11/2015]
- McGrew, Timothy and Lydia McGrew. 2012. 'The Argument from Miracles: A Cumulative Case for the Resurrection of Jesus of Nazareth', in *The Blackwell Companion to Natural Theology*, ed. by W. L. Craig and J. P. Moreland (Oxford: Wiley-Blackwell), pp. 539–662
- Mill, John Stuart. 1843. A System of Logic Ratiocinative and Inductive (New York: Harper, 1882)
- Mumford, Stephen. 2004. Laws in Nature (London: Routledge)

- Murphy, Nancey. 1995. 'Divine Action in the Natural Order: Buridan's Ass and Schrödinger's Cat', in *Chaos and Complexity: Scientific Perspectives on Divine Action*, ed. by R. J. Russell, N. Murphy and A. R. Peacocke (Vatican Observatory Publications), pp. 325–357
- Plantinga, Alvin. 1998. 'Two (Or More) Kinds of Scripture Scholarship', *Modern Theology*, 14.2: 243–278
- Plantinga, Alvin. 2011. Where the Conflict Really Lies: Science, Religion, and Naturalism (Oxford: Oxford University Press)
- Russell, Robert John. 2009. 'Divine Action and Quantum Mechanics', in *Philosophy, Science, and Divine Action*, ed. by F. LeRon Shults, Nancey Murphy and Robert J. Russell (Boston: Koninklijke Brill), pp. 351–404
- Schrenk, Markus. 2007. *The Metaphysics of Ceteris Paribus Laws* (Frankfurt: Ontos Verlag)
- Spinoza, Benedict de. 1670. *Tractatus Theologico-Politicus*, trans by Robert Willis (London: Trübner & Co., 1862). Available at: https://en.wikisource.org/wiki/Theologico-Political_Treatise_1862/Chapter_6 [accessed 02/12/2015]
- Swinburne, Richard. 1992. Revelation: From Metaphor to Analogy (Oxford: Clarendon Press)
- Swinburne, Richard. 2003. *The Resurrection of God Incarnate* (Oxford: Clarendon)
- Swinburne, Richard. 2004. The Existence of God (second edition) (Oxford: Clarendon)
- Troeltsch, Ernst. 1898. 'On the Historical and Dogmatic Methods in Theology', in *Gesammelte Schriften*, vol. 2., trans. by H. J. Forstman (Tübingen:P J. C. B. Mohr, 1913), pp. 728-753
- Wachter, Daniel von. 2003. 'Free Agents as Cause', in *On Human Persons*, ed. by K. Petrus (Frankfurt: Ontos Verlag), pp. 183–194
- Wachter, Daniel von. 2006. 'Why the Argument from Causal Closure against the Existence of Immaterial Things is Bad', in *Science A Challenge to Philosophy?* Ed. by H. J. Koskinen, R. Vilkko and S. Philström (Frankfurt/M.: Peter Lang), pp. 113–124
- Wachter, Daniel von. 2009. Die kausale Struktur der Welt. Eine philosophische Untersuchung über Verursachung, Naturgesetze, freie Handlungen, Möglichkeit und Gottes kausale Rolle in der Welt (Freiburg: Alber)
- Wachter, Daniel von. 2011. 'Do the Results of Divine Actions Have Preceding Causes?', *European Journal for Philosophy of Religion*, 3: 347–367
- Wachter, Daniel von. 2012. 'Kein Gehirnereignis kann ein späteres festlegen', *Zeitschrift für philosophische Forschung*, 66: 393–408
- Wachter, Daniel von. 2014. 'Defending Design Arguments Against Plantinga', *Philosophia Reformata*, 79: 54–65

- Ward, Keith. 2000. 'Divine Action in the World of Physics: Response to Nicholas Saunders', *Zygon*, 35: 901–906
- Wildman, Wesley J. 2004. 'The Divine Action Project, 1988–2003', *Theology and Science*, 2: 31-75
- Wright, N. T. 2003. *The Resurrection of the Son of God* (Minneapolis: Fortress Press)

SPECIAL DIVINE ACTS: THREE PSEUDO-PROBLEMS AND A BLIND ALLEY

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Abstract. Traditionally, special divine acts have been understood as involving intervention in the course of nature, so as to cause events that nature would not, or could not, otherwise produce. The concept of divine intervention has come under heavy fire in recent times, however. This has caused many philosophers and theologians either to abandon the possibility of special divine acts or to attempt to show how such acts need not be understood as interventions in natural processes. This paper argues that three objections typically raised against special divine acts conceived as interventions in the natural order are pseudo-problems and pose no reason to abandon the traditional conception of such acts. Further, it argues that attempted noninterventionist accounts constitute a blind alley of investigation, inasmuch as they fail to provide a secure foundation for a robust account of the possibility of special divine acts.

INTRODUCTION

Traditionally, special divine acts have been understood as involving intervention in the course of nature, so as to cause events that nature would not, or could not, otherwise produce. The concept of divine intervention has come under heavy fire in recent times, however. This has caused many philosophers and theologians either to abandon the possibility of special divine acts¹ or attempt to show how such acts need not be conceived as interventions in natural processes.² This paper

¹ Maurice Wiles, for example, was prepared to abandon the category of special divine acts writing that 'the primary usage for the idea of divine action should be in relation to the world as a whole rather than to particular occurrences within it'. Maurice Wiles, *God's Action in the World* (London: SCM, 1986), p. 28.

 $^{^2}$ Robert J. Russell, perhaps the foremost proponent of NIODA (non-interventionist objective divine action), argues that "because of developments in the natural sciences,

argues that three objections typically raised against special divine acts conceived as interventions in the natural order are pseudo-problems and pose no reason to abandon the traditional conception of such acts. Further, it argues that purported noninterventionist accounts are a blind alley inasmuch as they fail to provide a secure foundation for a robust account of the possibility of special divine acts.

I. FIRST PSEUDO-PROBLEM

A frequent objection to mind-body dualism is that it is inconceivable that there can be any causal relation between material and immaterial substances. We find, for example, Richard Taylor insisting 'that as soon as the smallest attempt at any description is made [of how an immaterial mind could act on a physical body] the description becomes unintelligible and the conception an impossible one. It thus comes as no surprise that Arthur Peacocke, critical of the idea that mind-body dualism might provide resources for conceiving God's relation to the world, writes that,

it is [...] difficult to imagine *how* God might be an agent in [the] world [... if] the only analogy for such agency has itself been formulated in dualistic terms that involve a gap dividing action in the 'body', and so in the natural world, from intentions and other acts of the 'mind'. This is an *ontological* gap between two kinds of entities across which it is difficult to see how in principle a bridge could be constructed.⁴

In much the same vein, David Corner claims that 'if the supernatural entities that are supposed to have causal efficacy in the natural world

including quantum physics, genetics, evolution, and the mind/brain problem, and because of changes in philosophy, including the move from epistemic reductionism to epistemic holism and the recognized legitimacy of including whole-part and top-down analysis, we can now view special providence as consisting in the *objective* acts of God in nature and history [...] *and* we can interpret these acts in a *non-interventionist* manner consistent with the natural sciences".

Robert J. Russell, *Cosmology: From Alpha to Omega* (Minneapolis: Fortress Press, 2008), pp. 111-112.

³ Richard Taylor, *Metaphysics*, 2nd ed. (New Jersey: Prentice-Hall, 1974), p. 25. In a similar vein, Jaegwon Kim writes, 'just try to imagine how something that isn't anywhere in physical space can alter in the slightest degree the trajectory of even a single material particle in motion.' Jaegwon Kim, *Philosophy of Mind* (Boulder, Colorado: Westview Press, 1998), p. 4.

⁴ Arthur Peacocke, *Theology for a Scientific Age* (Oxford: Blackwell, 1998), p. 148.

are conceived as being too different from natural entities, it will be hard to say how there can be any causal interaction between nature and the supernatural.'5

Much can be said by way of reply to this objection, but in the context of a short paper it suffices to make two points. First, the suggestion that we cannot imagine how it is possible for an immaterial entity to causally affect the material world ignores the fact that all basic causal relations are, in the final analysis, conceptually opaque. Even in cases of causation in the physical world, we have at the most fundamental level no account of how one thing causes another. Brian Ellis is correct to remind us that,

sooner or later, in the process of ontological reduction, we must come to events and processes that are not themselves structures of constituent causal processes. These most elementary causal processes [...] will consist entirely of elementary events [...] the identities of the basic causal interaction that initiate and terminate elementary causal processes [...] cannot depend in turn on their causal structures.⁷

We may, for example, become familiar with the fact that masses attract one another. We may even give the name of gravity to the fact that they do so, and describe gravity as one of the fundamental processes of nature. To the degree that it is fundamental, however, there can be no account of how it is the case that masses can attract each other, no specification of a mechanism by which this happens, only the observation that they in fact do so.⁸ Given, then, that all causal relations are in the final analysis conceptually opaque, there is no more difficulty in thinking such relations can exist between immaterial and material entities than in thinking they can exist between material entities.⁹ In both cases, as William Hasker

⁵ David Corner, *The Philosophy of Miracles* (London: Continuum, 2007), p. 42.

⁶ For a fuller discussion see Robert Larmer, *The Legitimacy of Miracle* (Lanham, Maryland: Lexington Press, 2014), pp. 105-108, 155-159.

⁷ Brian Ellis, *Scientific Essentialism* (Cambridge: Cambridge University Press, 2001), p. 51.

⁸ An anonymous critic has suggested that despite conceptual opacity we rightly recognize constraints on causation and that one of the constraints is that 'like-can-only-cause-like'. Such a constraint, however, cannot be simply assumed without begging the question against the dualist. For the difficulties in justifying such a claim see John Foster, *The Immaterial Self* (London: Routledge, 1991), pp. 159-163.

⁹ To claim that direct divine causal intervention is causally opaque is not to claim that what are recognized as special divine acts, say the Virgin Birth, can have no natural processes associated with them. As C. S. Lewis notes, "If God annihilates or creates or deflects a unit of matter He has created a new situation at that point. Immediately all

observes, 'we have no ultimate insight into the causal relations involved, except to say, "That's the way things are." 10

Second, the objection appears to prove too much. If successful, it demonstrates not only that the idea of divine intervention is incoherent, but that the idea of a creator God is incoherent, since if an immaterial God cannot stand in a causal relation to a material world He can scarcely be viewed as its creator and sustainer. Such an objection, therefore, requires that one be prepared to argue that the existence of the material world logically implies that even if God exists He cannot be thought to have created the world, that is to say, the doctrine of creation *ex nihilo* is logically incoherent. Arguments in support of such an ambitious and counter-intuitive claim are not in evidence, and it would be an understatement to suggest that it is difficult to think how they could be formulated. I conclude, therefore, that objections to special divine acts conceived as divine interventions in nature based on the purported difficulty of holding there cannot be causal relations between immaterial and material entities pose a pseudo-problem.

II. SECOND PSEUDO-PROBLEM

A second objection that is routinely raised against special divine acts understood as interventions in the course of nature is that such interventions would violate the Principle of the Conservation of Energy. William Stoeger speaks for many when he writes that

direct divine intervention [...] would involve an immaterial agent acting on or within a material context as a cause [...] This is not possible [...] if

Nature domiciles this new situation, makes it at home in her realm, adapts all other events to it. It finds itself conforming to all the laws. If God creates a miraculous spermatozoon in the body of a virgin, it does not proceed to break any laws. The laws at once take it over. Nature is ready. Pregnancy follows, according to all the natural laws, and nine months later a child is born. [...] If events ever come from beyond Nature [...] she will [... not] be incommoded by them. [... She will] hasten to accommodate the newcomer. The moment they enter her realm they obey all her laws. Miraculous wine will intoxicate, miraculous conception will lead to pregnancy [...] miraculous bread will be digested. The divine art of miracle is not an art of suspending the pattern to which events conform but of feeding new events into that pattern." C. S. Lewis, *Miracles* (First published 1947. Reissued London: Fontana, 1974), pp. 63-64.

¹⁰ William Hasker, *The Emergent Self* (Ithaca, New York: Cornell University Press, 1999), p. 150.

it were [...] energy [...] would be added to a system spontaneously and mysteriously, contravening the conservation of energy.¹¹

Such an objection, however, ignores a crucial ambiguity in how the Principle is formulated. It is typically stated as either 'Energy can neither be created nor destroyed', 12 or as 'In an isolated system the total amount of energy remains constant', the assumption being that these two statements are logically equivalent. This assumption is false. If one claims that 'Energy can neither be created nor destroyed' then one must also claim that 'In an isolated system the total amount of energy remains constant'. To claim, however, that 'In an isolated system the total amount of energy remains constant' does not commit one to the claim that 'Energy can neither be created nor destroyed'. The latter claim involves a much greater metaphysical commitment than the former.

It is important that these two formulations of the Principle not be conflated. Theists cannot accept the claim that energy can neither be created nor destroyed, since it not only rules out divine intervention but creation *ex nihilo*. If the universe is conceived to be composed of forms of energy that can neither be created nor destroyed, then one pays the compliment of necessary existence to energy rather than to God, and there is no sense in which God can be conceived as being the cause of the existence of the physical order.¹⁴

¹¹ William Stoeger, 'Describing God's Action in the World in Light of Scientific Knowledge of Reality', in *Chaos and Complexity: Scientific Perspectives on Divine Action*, edited by Robert John Russell, Nancey Murphy, and Arthur Peacocke. (Jointly published by the Vatican Observatory Foundation and The Center for Theology and the Natural Sciences, 1995), pp. 239-61 (p. 244). Also, Willem Drees, 'Gaps for God', in *Chaos and Complexity: Scientific Perspectives on Divine Action*, edited by Robert John Russell, Nancey Murphy, and Arthur Peacocke. (Jointly published by the Vatican Observatory Foundation and The Center for Theology and the Natural Sciences, 1995), pp. 225-227. Unsurprisingly, similar objections are frequently made concerning the possibility of mind-body interaction. See, for example, Daniel Dennett, *Consiousness Explained* (Boston: Little, Brown & Co., 1991), p. 35.

¹² Sheldon Glashow, From Alchemy to Quarks (U.S.A.: ITP, 1994), p. 104.

¹³ Kenneth Krane, Modern Physics, 2nd ed. (U.S.A.: Wiley, 1996), p. 4.

¹⁴ Nicholas Saunders fails to appreciate this point when he dismisses the importance of distinguishing between the two forms of the Principle, arguing that 'it is [...] not reasonable to make retrospective claims concerning the limitation of divine freedom in creating the world out of nothing on the basis of a set of laws which have only evolved due to its establishment. Nicholas Saunders, *Divine Action and Modern Science* (Cambridge, Cambridge University Press, 2003), p. 74. It is one thing to claim that God

Theists, however, need have no difficulty accepting the claim that energy is conserved in an isolated system. Accepting this claim commits them not to rejecting that there is good evidence that energy is conserved to the degree that a system is causally isolated, but rather to rejecting the speculative claim that the physical universe is an isolated system not open to the causal influence of God. In short, theists are in a position to affirm the Principle when it is formulated as a scientific law and not as a metaphysical commitment which excludes the possibility of creation *ex nihilo*.¹⁵

What this means is that, so long as there is good reason to accept the scientific rather than the metaphysical form of the Principle, there can be no basis upon which to generate a balance of probabilities argument opposing evidence which supports belief in divine intervention and evidence which supports belief in the Principle. The theist denies not that energy will be conserved in an isolated system, but that the physical universe is in fact an isolated system. Accepting the occurrence of divine intervention in nature does not commit the theist to denying the vast body of experimental evidence supporting the claim that energy will be conserved in an isolated system, but rather to denying the far more speculative claim that the universe is isolated in the sense of not being open to the causal influence of God. As Alvin Plantinga comments in an extravagant but telling example,

it is entirely possible for God to create a full-grown horse in the middle of Times Square without violating the principle of the conservation of energy. That is because the systems including the horse would not be closed or isolated. For that very reason, there would be no violation of

could create a world that has a different material nature than our own, and consequently a different set of laws. It is quite another, however, to claim that God could accomplish the logically impossible task of creating something (energy) which can neither be created nor destroyed. Contra Saunders, the point is not whether physical laws can be thought of as coming into existence with the Big Bang, but whether the claim that energy can neither be created nor destroyed is logically inconsistent with the claim of creation *ex nihilo*.

¹⁵ Ducasse, writing in 1951, failed to distinguish between the two forms of the Principle. He saw clearly, however, the implications of the claim that energy can neither be created nor destroyed, when he noted that the Principle of the Conservation of Energy 'is something one has to have if, as the materialistic ontology of [...] naturalism demands, one is to be able to conceive the physical world as wholly self-contained, independent, isolated'. Curt Ducasse, *Nature, Mind, and Death* (La Salle, Ill.: Open Court Publishing, 1951), p. 241.

the principle of conservation of energy, which says only that energy is conserved in closed or causally isolated systems – ones not subject to any outside influence. It says nothing at all about conservation of energy in systems that are *not* closed; and, of course, if God created a horse *ex nihilo* in Times Square, no system containing that horse, including the whole of the material universe, would be closed.¹⁶

It bears emphasis that any attempt to move from the well-evidenced claim energy is conserved in an isolated system to the claim that the universe is in fact an isolated system is ill-founded. All that any experiment can be thought to show is that, to the degree that a system is isolated, the amount of energy in it is conserved. Such evidence is neutral as regards the further question of whether there exists an entity capable of creating or destroying energy. If the move from the claim that energy is conserved in an isolated system to the claim that energy can neither be created nor destroyed were to be justified, it would have to be on the grounds that there exists no evidence that energy is ever created or destroyed and that the claim that energy can neither be created nor destroyed constitutes a deep structural explanation of *why* energy is conserved in an isolated system. Any such attempted justification fails on several counts.

First, the theist is able to provide an alternative deep structural explanation of the fact that energy is conserved to the degree that a system is causally isolated. The theistic conception of the universe as a contingent reality in which secondary physical causes operate equally explains why the scientific form of the Principle holds true. It will not do, therefore, for the critic to suggest that the claim that energy can neither be created nor destroyed is the only possible deep structural explanation of energy conservation in isolated systems.

Second, the claim that energy can neither be created nor destroyed is at odds with our best cosmological theory, namely the Big Bang. This theory is commonly interpreted as implying an absolute beginning to the mass/energy that composes the universe.¹⁷ It is possible to accept both the claim that energy is conserved in an isolated system and an absolute beginning to the universe, but it is hard to see how acceptance of the claim that energy can neither be created nor destroyed is consistent with

¹⁶ Alvin Plantinga, Where the Conflict Really Lies (Oxford: Oxford University Press, 2011), p. 79.

¹⁷ Robert Spitzer, New Proofs for the Existence of God (Grand Rapids, Michigan: Eerdmans, 2010), pp. 13-104.

Big-Bang cosmology, since it would imply that the mass/energy making up the universe had no beginning.

Third, the claim that energy can neither be created nor destroyed, cannot be used as the basis upon which to frame a balance of probabilities argument designed to show conflict between the positive evidence taken to support belief in the Principle and the evidence in favour of special divine acts. Acceptance of the claim that energy can neither be created nor destroyed requires, at the very least, that there exists no positive evidence that energy is ever created or destroyed. The occurrence of special divine acts, conceived as events involving the creation or annihilation of energy, conflicts not with any positive experimental evidence supporting belief that energy is conserved to the degree that a system is isolated, but rather with the negative claim that there is no evidence for events involving the creation or destruction of energy. Faced with reports of special divine acts, the occurrence of which would arguably constitute evidence that energy can be created or destroyed, it begs the question to dismiss such reports as antecedently improbable on the grounds that they imply the falsity of the claim that energy can neither be created nor destroyed. One cannot rule out there being mice in the building on the grounds that there is presumably no evidence of their presence, and then refuse to accept reports of tracks, scat, and sightings on the basis that one has already established that there are no mice in the building. 18 Similarly, one cannot urge that the claim that energy can neither be created nor destroyed be accepted on the basis that this has never been observed, and then use one's acceptance of that claim to rule out the occurrence of special divine acts, on the grounds that such events would constitute evidence that energy can be created or destroyed.

It is evident, therefore, that attempts to move from the well-evidenced claim that to the degree that a physical system is causally isolated its energy will be conserved, to the speculative claim that energy can neither be created nor destroyed, cannot be justified. The claim that energy can neither be created nor destroyed is at odds with our best cosmological theories, begs the question of whether special divine acts occur, and

¹⁸ An anonymous critic has objected that the charge of question begging is premature, since it might turn out that the people reporting tracks, scat, and sightings are mistaken or unreliable. This objection, however, misses the point. It is one thing to assess how strong the positive evidence is, quite another to dismiss the possibility of considering such positive evidence on the question begging assumption that one has already established that it does not exist.

a priori rules out the possibility of theism being true. It functions not as a well-evidenced statement of observed regularity in nature but rather as an unfounded defining postulate of physicalism. I conclude, therefore, that objections to special divine acts, understood as divine interventions in nature, based on the claim that such events would violate the Principle of the Conservation of Energy pose a pseudo-problem.

III. A BLIND ALLEY

Concerned to cleave to the mistaken claim that the amount of energy must remain constant in the universe on pain of violating the Principle of the Conservation of Energy, thinkers such as Nancey Murphy, John Polkinghorne, and Arthur Peacocke have attempted to show how special divine acts can occur within an energetically closed universe, not by an input of energy but by an input of information, and that such acts need not be conceived as interventions. Although such attempts have become de rigueur, they appear incapable of delivering what they promise. I shall briefly describe these attempts and some very specific problems with each of them. I shall then mention a fundamental problem which plagues all three and which, quite independently of the various specific problems, appears to doom such efforts to failure. The conclusion to be drawn is that such attempts fail to secure any kind of foundation for a robust defence of the possibility of special divine acts. They constitute, therefore, a blind alley which defenders of special divine acts would do well to avoid.

Murphy's Special Divine Acts as Exploiting Quantum Indeterminacy

Nancey Murphy's account of special divine agency takes quantum indeterminacy as providing inherent gaps in the natural order – what William Pollard termed 'loopholes' – in which God may be conceived as having room to operate. In her view, although subatomic entities have inherent powers, God's action is required if these powers are to be actualized. Thus every quantum event requires a specific intentional act

¹⁹ William Pollard, Chance and Providence (New York: Scribner, 1958), p. 8.

²⁰ Nancey Murphy, 'Divine Action in the Natural Order: Buridan's Ass and Schrödinger's Cat', in *Chaos and Complexity: Scientific Perspectives on Divine Action*, edited by Robert John Russell, Nancey Murphy, and Arthur Peacocke. (Jointly published

of God as its determining cause.²¹ There is no need, however, to conceive of God as competing with natural causes, since at the subatomic level natural causes are insufficient to determine all outcomes.²² God's agency, on this model, is the hidden variable which underlies the apparent indeterminacy of quantum processes.²³

There are a number of problems which suggest that the approach taken by Murphy is unsatisfactory. A major concern is that it is unclear how the quantum processes of the microworld relate to events in the macroworld. Murphy's epistemology appears to be one of critical realism, yet the standard Copenhagen interpretation of quantum mechanics which she adopts, is usually linked to an extreme instrumentalism. As Lawrence Osborn notes, on the Copenhagen interpretation,

the probabilities generated by the Schrödinger wave equation do not correspond to any physical reality. There simply is no reality to be described until an act of measurement collapses the wave function. Quantum mechanics is merely a useful calculating device for predicting the possible outcomes of such acts of measurement.²⁴

It is difficult to see how Murphy's claim that God acts on microphysical entities in such a manner that one quantum state rather than another is realized, can be made consistent with an interpretation of quantum physics which holds that prior to an act of measurement such entities do not exist.

A further concern is that quantum indeterminacies at the microlevel 'dampen out' to deterministic regularities at the macrolevel. In order for quantum indeterminacy to make a difference to how events unfold in the world there must be some means of amplifying the effect of particular quantum indeterminacies. ²⁵ This implies, however, that models of divine

by the Vatican Observatory Foundation and The Center for Theology and the Natural Sciences, 1995), pp. 325-57 (p. 344).

²¹ Ibid., p. 339.

²² Ibid., p. 343.

²³ Ibid., p. 342.

²⁴ Lawrence Osborn, 'Theology and the New Physics', in *God, Humanity and the Cosmos*, ed. by Christopher Southgate (Harrisburg, Pennsylvania: Trinity Press International, 1999), pp. 95-136 (p. 115).

²⁵ Thomas Tracy, 'Particular Providence and the God of the Gaps', in *Chaos and Complexity: Scientific Perspectives on Divine Action*, edited by Robert John Russell, Nancey Murphy, and Arthur Peacocke. (Jointly published by the Vatican Observatory Foundation and The Center for Theology and the Natural Sciences, 1995), pp. 291-324 (p. 317). Also, Thomas Tracy, 'From Quantum Physics to Theology', in *Philosophy, Science*

agency which seek to exploit quantum indeterminacy are radically incomplete, unless they can also account for the means by which particular quantum effects are amplified.

The most natural candidate, indeed perhaps the only candidate, for providing a means of amplifying the effects of quantum events seems to be chaotic systems. There are many problems with such a suggestion but it suffices to mention two.

First, a major, but frequently ignored, problem for those attempting to develop a model of divine agency based on integrating quantum indeterminacy and chaos theory is that quantum theory seems to imply that chaos cannot occur. According to quantum theory, systems described by the Schrödinger equation are not capable of exhibiting the type of sensitive dependency on their initial state characteristic of chaotic systems. We have at present no resolution of the problem of how to reconcile quantum theory and chaos theory and no solution seems apparent on the horizon. ²⁶ Given this state of affairs, any suggestion that the *modus operandi* of divine agency in creation is the amplification of quantum events by means of chaotic systems seems ill-considered.

Second, even if this difficulty is ignored, nature is not nearly so chaotic as is required if chaos theory, combined with quantum indeterminacy, is to provide a foundation for a robust account of special divine acts. Jeffrey Koperski puts the point well when he writes that

even if we grant that most systems are nonlinear (and therefore *possibly* chaotic), aperiodicity and randomness are dynamical characteristics that often reside in the midst of perfectly regular evolutions. Chaos, like background noise, is routinely ignored and rightly so. [...] To put it crudely, [such an account of special divine action] describes a causal pathway in which God could alter the arrangement of bubbles in the crest of a tsunami but not redirect its course. Presumably more is wanted from an account of divine agency.²⁷

Polkinghorne's Special Divine Acts as Exploiting Chaotic Systems

Whereas Murphy focuses upon quantum indeterminacy as providing a loophole in natural processes by which God might be provided a way

and Divine Action, edited by F. LeRon Shults, Nancey Murphy, and George Ellis (Boston: Brill, 2009), p. 208.

²⁶ Jeffrey Koperski, 'God, Chaos and the Quantum Dice', *Zygon*, 35:3 (2000), 555-556.

²⁷ Ibid., p. 556. Also, Jeffrey Koperski, *The Physics of Theism* (West Sussex, UK: Wiley Blackwell, 2015), p. 177.

to perform special divine acts, John Polkinghorne appeals to chaotic systems as providing such an opportunity. Polkinghorne thinks that it is theologically significant that chaotic systems are extremely sensitive and thus inherently unpredictable. In his view, the epistemological uncertainty inherent in attempting to predict the behaviour of chaotic systems, suggests that such systems are ontologically open. Given their ontological openness, God may causally influence their behaviour. He does so not by an input of energy, but by a 'top down' input of information. ²⁸ This suggestion that God achieves particular purposes through the instrumentality of chaotic systems does not, however, Polkinghorne insists, relegate God to acting in the role of an unpredictable quantum event. He writes,

the significance of the sensitivity of chaotic systems to the effect of small triggers is *diagnostic* of their requiring to be treated in holistic terms and of their being open to top-down causality through the input of active information. It is not proposed that this is the localized mechanism by which agency is exercised. [...] that either we or God interact with the world by [...] adjustment of infinitesimal details of initial conditions so as to bring about a desired result.²⁹

God's providential particular acts are thus situated within theism's broader doctrine of creation.

Apart from the already noted difficulty that the amount of chaos present in nature appears to place unacceptable restraint on what God may actually accomplish in terms of special acts by exploiting chaotic systems, Polkinghorne's proposal faces a major obstacle inasmuch as it is far from clear that his move from epistemological indeterminacy to ontological indeterminacy can be justified. The equations typically used to model chaotic systems are deterministic and physicists generally conceive chaotic systems as determined. Thus Wesley Wildman and Robert Russell argue that

chaos in nature gives no evidence of any metaphysical openness in nature. The fact that a natural dynamical system is open to its environment, which

²⁸ John Polkinghorne, *Belief in God in an Age of Science* (New Haven: Yale University Press, 1998), pp. 62-63.

²⁹ John Polkinghorne, 'The Metaphysics of Divine Action', in *Philosophy, Science and Divine Action*, edited by F. LeRon Shults, Nancey Murphy, and George Ellis (Boston: Brill, 2009), p. 106.

is sometimes described in terms of a whole/part causal relationship, does not entail metaphysical openness, for the entire environment may be causally determined [...] Sensitive dependence – a feature of chaotic dynamical systems in mathematics – is attributed to natural systems on the basis of the power of mathematical dynamical systems to model them. To the extent that this modeling works [...] the natural presupposition is that the (metaphorical) 'determinism' of mathematical chaotic dynamical systems corresponds to the metaphysical determinism of nature. Put bluntly, [sensitivity to the altering of conditions] testifies to the high degree of causal connectedness in certain natural systems and so is most naturally exploited in support of the thesis of metaphysical determinism.³⁰

Polkinghorne has responded by suggesting that the unwillingness to opt for the ontological indeterminacy of chaotic systems 'stems from the fact that a theory of this kind has not yet been formulated in any detail, whilst the alternative interpretation of "deterministic chaos" [...] has the time-honoured equations of classical dynamics as its rigorous articulation.³¹ He goes on to argue that,

it is, however, mathematically possible to enlarge the class of solutions that will be admitted, in order to include what are called non-integrable solutions. [...] A holistic account is then necessary and at the same time a rigid determinism is no longer present.³²

His reply, however, has the appearance of special pleading, inasmuch as he is unable to appeal to any scientific, as opposed to specifically theological reasons, for thinking that chaotic systems are best modelled non-deterministically.

Peacocke's Special Divine Acts as Instances of Top-Down Causality

The late Arthur Peacocke, in commenting on appeals to 'unpredictability, open-endedness and flexibility' as making possible non-interventionist special divine acts, makes the point that the possibility that God works

³⁰ Wesley Wildman and Robert Russel, 'Chaos: A Mathematical Introduction with Philosophical Reflections', in *Chaos and Complexity: Scientific Perspectives on Divine Action*, edited by Robert John Russell, Nancey Murphy, Arthur Peacocke. (Jointly published by the Vatican Observatory Foundation and The Center for Theology and the Natural Sciences, 1995), pp. 49-90 (p. 82).

³¹ John Polkinghorne, Belief in God in an Age of Science, p. 65.

³² Ibid., pp. 65-66.

undetectably by influencing quantum events or chaotic systems does not escape an interventionist conception of such acts. He writes,

such a conception of God's action in these, to us, unpredictable situations would [...] be no different in principle from the idea of God intervening in a deterministic, rigidly law-controlled, mechanistic order of nature [...] the only difference, on this view, would seem to be that, given our irreducible incapacity to predict the histories of natural systems, God's intervention (for that is what it would properly have to be called) would always be hidden from us.³³

Peacocke's own model of divine agency is grounded in his account of what it is to be a person. Rejecting any dualist account of the mind/ body relation as inherently unscientific, he insists that "mental events" in human beings are the internal descriptions we offer of an actual total state of the brain itself and are not events in some entity called the "mind" which exists in some other non-physical mode that is ontologically distinct from matter and "interacts" (mysteriously, one would have to say) with the brain as a physical entity.34 Appealing to the concept of supervenience, he holds that there are various levels of description of brain events and processes and that there are no bridge laws by which higher levels of description can be reduced to lower levels. Thus we can describe a particular event in the brain at a lower level of description as a series of neuron firings and also at a higher level of description as a conscious decision to perform an action. This means that 'the language we use concerning the connections between our mental experiences the language of reasons, intentions, and so forth - really does [...] refer to actual causal linkages.'35 The threat of reductionism is thus avoided without having to posit any gap in the operation of physical causes. Analogously, God's agency within creation can be seen as operating at a supervenient level that does not necessitate abandoning the principle that the physical realm is energetically closed.³⁶ Although he insists that 'God's action is on the world-as-a-whole'37 he maintains that such action 'can be general or particular in its effects'. Presumably, then, room can

³³ Arthur Peacocke, *Theology for a Scientific Age*, pp. 154-155.

³⁴ Ibid., p. 60.

³⁵ Ibid., p. 61

³⁶ Ibid., p. 153.

³⁷ Ibid., p. 163.

³⁸ Ibid., p. To the best of my knowledge, Peacocke simply asserts that this is the case, giving no argument for his claim.

be made for special divine acts. Such acts, however, 'would never be observed by us as a divine "intervention", that is, as an interference with the course of nature and as a setting aside of its observed relationships.'39

Peacocke's account of the person is a nonreductive physicalist one which countenances the emergence of new causal powers such that topdown causality is possible. As we have noted, he views God's relation to the world as analogous to his account of the mind-body relation, 40 arguing that we should conceive of God not as separate from the universe but as comprising a higher-level supervening upon the natural processes of the universe.⁴¹ An issue which he never addresses, however, is that this line of thinking most naturally suggests that God depends upon the world to exist, rather than the world depending upon God to exist. Perhaps he would not have been happy with taking the analogy in this direction, but it is the direction which his view of the mindbody relation as analogous to the God-world relation most obviously suggests, as is attested by the tendency of those opting for nondualistic, noninterventionistic accounts of divine agency to reject classical theism and its doctrine of *creatio ex nihilo* in favour of panentheism. ⁴² Certainly we see in Peacocke a preference for the idea of divine emanation rather than the idea of divine making,43 and a move from classical theism to panentheism.

Of further concern is Peacocke's overly optimistic espousal of the reality of emergent irreducible causal powers, ignoring the fact that while supervenience may guarantee semantic irreducibility, it does not entail causal autonomy.⁴⁴ He holds that,

- (1) analysis of complex systems reveals the ontological reality of higher-level properties which exert genuine irreducible causal influence upon lower-level properties, and
- (2) higher-level properties are generated by virtue of their realization in a particular configuration of lower-level properties.⁴⁵

³⁹ Ibid.

⁴⁰ Arthur Peacocke, Creation and the World of Science (Oxford: Clarendon Press, 1979), pp. 133-139.

⁴¹ Arthur Peacocke, *Theology for a Scientific Age*, p. 159.

⁴² See, for example, Ian Barbour, *Religion and Science: Historical and Contemporary Issues* (San Francisco: Harper, 1997), pp. 306-12.

⁴³ Arthur Peacocke, *Theology for a Scientific Age*, pp. 168-169.

⁴⁴ Dennis Bielfeldt, 'Can Western Monotheism Avoid Substance Dualism?', *Zygon*, 36:1 (March 2001), 153-77 (p. 170).

⁴⁵ Arthur Peacocke, *Theology for a Scientific Age*, pp. 54-55.

appearing not to have noticed that these two claims are inconsistent. The relation of higher-level properties to lower-level properties is one of dependency with no new causal powers being created. Top-down causation is not, therefore, something that a nonreductive physicalist account of the person can accept. On such theories, the causal powers of higher-level properties are wholly dependent upon the causal properties of the lower-level properties by which they are realized. This means that whatever causes lower-level properties to be instantiated also causes higher-level properties to be instantiated; the result being that any given instance of higher-level properties will enter into exactly the same causal relations that its corresponding instance of lower-level properties enter into. As Kim observes,

there are no new causal powers that magically accrue to [upper-level] properties over and beyond the causal powers of [lower-level] properties. No new causal powers emerge at higher levels, and this goes against the claim [...] that higher-level properties are novel causal powers irreducible to lower-level properties.⁴⁶

Peacocke's appeal to the emergence of genuine irreducible higher-level causal powers cannot, therefore, be justified.⁴⁷

A General Problem for Non-Interventionist Accounts of Special Divine Acts

We have noted various specific problems with the typical strategies of attempting to conceptualize special divine acts in a non-interventionist way. All are motivated by what I have argued is a pseudo-problem, namely the concern that divine intervention in nature would violate the Principle of the Conservation of Energy. To make room for the possibility of special divine acts, they all suggest that God may perform such acts not by an input of energy, but rather by an input of information.

This suggestion, however, is vulnerable to the objection that all instances of information input into physical systems have energetic implications.⁴⁸ Thus, for example, in the analogy provided by Peacocke of a program controlling the electronic changes in a computer, it is clear that the writing and storing of the program has energetic implications. Also, it is evident that the program will only function in conjunction

⁴⁶ Jaegwon Kim, *Philosophy of Mind* (Boulder, Colorado: Westview Press, 1998), p. 232.

⁴⁷ Bielfeldt puts the point nicely when he writes that 'semantic irreducibility does not entail causal autonomy'. 'Can Western Monotheism Avoid Substance Dualism?', p. 170.

⁴⁸ Willem Drees, 'Gaps for God', p. 226.

with a computer, that is to say, an intelligently designed artefact which itself is a product of the imposition of structure on physical components. Further, even if we ignore the fact that the intelligent structuring of the program and the computer has energetic implications, it is clear that the desired output is produced by the program and computer together constituting the initial boundary conditions under which energy flows take place. This suggests a deistic rather than theistic model of God's relation to the world. On Peacocke's analogy, God must be conceived as the master programmer who achieves his purposes through setting the initial boundary conditions under which subsequent physical processes occur without any further input. Only if we think of the programmer as continuing to interact with his program and computer can the analogy accommodate a theistic model of God's relation to creation that includes special divine acts. This, however, implies the type of intervention that Peacocke refuses to contemplate; the result being that his analogy counts against rather than for his account of how non-interventionist special divine acts are presumed to be possible.

To his credit, Peacocke does not duck the point that the input of information into the physical universe by God would have energetic implications. Acknowledging this, he writes

so we still have a problem of the 'causal joint', now in the form of: How can God exert his influence on, make an input of information into, the world-as-a-whole without an input of matter/energy? This seems to me to be the ultimate level of the 'causal joint' conundrum, for it involves the very nature of the divine being in relation to that of matter/energy and seems to me to be the right place in which to locate the problem, rather than at some lower levels in the created order at which divine 'intervention' would then have to be postulated with all of its difficulties.⁴⁹

Besides constituting an admission that he has no answer to the problem of how information could be added to the universe without any energetic implications, this passage highlights that, despite claiming that his account could allow for special divine acts, Peacocke's model of divine agency in creation is essentially deistic, presenting no worked out account of how it is consistent with the occurrence of special divine acts.

Consideration of these three typical strategies, as exemplified by Murphy, Polkinghorne, and Peacocke, suggests that purported

⁴⁹ Arthur Peacocke, Theology for a Scientific Age, p. 164.

non-interventionist accounts of the possibility of special divine acts are in fact a blind alley. In the case of Murphy and Polkinghorne, we are offered not a non-interventionist account of special divine action, but rather the claim that such intervention will always lie hidden in 'those, to us, uncloseable gaps in the predictability of the natural world.' In the case of Peacocke, as we have seen, he avoids intervention only at the price of offering a deistic account of God's relation to the world.

IV. THIRD PSEUDO-PROBLEM

A third pseudo-problem lurking in discussion of the possibility of special divine acts is the largely unexamined assumption that there must exist some causal indeterminacy in natural processes in which God may be thought to have room to operate. Otherwise, the view seems to be, special divine acts would either not be possible or would imply violating the laws of nature. Thus Pollard, whose seminal *Chance and Providence* has had great influence on the contemporary discussion of the possibility of special divine acts, takes causal indeterminacy in nature to be a necessary condition of such acts, since otherwise there is 'extraordinary difficulty [...] in imagining any kind of loophole through which God could influence [events]; [... no] point in the world [...] at which the hand of God could be thrust in and providence [...] actually exercised'. Similarly, Robert Russell takes for granted that if nature does not exhibit ontological indeterminism then special divine acts would imply violation of the laws of nature. ⁵²

But why think this? The question of whether a system is deterministic in how it functions must be distinguished from the question of whether it is causally closed. It is entirely possible for an external agent to influence what happens in a deterministic system, without violating the laws operating in the system. One does not break any of Newton's laws of motion if one tosses an extra billiard ball into the mix, yet one alters the outcome of what would otherwise occur on the table. If God changes the material conditions to which the laws apply, He thereby produces an event that nature would not have produced on its own, but violates no laws of nature. Robert Young aptly makes this point when he writes that

⁵⁰ Ibid., p. 154.

⁵¹ William Pollard, Chance and Providence (New York: Scribner, 1958), p. 8.

⁵² Robert Russell, *Cosmology: From Alpha to Omega* (Minneapolis, MN: Fortress, 2008), p. 127.

God is an active agent-factor in the occurrence of [... special divine acts] such that his presence introduces a new (possibly unique) set of causally sufficient factors. His presence *ceteris paribus* alters the outcome from what it (perhaps) would have been if, contrary to fact, he had not been present. Here there is no sense of violation or physical impossibility, [or] mere coincidence.⁵³

It is thus clear that whether the physical universe exhibits causal indeterminacy or, as even some interpretations of quantum mechanics require, is deterministic in its functioning, God as its Creator, is capable of acting upon it. It is true that if God brings about an event that would not otherwise occur there will be an explanatory gap in terms of natural causes,54 but such a gap is best understood as the result of God's action, not the prerequisite of it. To insist otherwise undermines any robust conception of special divine acts inasmuch as it sets immensely restrictive limits on what God can be thought to be able to bring about. It is only the insistence by non-interventionists that the physical universe be understood as causally closed that requires them to hold that special divine action is impossible in the absence of genuine indeterminacy in how nature functions, and that such action must be constrained to the very narrow limits allowed by such indeterminacy. This insistence is far from warranted in light of the fact that no scientific theory requires that the universe be conceived as causally closed and that the result of such insistence is a view of special divine acts that allows God 'to alter the arrangement of bubbles in the crest of a tsunami but not redirect its course^{2,55}

CONCLUSION: TO ACT IS TO INTERVENE

At the beginning of this paper, it was noted that special divine acts have traditionally been understood as involving intervention in the course

⁵³ Robert Young, 'Miracles and Physical Impossibility', *Sophia*, Vol. 11, No. 3 (1972), 29-35 (p. 33).

⁵⁴ Tracy, whose position is similar to Murphy's, nevertheless sees this point clearly, writing that 'if we affirm that God performs particular actions which affect the course of events in the world, then it certainly appears that we must also grant that there will be gaps in the explanation of these events in the sciences'. Thomas Tracy, 'Particular Providence and the God of the Gaps', in *Chaos and Complexity: Scientific Perspectives on Divine Action*, p. 323.

⁵⁵ Jeffrey Koperski, 'God, Chaos and the Quantum Dice', p. 557.

of nature so as to cause events that nature would not, or could not, otherwise produce. Indeed, the very meaning of the word 'act' seems to imply that such acts must be conceived as interventions. To act in the midst of an ongoing historical process is precisely to intervene in the sense of producing an event that would not otherwise occur. If I act to hang a picture on the wall of my room then I intervene to bring about a state of affairs that would not otherwise occur. If Jesus acts to multiply loaves and fishes to feed a hungry crowd he intervenes to bring about a state of affairs that would not otherwise happen. This being the case, it seems a contradiction in terms to speak of 'noninterventionist special divine acts' 56

Polkinghorne is correct when he insists that 'if the insights of a providence at work in human lives and in universal history, are to carry the weight of meaning that they do in Christian tradition and experience, then they must not simply be pious ways of speaking about a process from which particular divine activity is in fact absent and in which the divine presence is unexpressed, save for a general letting-be'. Christian philosophers and theologians need to defend special divine acts. They

⁵⁶ Such a conclusion could, perhaps, be avoided if one were to embrace a thoroughgoing determinism such that all events are uniquely determined by the initial conditions God puts in place at the creation of the physical universe. Suggesting such a possibility comes at the considerable cost of ruling out free will and making the problem of evil vastly more difficult. There is also the issue of whether such a suggestion is scientifically credible, given the nature of the physical universe; the question being not whether God could possibly create a universe in which front-loading could work, but whether it could work in this actual universe. Thus Michael Chaberek notes: "The question that faces the concept of front-loading, also known as 'evolution projected by God' is whether the vision of watchmaker creating watches able to form new watches is really better than the vision of someone who personally and directly affects his works. One may also wonder whether the world as we know it, with its strict laws and physical limitations really allows one to create watches which produce other watches, and whether less advanced watches can produce greater and more complex watches. In the world we live in, we do not encounter watches capable of making other watches at all, just as we do not find engineers trying to design self-assembling cars. It is not that engineers choose to design car factors of self-assembling cars only because of their inadequate intelligence or lack of skill. Rather the constraints of objective reality make them create factories instead of self-assembling devices. One can even say that this approach actually testifies to their contrivance and comes from a clear distinction between what is possible in our world and what is a mere futuristic fantasy." Michael Chaberek, O.P. 'Seeking the Truth about Theistic Evolution, Animal Death, and Intelligent Design.' In More than Myth?, ed. by Paul D. Brown and Robert Stackpole (U.S.A.: Chartwell, 2014), pp. 135-157 (p. 154).

⁵⁷ John Polkinghorne, Belief in God in an Age of Science, p. 49.

should do so, however, in full recognition that the objections typically raised to conceiving special divine acts as interventions in nature constitute pseudo-problems, and that proposed noninterventionist accounts – quite apart from the fact that they seem a contradiction in terms – have all proven a blind alley, incapable of providing a secure foundation for a robust conception of special divine acts.

AGAINST MIRACLES AS LAW-VIOLATIONS: A NEO-ARISTOTELIAN APPROACH

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Abstract. Miracles are commonly understood in the way David Hume defined them: as violations of the laws of nature. I argue, however, that the conjunction of Hume's definition with a neo-Humean view of the laws of nature yields objectionable consequences. In particular, the two jointly imply that some miracles are logically impossible. A better way of thinking about miracles, I suggest, is on a neo-Aristotelian metaphysics. On that view, the laws of nature contain built-in *ceteris paribus* clauses that allow for the possibility of external influences in the natural world. Miracles, understood as instances of external, divine influence, would therefore neither violate the laws of nature nor be instances of those laws. In this respect, neo-Aristotelians have an advantage over neo-Humeans in providing a coherent account of miracles.

I. INTRODUCTION

According to David Hume, miracles are violations of the laws of nature by God's will.¹ Hume's definition has profoundly impacted subsequent philosophical and theological discussions on the nature of divine activity in the world. Part of my objective in this essay is to point out the inadequacy of Hume's definition when it is conjoined with a neo-Humean understanding of the laws of nature.² Neo-Humeans typically think of

¹ In his *Enquiry Concerning Human Understanding*, Hume writes, 'A miracle is a transgression of the laws of nature by the volition of Deity.' David Hume, *An Enquiry Concerning Human Understanding*, in *Modern Philosophy: An Anthology of Primary Sources*, ed. by Roger Ariew and Eric Watkins (Indianapolis, IN: Hackett Publishing, 1988), pp. 533-600 (p. 537). For this essay, I adopt the usual interpretation of 'transgression' as 'violation'.

² For an extended critique of Hume's definition of a miracle in general, see Timothy McGrew, 'Miracles', in *The Stanford Encyclopedia of Philosophy*, ed. by Edward N. Zalta,

the laws of nature in terms of (i) an 'exceptionless generalization' view or (ii) a 'best systems' view. I maintain, however, that the conjunction of either view with Hume's definition yields objectionable consequences. Specifically, when conjoined with Hume's definition, the exceptionless generalization view entails that miracles are logically impossible, and the best systems view precludes the possibility of what I call *recurrent miracles*, i.e. divine activity that is exercised regularly and predictably.

A better way to think about miracles, I suggest, is within a neo-Aristotelian framework.³ According to Neo-Aristotelians such as Alexander Bird, the laws of nature track dispositional properties that are found in nature.⁴ These properties, according to Bird, are subject to what are called *finks* or *masks*, i.e. conditions that prevent a disposition from being manifested.⁵ As a consequence, the laws of nature have *ceteris paribus* clauses built into them: the laws hold only in the absence of finks and masks. Miracles, I suggest, might be seen as cases of divine finks and masks.⁶ On such a view, miracles are not violations of the laws of nature, as Hume believed. Rather, they are unique instances of divine activity that interact with the dispositional capacities found in the world.

The aforementioned ideas are developed and defended in three sections. In section one, I argue that the Humean definition of a miracle conjoined with neo-Humean views of the laws of nature yield the inadequate results mentioned above. In section two, I present Bird's dispositionalist interpretation of the laws of nature and show how miracles might be seen as divine finks and masks. Finally, in section three, I conclude by considering several objections to the proposed account.

Winter 2014, http://plato.stanford.edu/archives/win2014/entries/miracles/ [accessed 28 April 2015].

³ For another author writing along similar lines, see Benedikt Paul Göcke, 'Did God Do It? Metaphysical Models and Theological Hermeneutics', *International Journal for Philosophy of Religion*, Vol. 78, No. 2 (2015), 215-231.

⁴ Alexander Bird, *Nature's Metaphysics: Laws and Properties* (Oxford: Oxford University Press, 2007), p. 2.

⁵ Ibid., pp. 25-29.

⁶ This is not to say, of course, that divine finks and masks are the exclusive means of divine activity in the world. Divine activity might come in other forms. Part of the point of my exposition is to show that at least a class of miracles might occur in the world *without* violating the laws of nature, and such activity makes more sense under a neo-Aristotelian interpretation of nature's laws than it does under a neo-Humean interpretation.

I. MIRACLES WITHIN NEO-HUMEANISM

As noted above, Hume considered miracles to be violations of the laws of nature by God's will. One of the main difficulties in understanding Hume on this point is that he spoke little of what the laws of nature are supposed to be.⁷ It is widely recognized, however, that Hume's broader views on causation gave rise to what is known as the Regularity theory of the laws of nature.⁸ According to the Regularity theory, the laws of nature express patterns of modally disconnected events in the world. David Lewis compares the regularity of the world's events to a vast glass mosaic: from a distance, one can see patterns emerge in the entire mosaic; nevertheless, these patterns are merely the sum of disconnected pieces of glass.⁹ Similarly, laws of nature are patterns of modally disconnected events. Neo-Humeans since Hume have devoted considerable effort in formulating more precise versions of the Regularity theory. Part of my project, therefore, will be to explore what neo-Humeans have said concerning the laws of nature.

Neo-Humean theories about the laws of nature come in two broad varieties: the exceptionless generalization view and the best systems view. I will now examine both and indicate the consequences of conjoining each with Hume's definition.

1.1 The Exceptionless Generalization View

The exceptionless generalization view, as its name implies, states that the laws of nature admit of no exceptions. D. H. Mellor explains that on this view, 'law statements [...] are (or at least entail) 100% generalizations of the form "All α s are β s". As a result of empirical inquiry, humans are able to make universal generalizations concerning the natural regularities they observe in the world. If some event E occurs that does not conform to a *present* universal generalization G, we construct a new universal generalization G' that accounts for E. In other words, we claim that G did not truly reflect the laws of nature. Ultimately, there is a universal

⁷ David Armstrong, What is a Law of Nature? (Cambridge: Cambridge University Press, 2009), p. 4.

⁸ Ibid.

⁹ David Lewis, *Philosophical Papers Volume II* (New York: Oxford University Press, 1986), p. ix.

¹⁰ D. H. Mellor, *Matters of Metaphysics* (Cambridge: Cambridge University Press, 2007), p. 162.

generalization G^* that reflects regularities exceptionlessly and therefore represents the laws of nature without aberration. G^* might turn out to be a very complex set of descriptions; yet once it is established, there are no exceptions to G^* .

Hume's definition of a miracle, however, yields objectionable consequences when conjoined with the exceptionless generalization view. For their conjunction would render miracles logically impossible. If we accept that miracles are violations of the laws of nature and that the laws of nature are nothing but exceptionless regularities, it follows that miracles are violations of natural regularities, which on the exceptionless regularity view are impossible.¹² Christopher Hughes puts the argument another way: 'If miracles are possible, then either miracles are not violations of the laws of nature, or the laws of nature are not (necessarily) exceptionless.'13 But, as we have seen, neither of Hughes's disjuncts is acceptable to the advocate of both the exceptionless generalization view and Hume's definition. 14 I suggest that the foregoing argument's conclusion, i.e. that miracles are logically impossible, ought to be undesirable to both theists and most atheists. Theists, I presume, believe that miracles actually occur (or have occurred in the past). And most atheists typically assert that although miracles do not in fact occur, their occurrence is nonetheless logically possible. ¹⁵ E. J. Lowe has conjectured that Hume himself probably did not hold to an exceptionless

¹¹ Stephen Mumford, 'Normative and Natural Laws', *Philosophy*, Vol. 75, No. 292 (2000), 265-82 (p. 276). Popper describes this view in Karl Popper, *The Logic of Scientific Discovery* (New York: Routledge, 1992), p. 62. As is well known, Popper's point is that one exception is all that is needed to falsify a law.

¹² It is important to note that on the present view the impossibility of miracles (as defined by Hume) does not imply that God cannot act in the world. Rather, it means that if God were to act, his act would not be a miracle but instead a *part* or *instance* of the laws of nature. This consequence seems immediately counterintuitive, as I will suggest later in the paper.

¹³ Christopher Hughes and Robert M. Adams, 'Miracles, Laws of Nature and Causation', *Proceedings of the Aristotelian Society*, Vol. 66, No.2 (1992), 179-205 & 207-24, (p. 186).

¹⁴ I am in agreement with Steven Mumford on this point. See Mumford, 'Normative and Natural Laws', p. 269.

¹⁵ I admit that the above argument would not be persuasive to the type of atheist who grants that miracles are *logically impossible* to begin with. The conjunction of the exceptionless generalization view and Hume's definition would entail their conclusion. I suspect, however, that such atheists are rare. Most, it seems, acknowledge at least the *possibility* of miracles even if none occur in the actual world. In any case, my arguments

generalization view of the laws of nature. ¹⁶ For if he had, then Hume's later project of arguing that no testimony could be sufficient to establish a miracle would be trivial: one could simply rule out miracles *a priori*.

Thus, the neo-Humean confronts a challenge: how might she understand miracles in a way that does not render the occurrence of miracles logically impossible? In one of his papers, Lewis puts forward a position that would answer this challenge. The approach Lewis takes is to modify the term 'miracle' to mean a violation of the laws of nature not of *this* world, but of some *other* possible world. More generally, consider two worlds, w_1 and w_0 . A miracle might take place in w_1 , where the miracle is a violation of the laws of nature not of w_1 but of w_0 . Lewis states:

When I say that a miracle takes place at w_1 , I mean that there is a violation of the laws of nature. But note that the violated laws are *not* the laws of the same world where they are violated [...] a miracle at w_1 , relative to w_0 , is a violation at w_1 of the laws of w_0 .¹⁷

In other words, Lewis supposes that violations of the laws of nature are possible but only relative to different worlds in which different laws hold.

What are we to make of this position? I think Lewis's modification does not solve the problem without yielding absurd consequences. I will consider two main points. First, Lewis's modification of the term 'miracle' would still entail that *any* event – no matter how unusual or seemingly supernatural – is a part of the laws of nature in the actual world. Suppose that my friend comes up to me and loudly declares, 'I command you to levitate.' Suddenly, I begin to hover three feet above where I previously stood. Call the world in which this event takes place the 'levitation-world.' If Lewis is correct, such an event in the levitation-world would be a miracle relative to some other possible world (like ours, presumably) in which no one ever levitates. But it would still remain the case that relative to the levitation-world, the event would be a *part* of the laws of nature. No laws of nature are violated in the levitation-world, for the laws (on the exceptionless generalization view) subsume *all* events.

are directed to those who hold that miraculous divine interventions are, if not actual, at least logically possible. Thanks to Kevin Timpe for comments here.

¹⁶ E. J. Lowe is perplexed by the unsatisfactory conclusion of the Humean argument which he regards as 'too easy'. See his 'Miracles and Laws of Nature', *Religious Studies*, Vol. 23, No. 2 (1987), p. 263, p. 270.

¹⁷ David Lewis, *Philosophical Papers Volume II* (New York: Oxford University Press, 1986), pp. 44-45.

The levitation-event might be surprising (especially if the levitation-world is like ours up until the levitation-event), but it would it would not thereby be an exception to the laws of nature. This consequence, however, seems immediately counterintuitive. The correct response from the denizens of levitation-world would be to think that my friend has some mysterious, supernatural ability to bring about an event beyond the laws of nature that are operative in that world. But, as we have seen, the exceptionless generalization view precludes that possibility.

Second, construing miracles as law-violations in other possible worlds yields an even more absurd consequence, namely, it makes the occurrence of miracles too easy. Consider: presumably there is a possible world W in which *everyone on earth* suddenly levitates three feet above where they are located. But then the fact that in the actual world we are *not* levitating would count as a miracle relative to world W. It would therefore be a miracle that everyone does not levitate in the actual world. Such cases can be generalized: *any* event in the actual world that diverges from the laws in other worlds would count as a miracle. In light of these counterintuitive consequences, I suggest that Lewis's modification does not help the exceptionless generalization view. Rather, the Humean should stick to Hume's original conception of a miracle: a miracle in W is a violation of the laws of nature in W. But then we are brought back to our original conclusion: Hume's definition conjoined with the exceptionless generalization view entails that miracles are logically impossible.

1.2. The Best Systems View

A more sophisticated version of the Regularity theory, however, is open to neo-Humeans. It is known as the 'best systems' view, most prominently defended by Lewis and David Ramsey. According to this view, not every regularity counts as a law of nature. Rather, laws of nature are to be understood as the best systematization *of* the regularities, where 'best' is understood in terms of postulating the fewest possible axioms from which one can derive the maximum number of events in the world.¹⁹ In other words, laws of nature on the best systems view are determined

¹⁸ The laws of nature on the universal generalization are said to be observerindependent. In other words, they lack epistemic conditions on them. Thus, the fact that some particular event might be surprising or unpredictable given one's current knowledge of the world has no bearing on the nature of the laws themselves on this view.

¹⁹ Robert Adams considers this a possibility for the Regularity theorist. See Adams and Hughes, 'Miracles, Laws of Nature and Causation', 179-205 & 207-24, (p. 212).

by a balance of their strength and simplicity in accounting for the vast mosaic of disconnected qualities in the world.

Is it possible to understand Humean miracles within this best systems approach? It appears so, at least initially. On such a view, miracles would be events which lie 'outside' the regularities entailed by the laws of nature. In his book The Concept of a Miracle, Richard Swinburne, although himself not a neo-Humean about the laws of nature, 20 provides a way in which one might do this. He claims that 'One must [...] distinguish between a formula being a law and a formula being (universally) true or being a law which holds without exception.21 Embracing this distinction, Swinburne claims that miracles might suitably be called violations of the laws of nature where the laws of nature do not imply universality (exceptionlessness). Such a model might work as follows. Consider some purportedly miraculous event E and a law of nature L (both in the same world). We saw earlier that on the exceptionless generalization view, E would necessarily be subsumed under a further set of laws L₁. But this is not the case on the best systems approach. It is not necessarily true that E can be subsumed under a new set of laws. Swinburne explains:

[...] L will have to be retained as a law of nature and E regarded as a non-repeatable counter-instance to it, if any proposed rival formula L_1 were too much more complicated than L without giving better new predictions, or predicted new phenomena unsuccessfully where L predicted successfully.²²

Using the criterion Swinburne provides, it seems that there is logical space for events outside the laws of nature as long as these events are sufficiently irregular such that incorporating them into a *new* set of laws would make the resulting laws less adequate in terms of simplicity and strength.

While the best systems view is certainly an advance over the exceptionless generalization view, I maintain that it suffers from at least one major defect, namely, it excludes the possibility of what I call recurrent miracles. Recurrent miracles are a species of divine action in the world that occur in a regular, predictable manner and that satisfy the

²⁰ From a recent personal conversation. Also, see Richard Swinburne, *Mind, Brain, and Free Will* (Oxford: Oxford University Press, 2013), pp. 125-40.

 $^{^{21}}$ Richard Swinburne, *The Concept of Miracle* (New York: Macmillan, 1970), p. 30. Italics in original.

²² Ibid., p. 29.

conditions necessary to be included in the best system of natural laws. For instance, suppose that every time I release a pen in mid-air, God causes the pen to fly up into space instead of falling to the ground. Suppose this phenomenon occurs not just to me but to everyone in a regular, predictable manner. Of course, this scenario is logically possible. If this were to occur, however, the best systems view would have to categorize such behaviour as an instance of a law of nature. For suppose that it did not: there would then be a vast range of phenomena that the axioms of the best system would not account for. Thus, these recurrent miracles would have to be included as part of the laws of nature rather than being violations of them. But then our previous problem reappears: given Hume's definition, recurrent miracles would not be miracles at all. In other words, the best systems view implies that recurrent miracles, as I have defined them here, are logically impossible.

Again, this conclusion ought to be problematic for those (theists and most atheists) who think that recurrent miracles *are* logically possible. Indeed, some Christians hold that recurrent miracles are not only logically possible but also actual. For instance, some maintain that the real transformation of the bread and wine into the body and blood of Christ takes place in a regular, predictable manner, and under specified conditions.²³ Some Christians think that God miraculously unites a person's soul to his or her body at the moment of conception. Such miracles would again be regular and predictable under specified circumstances.²⁴ These, I suppose, might be cases of actual, recurrent miracles. Nevertheless, my claim is weaker: I contend only that such miracles are possible, and my thesis goes through on this much weaker assumption.

The conclusion I gather from the discussion of the best systems view is this: the account makes logical room for miracles as long as such events are highly irregular and do not fit within the best system of laws. It is perfectly possible, however, that recurrent miracles should

²³ For instance, in *Summa* 3, question 76, article 8, Aquinas writes concerning the Eucharist: 'It remains to be said, that, while the dimensions remain the same as before, there is a *miraculous* change wrought in the other accidents, such as shape, colour, and the rest ... And, as was said already, this is not deception, because it is done "to represent the truth" namely, to show by this *miraculous* apparition that Christ's body and blood are truly in this sacrament.' Italics mine. Thomas Aquinas, *Summa Theologica*, available at: http://www.newadvent.org/summa/4076.htm [accessed September 4, 2014].

²⁴ I have Luis Pinto de Sá to thank for these examples.

exist. But when conjoined with Hume's definition of a miracle, the best systems view entails that they *cannot* exist. Thus, we are landed back with the same problem afflicting the exceptionless generalization view. Yet surely this is wrong, for it is entirely possible that God might perform recurrent miracles.

To summarize the first section, I want to draw attention to the deeper problem that, I think, afflicts the Humean position regarding miracles and the laws of nature. When the Humean denies the existence of real causal connections and intrinsic dispositions within nature, she is left trying to build 'laws' out of the regularities the world's vast array of disconnected events. The problem, as I hope to have shown, is that there might be miracles that fit *any* such law-construction which the Humean puts together. The upshot is that miracles become parts or instances of the laws of nature. When conjoined with Hume's definition of a miracle, of course, such miracles are ruled out by definition. This unwanted consequence strongly suggests that we should look elsewhere for a more sensible account of miracles.

II. DISPOSITIONALISM AND MIRACLES

In this section, I propose a different, more intuitive way to think of miracles within the context of a neo-Aristotelian metaphysics. The view I have in mind assumes a metaphysical position regarding the nature of properties known as dispositionalism. The roots of dispositionalism can be traced back to Aristotle, and its recent defenders include Alexander Bird, Stephen Mumford, Brian Ellis and Caroline Lierse, E. J. Lowe, Sydney Shoemaker, and others.²⁵ For the purposes of this paper, I will regard Bird's view as representative of the dispositionalist account.

Dispositionalism, according to Bird, is the view that all properties have their particular dispositions essentially; for an entity E to have a property means that E is disposed to bring about a particular manifestation (or manifestations) under a certain stimulus.²⁶ Further, *that* particular property has those exact dispositions in all possible worlds (at least in

²⁵ Alexander Bird, 'The Dispositionalist Conception of Laws', Foundations of Science, 10 (2005), 353-70; Mumford, 'Normative and Natural Laws', pp. 265-82; Brian Ellis and Caroline Lierse, 'Dispositional essentialism', Australasian Journal of Philosophy, 72 (1994), 27–45; Lowe, 'Miracles and Laws of Nature', pp. 263-78; Sydney Shoemaker, Identity, Cause, and Mind (Cambridge: Cambridge University Press, 1984).

²⁶ Alexander Bird, 'The Dispositionalist Conception of Laws', pp. 354-55.

those in which the property is instantiated). For example, electrons have the property *being negatively charged* and, by virtue of this property, have the essential disposition to repel other negatively charged objects. The conditional analysis of a disposition can be represented as:

$$(CA) \quad \forall x (Dx \leftrightarrow (Sx \Box \rightarrow Mx))$$

where D is a disposition, S a stimulus, and M a manifestation. This biconditional states that x has a certain disposition D just in case if x were under a stimulus S, then x would manifest M. The laws of nature, in turn, are derivable from the nature of properties. From (CA), Bird is logically able to arrive at

(L)
$$\forall x ((Dx \& Sx) \rightarrow Mx)$$

which is the statement of the law of nature.²⁷ And since the dispositionalist asserts that properties have their dispositions essentially, Bird concludes that laws of nature, if they track the essences of dispositions, will be metaphysically necessary.²⁸

Bird soon recognizes, however, that (L) is defective as it stands. For an entity might have a dispositional property and yet fail to yield its manifestation when it is appropriately stimulated. Bird uses the example of a vase that has the dispositional property F, being fragile. Under normal circumstances, a vase that has F will break when struck with a hammer. Suppose that this particular vase has F but that when it is struck with a hammer, the strike instantly causes the vase to heat up thereby preventing the vase from breaking.²⁹ C. B. Martin has labelled this type of disposition finkish.³⁰ Alternatively, to use Lewis's example, suppose that at the very instant the vase is struck with a hammer, a powerful wizard casts a spell on the vase causing its internal structure to become rigid; as a result, the vase does not break. In this case, the wizard has 'finked' the vase. Before the vase is struck, it has the intrinsic disposition to break when struck. Yet it is false that if the vase were struck, then it would break. Both of the above examples provide counterexamples to (L).

Consider, as another example, the hemlock responsible for killing Socrates. The hemlock has the dispositional property of *being deadly* when ingested. Yet, suppose Socrates takes an antidote immediately after

²⁷ Ibid., pp. 355.

²⁸ Ibid.

²⁹ Ibid., p. 358.

³⁰ C. B. Martin, 'Finkish Dispositions', *Philosophical Quarterly*, 44 (1994), 1-8.

the poisonous ingestion; as a result, he does not die from the hemlock. Do we conclude that the hemlock lacked the property *being deadly when ingested*? No. We say that although the hemlock did have that dispositional property the antidote introduced an external feature that prevented the disposition from being manifested. Bird refers to such a feature by the technical term *antidote*, which is also known as (and which I will refer to from now on as) a *mask*.

Therefore, we can now see that any dispositionalist account needs to describe the laws of nature *in the absence* of finks and masks. Bird does this by refining (L) and introducing a *ceteris paribus* clause into the formulation:³¹

(L') $[\forall x ((Dx \& Sx) \rightarrow Mx), \text{ so long as D's finks and masks are absent}]$

Under this construction, the laws of nature are consistent with dispositions' existing while not bringing about their characteristic manifestations.

Given these conceptual resources, I suggest that there can be a coherent understanding of miracles within the metaphysical framework of dispositionalism.³² On such a view, miracles do not *violate* the laws of nature; rather, they are events whose causal source lies outside the dispositional capacities found in the world.³³ Some of God's miraculous actions in the world would be cases of divine finks and masks. He would

³¹ Alexander Bird, Nature's Metaphysics, p. 60.

³² For an excellent exposition of this view, see Toby Handfield, 'Dispositional Essentialism and the Possibility of a Law-Abiding Miracle', *The Philosophical Quarterly*, Vol. 51, 205 (Oct., 2001), 484-94. Handfield shows how miracles are law-abiding within the framework of dispositional essentialism. My approach takes some of these same ideas and applies them specifically to theistic miracles, such as the resurrection. In particular, my aim is to show how the dispositional essentialist view regarding miracles is superior to the Humean regularity view.

³³ At this point, I might be accused of asymmetry in my attack on neo-Humeanism and proposal of neo-Aristotelianism. For while I argue that violations (or at least certain violations) of the laws of nature are impossible on the neo-Humean account, the same is true of the dispositional account. To violate a law on the dispositional account is impossible because the laws are metaphysically necessary. However, as I explained earlier, the Humean is left with only one equally implausible option: the view that miracles are parts (or instances) of the laws of nature. By contrast, the dispositionalist is able to distinguish events which are neither violations nor parts of the laws of nature. This third option – that miracles are divine interventions which neither violate the laws of nature nor are subsumed by the laws – is unavailable to the neo-Humean.

have empirical effects in the world none of which would alter or break the laws of nature.³⁴

Consider a couple of examples. Suppose we reduce the entire event of the Red Sea's³⁵ parting to a couple water molecules that have a natural disposition to attract each other through the process of cohesion. Each of the molecules has the dispositional property of *being attracted to other water molecules in close proximity*. Now, when God intervenes, he causes the proximate molecules to separate rather than to unite. Thus, the molecules miraculously separate since the disposition of the molecules to attract is not manifested. In this case, God's external influence is a mask in the system. And since, according to (L'), laws of nature require dispositions to yield their manifestations only in the absence of finks and masks, the miracle of the parting water molecules occurs without altering or violating the laws of nature.

Consider another example. When human beings die, their bodies have the disposition to remain dead, to decompose, etc. It is true, then, that in the absence of finks and masks, the laws of nature preclude a dead man's body coming back to life. But, suppose that in the case of Christ's post-crucifixion body, God intervenes in the world by introducing a divine fink. He changes the biochemical structure of Christ's body such that it does not manifest the usual dead-body dispositions. Such a miracle would not count as a breaking of the laws of nature because the dispositionalist claims that the laws proscribe men from resurrecting from the dead *in the absence* of finks and masks. Lewis's sorcerer casts a spell on the vase such that it does not manifest its fragile dispositions when struck. Similarly, God might change the structure of Christ's body so that his body's ordinary, dead-person dispositions are not manifested. Once again, such a miracle would be consistent with the laws of nature as formulated in (L').

Further, the dispositionalist is easily able to account for recurrent miracles: finks and masks might occur an unlimited number of times, regularly and predictably, without violating any laws of nature. By contrast, on the best systems view, recurrent miracles must be incorporated into the best system of laws and therefore become parts of the laws themselves.

³⁴ As I mentioned in footnote 6, I do not mean to imply that this is the *exclusive* way that God might act in the world. Divine activity might come in many forms, and what I am describing is simply one of them.

³⁵ Or perhaps more accurately, the Sea of Reeds.

In sum, I have sketched a way of thinking about miracles that, in my mind, is an advance over the Humean way of understanding them. By introducing dispositions into the structure of the world, the neo-Aristotelian has the conceptual resources to think of miracles as events that occur beyond the natural dispositions of objects. The laws of nature track the nature of dispositions and therefore do not depend – unlike the Humean account – on constructing laws out of regularities.

III. SEVERAL OBJECTIONS

I will now consider four objections to the account I have proposed. First, one might worry that the possibility of recurrent miracles suggests that we might not be able to identify such regular events as miracles. For if God regularly finks or masks a certain disposition, we might confuse the miracle with a law of nature. Call this the epistemic problem. A few points in response. First, I think the dispositionalist will have to bite the bullet and acknowledge this possibility. But while this problem is *merely* an epistemic problem on the dispositional view, it is a much worse problem on the Humean account. The Humean account entails, as I have argued, that recurrent miracles are logically impossible. By contrast, the dispositionalist will, at worse, claim that we cannot know that a recurrent miracle has occurred. Even in the worst case scenario, therefore, the dispositionalist's problem is less acute. Second, we might in fact be able to know which miracles are recurrent by independent means. Those who place epistemic authority on divine revelation or tradition might have a means of knowing, for example, that transubstantiation is a recurrent miracle rather than a law of nature. Third, there does not seem to be any good a priori reason to think that humans should expect to be able to identify all recurrent miracles. Perhaps God has motives for keeping at least some recurrent miracles hidden. For these reasons, I do not think the epistemic problem is compelling.

A second worry is that finks and masks might be the results of our epistemic limitations regarding fundamental properties. Suppose – the objection goes – that the laws of nature contain *ceteris paribus* clauses that govern higher-order, *derivative* properties (e.g. fragility or the property of being poisonous) but that such clauses do not apply to *fundamental* properties (e.g., negative charge). Bird, for instance, maintains that finkish dispositions do not exist at the fundamental level and that it is

possible that masks do not either.³⁶ If this is right, then the problem is that God has no 'room' to intervene at the fundamental level in the form of divine finks or masks. And if we further suppose that higher-order, derivative properties are ultimately reducible to fundamental ones, then the worry might be that God cannot intervene in this way at *any* level.

A couple of points can be made in response to this objection. First, even if the fundamental laws of nature contain no ceteris paribus clauses, this does not necessarily imply that higher-order laws lack them as well. The implication would follow only if one were to assume reductionism or eliminativism about the laws of nature. However, there are strong reasons for thinking that such inter-level reductionism is misguided.³⁷ Second, while I grant along with Bird that finkish dispositions cannot apply to fundamental properties (a fink works by altering the causal basis of a disposition; and fundamental properties, by definition, do not have a causal bases), the story is different regarding masks. There is nothing internally inconsistent about masking a fundamental disposition. Bird believes that it is ultimately an empirical matter whether there are dispositions sensitive to masks. But given that the existence of fundamental masks is not metaphysically impossible, there is nothing incoherent about the idea that some fundamental disposition D toward a manifestation M might be masked by God. Therefore, this objection does not constitute a persuasive argument against the present account.

A third objection comes from considerations offered by Robert Adams.³⁸ Although Adams is sympathetic to an account similar to what I have sketched, he provides the following worry to the possibility of divine finking and masking.³⁹ Consider some entity X with a certain set of dispositional properties. If God has the power to fink/mask some of X's dispositions, then presumably he has the power to fink/mask *all* of X's dispositions for a certain period of time (say, an hour). Suppose that were the case; it is then hard to see (a) how X could remain in existence without manifesting any of its dispositions, and (b) how X could persist

³⁶ Alexander Bird, *Nature's Metaphysics*, pp. 60-65.

³⁷ For instance, this is one of the main points put forward by John Dupré and Nancy Cartwright. See John Dupré, *The Disorder of Things* (MA: Harvard University Press, 1993). See also Nancy Cartwright, *The Dappled World: A Study of the Boundaries of Science* (UK: Cambridge University Press, 1999).

³⁸ This same objection receives a similar response from Benedikt Paul Göcke. See Göcke, 'Did God Do It?', p. 12.

³⁹ Adams and Hughes, 'Miracles, Laws of Nature and Causation', pp. 221-23.

over time if there is a certain period (an hour) in which it manifests none of its dispositions. 40

Answering (a), I will assume, is sufficient for answering (b), for the worry behind (b) is that X does not persist through time because X's identity depends on a continuity of the manifestation of X's dispositions over time. A couple points can be made in response to Adams's worry. First, if God were to fink/mask all of a thing's dispositions, I am not certain it would have the consequences that Adams envisions. For while a thing's identity might depend on its *possessing* certain properties, it is not obvious that its identity depends on its manifesting those properties. Consider a grain of salt, for instance, which has certain properties: the disposition to dissolve in water, the disposition to cause a salty taste in my mouth, and the disposition to appear to have a white colour. If such dispositions were entirely removed, then Adams is correct: we might wonder how the grain of salt can legitimately be called a grain of salt. However, suppose the grain of salt retains the dispositions even though they are finked/ masked. There is nothing conceptually incoherent, I suggest, in thinking that this grain of salt should exist even if its dispositions – to dissolve in water, to produce a salty taste, to produce a white 'look' – are temporarily finked/masked. Second, even if I am wrong about my first point, the dispositionalist might respond that while God might have the ability to fink/mask all of X's dispositions, he might in fact refrain from doing so precisely for that reason: doing so would make X go out of existence (that is, assuming that Adams's conclusion is correct). Thus, God, as a matter of contingent fact, might not engage in the total finking/masking that Adams imagines. In sum, I think Adams worries, though important, are not sufficient to undermine the dispositionalist account of miracles that I have offered.

Finally, one might wonder whether the laws of nature are such that the *ceteris paribus* clause ought to include only *natural* finks and masks and exclude *supernatural* ones. In other words, one might think that the laws should take into account possible external interference only from the dispositions of natural things instead of actions from God. In

⁴⁰ At the end of his article, Adams hints at a possible solution that involves the Thomistic idea that there is one fundamental disposition, the liability to be affected by God, that cannot be obstructed by God and which grounds the continued existence of an entity. While this might be a possibility, my response to Adams's objection will not invoke the existence of such a fundamental disposition.

response, I agree with Toby Handfield that such a restriction on the laws of nature would be entirely arbitrary.⁴¹ What justification can be offered for the restriction of the laws to only natural finks and masks? It is hard to see how the restriction could be empirically justified, at least in a non-question begging way; and there is certainly no *a priori* reason to think that such supernatural interventions are impossible. Thus, the denial of the possibility of divine finks and masks is as strong as the denial of the possibility of miracles in general. Unless the objection begs the question against the dispositionalist account of miracles, I conclude that it lacks any force.

CONCLUSION

I have argued that the Humean definition of miracles is unsatisfactory given a neo-Humean Regularity theory about the laws of nature. Both primary versions of the Regularity theory – the exceptionless generalization view and the best systems view – entail that at least some miracles are logically impossible. This is an unwanted result for theists and atheists who affirm the logical possibility of miracles. By contrast, within the neo-Aristotelian metaphysics of dispositionalism one can think of miracles not as violations of the laws of nature but as divine activity that interacts with the dispositional capacities in the natural world. Miracles in the form of divine finks and masks would be entirely consistent with laws of nature since those laws contain built-in *ceteris paribus* clauses. In this regard, therefore, the neo-Aristotelian view makes better sense of miracles than the neo-Humean account does.⁴²

⁴¹ Handfield, 'Dispositional Essentialism', p. 490. Handfield maintains that the dispositionalist might simply deny that determinism regarding the laws of nature is possible. This is essentially the same point I'm making with respect to divine intervention in the world.

⁴² A special thanks for valuable comments from Eleonore Stump, Robert J. Hartman, Andrew Pinsent, Vincent Archer, and an anonymous reviewer. In addition, this paper received valuable feedback from audiences at the Ian Ramsey Centre for Science and Religion at Oxford University and at a summer seminar in Analytic Theology hosted by the University of Innsbruck.

A CAUSE AMONG CAUSES? GOD ACTING IN THE NATURAL WORLD

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Abstract. Contemporary debates on divine action tend to focus on finding a space in nature where there would be no natural causes, where nature offers indeterminacy, openness, and potentiality, to place God's action. These places are found through the natural sciences, in particular quantum mechanics. God's action is then located in those ontological 'causal-gaps' offered by certain interpretations of quantum mechanics. In this view, God would determine what is left underdetermined in nature without disrupting the laws of nature. These contemporary proposals evidence at least two unexamined assumptions, which frame the discussion in such a way that they portray God as acting as a secondary cause or a 'cause among causes'. God is somewhat required to act within these 'gaps', binding God to the laws of nature, and placing God's action at the level of secondary causes. I suggest that understanding God's action, following Thomas Aguinas, in terms of primary and secondary causation could help dissolve this difficulty. Aguinas moves away from this objection by suggesting to speak of an analogical notion of cause, allowing for an analogical understanding of God's causality in nature. With a radically different understanding of the interplay between secondary causes and God, Aquinas manages to avoid conceiving God as a cause among causes, keeping the distinctive transcendent character of God's causality safe from objections.

On the face of it, the idea of God acting directly in nature brings intellectual challenges both to philosophers and theologians, since it would appear to undermine nature's common course. Nevertheless, it seems necessary to formulate an account on how it is possible to understand that nature has its own laws and regular activities together with the claim that God can participate actively in the production of natural effects. After all, the God of Judaism, Christianity, and Islam is

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not a God of the side-lines. Their God is a God who acts in particular and special ways in the individual lives of human beings throughout history. It is crucial, then, for theologians and philosophers of religion to provide believers with an intellectually viable account of divine action in the universe.

The dilemma of God's action in nature could be stated thus: were God to intervene in nature, He would be breaking, suspending or simply not following the apparent lawful order that He created in the universe, which would, at least for some, imply an inconsistency in God's nature. Furthermore, this situation would seem to threaten the foundations of the natural sciences, since it would be impossible to discriminate between God's and nature's actions. A law-ruled universe, then, does not seem to allow for an external agent to act within it.

The change of the century, from 1990 to 2005 more specifically, saw the development of the project 'Scientific Perspectives on Divine Action', co-sponsored by the Vatican Observatory and the Centre for Theology and the Natural Sciences in Berkeley. Scholars taking part in this project discussed many innovative proposals concerning God's action in the created universe, most prominently those proposed by Robert Russell (among many others, 2006), Thomas Tracy (2012), John Polkinghorne (2001a), Arthur Peacocke (1995), Philip Clayton (1997), and Nancey Murphy (1995). Their main concern was to explain how God can be said to act within nature in ways which would develop history in the directions God wants, but without disrupting the lawful natural order. In this respect, it is important to bear in mind that most of these scholars address the question of these divine acts leaving aside the question of miracles. It is not the miracles that Russell, Tracy et al. want to explain, but rather how God can be said to guide the universe acting here and now in ways which do not disrupt the order of the universe. Thus, the notion of 'special providence' or 'special divine action' was introduced, in opposition to general divine action, which refers to the universal creation and upholding of the universe (and its lawful order) in existence. Special divine action, on the contrary, is a notion meant not to explain how God creates and sustains the universe, but rather it was used to express ways in which God guides history acting within the very laws of nature. Introducing this notion allowed these scholars to think and talk about divine action in a world described by the natural sciences without

¹ For example, Taede A. Smedes (2004: 39).

reference to particular divine interventions within the course of natural events, usually referred to as miracles.

The key and novel move in their argument was to find in the current scientific theories 'places', loci, where to locate God's action: because their goal was to understand and to describe God's action in the natural world in non-intrusive terms, in a way that is complementary to the grain of nature, it was necessary to find real causal gaps in the causal order of nature within which God could act. These gaps would allow God to interact with creation without disrupting the works of nature, without breaking or intervening in its laws. Following the emergence of an indeterministic account of nature given by the development of quantum mechanics in the twentieth century, Russell, Tracy, Murphy and the others explored the possibility of understanding divine action through these indeterminacies. Thus, the indeterminism of quantum events offered these scholars the conceptual framework in which to place God's action, without disrupting the natural causal order, but determining its outcome nevertheless. Because the very laws of nature show that there are events which are open to several distinct outcomes, God could simply choose which outcome to determine without breaking those laws. This is the programme that Robert Russell named NIODA: the search for a non-interventionist, objective, divine action.

In addition to this 'quantum divine action' thesis, other proposals have also tried to use the non-deterministic character of twentieth-century science to offer non-interventionist proposals for divine action: John Polkinghorne, for example, has argued for divine action in and through chaotic systems, Arthur Peacocke suggested models of top-down divine causation, and Philip Clayton held that theories of emergence could be regarded as a viable path to think new models of divine action. All these different approaches are discussed within the five published volumes of the project, and they all deserve careful attention.

I will take Russell's quantum divine action thesis as the case study of this paper. Even after having received much criticism, Russell still holds it, counter-arguing the many objections existing in the literature.² I believe, however, that there are some assumptions in his proposal that still need careful consideration. In few words, I contend that this way of understanding divine action requires conceiving of God acting as natural causes do, a conclusion that not many theologians would want

² See, for example, Russell (2006).

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to accept if God's transcendence is to be maintained. The root of this problem lays on the very notion of causality used in the contemporary debate on divine action, which I find remains also unexamined. After presenting Russell's proposal in detail and my analysis of it, I will suggest considering the issue through the thought of Thomas Aquinas. I want to suggest that his ideas on this topic, in particular his way of distinguishing the primary from secondary causes, can shed new light in our understanding of God's acting in the created universe.

I. NIODA AND QUANTUM DIVINE ACTION

Modern science, *i.e.* science from the seventeenth to the late nineteenth century, seemed to picture a purely deterministic universe, which created a dilemma for explaining, or even admitting, any kind of special divine action: were God to act, God would be breaking the laws of nature. Only general providence conceived as the creating and sustaining of the universe could be accepted.³ Russell (2007: 202) acknowledges this situation and faces it, trying to offer Christians a valid account of special divine acts. With the arrival of quantum mechanics by the end of nineteenth century, however, modern science was challenged, and a conception of a causally open and indeterministic universe began to develop, at least in its most fundamental level. This new picture of nature meant that the laws which science used to describe the behaviour of nature, at least at one level, suggested that nature presented 'ontological causal gaps' in its commonly regular behaviour.

The dilemma of divine action appeared, then, to be diluted: in an indeterministic universe God could act within nature without breaking or suspending any natural law. A description of these special divine actions, according to a non-interventionist objective divine action account, appeared to be a plausible theological tenet. Theology could once again hold that God acted in the world objectively and that God did so without intervening in, breaking, or suspending the laws of nature. In Russell's words (2006: 583):

God's special objective action is non-interventionist when it brings about events which go beyond those described by the laws of nature without contravening or disproving them, because natural efficient causality, as

³ For modern scientists' views on divine action, see, for example, Peter Harrison (1995).

described by these laws, is created by God *ex nihilo*, to be insufficient to bring these particular events about.

The question, then, is: how does God act through quantum events? The standard interpretation of quantum mechanics, the Copenhagen interpretation, explains that the key event in a quantum system, the collapse of the wave-function, is of an indeterministic nature. Russell (2006: 591), among many others, accepts this interpretation making the additional claim, key for my argument, that the total set of natural conditions affecting a quantum process, that is, the total set of conditions which science discovers and describes through its equations, is necessary but insufficient in principle to determine the precise outcome of the process. For Russell (2001: 293), God acts together with nature to bring about quantum events, in a way that can be understood as nature providing the necessary but insufficient causes, and God complementing with His action nature's insufficiency, in order to constitute the sufficient cause of the occurrence of the event. In this account, then, God would act purposefully within the on-going natural processes without disrupting these processes or violating the laws of nature. In addition, for Russell, because no quantum event is fully determined by natural causes, God acts in all of them, since the principle of sufficient reason requires that there are sufficient causes for each event. On certain occasions, however, God will choose to actualise one state in particular, and not the other, because that state, and not the other, conveys God's providence. In this manner, God fulfils what nature offers, providentially bringing the future which He promised for all creation, acting specifically in all events. God acts, then, objectively and directly in and through all quantum events to actualise one of the several potential outcomes.

Alvin Plantinga (2011) has lately endorsed a similar view in his latest book. He argues that because of the great challenge that quantum mechanics puts against the deterministic view of nature endorsed by most modern scientists, theologians do not face a great problem in allowing God to interact with nature. The central idea is that God acts within the quantum system at the collapse of the wave-function, much like Russell suggests. Plantinga, however, holds that the Copenhagen interpretation chosen by Russell renders God's special acts to be too episodic. Instead, he favours the Ghirardi-Rimini-Weber (GRW) interpretation, which allows for collapses to happen besides and beyond measurements.

Plantinga explains that on this approach (2011: 116, emphases in the original):

[W]e could think of the nature of a system as dictating that collapses occur at the regular rate they in fact display. What is presently of significance, however, is that on these approaches there is no cause for a given collapse to go to the particular value (the particular position, for example) or eigenstate to which in fact it goes. That is, there is no physical cause; there is nothing in the previous physical state of the world that causes a given collapse to go to the particular eigenstate to which it does go. But of course this state of affairs might very well have a nonphysical cause. It's wholly in accord with these theories that, for any collapse and the resulting eigenstate, it is God who causes that state to result. Perhaps, then, all collapse-outcomes (as we might call them) are caused by God. If so, then between collapses, a system evolves according to the Schrödinger equation; but when a collapse occurs, it is divine agency that causes the specific collapse-outcome that ensues. On this view of God's special action - call it 'divine collapse-causation' ('DCC') - God is always acting specially, that is, always acting in ways that go beyond creation and conservation, thus obviating the problem alleged to lie in his sometimes treating the world in hands-off fashion but other times in a hands-on way.

The indeterminacy of quantum mechanics is, then both for Russell and Plantinga, what offers a solution to the special divine action problem. For them, it is God, a *non*-physical cause, that fulfils nature to be the cause of the collapse of the wave function.

Confronted with the question of God's causal status in comparison to that of natural causes, again both Russell and Plantinga affirm that given the ontologically indeterministic interpretation of quantum theory, science discovers that there are no sufficient natural (physical) causes for the specific quantum events, which implies that God is not a natural (physical) cause. If this were the case, Russell (2006) continues, God's action could be discovered by science. Thus, they argue, God is not acting as a natural cause and God's action remains hidden from science: where science employs quantum mechanics and philosophy points to ontological indeterminism, faith sees God acting with nature to create the future. Russell (2006: 587) states: 'If God acts together with nature to produce the event in which a radioactive nucleus decays, God is not acting as a natural, efficient cause.'

II. TWO UNEXAMINED ASSUMPTIONS

I want to argue in this section that the proponents of the quantum divine action thesis are ill-assuming that causality entails determinism, and that God acting in the world means less autonomy for nature. These two assumptions are evidence of the univocity of the notion of cause being used in this debate. Hence, the claim that God does not act as a natural cause would not hold. In fact, I will argue that there is no other way to understand God's action in the world if one holds that God has to act where there's no natural cause.

First I suggest analysing how the relation between cause and effect is understood in this scenario. It seems clear that, from the perspective of the quantum divine action thesis, a cause is that which determines the outcome of the development of a physical system. Thus, according to this interpretation of the causal nexus, the mere existence of an event which can be interpreted as a cause requires the existence of an event which is interpreted as its effect. Furthermore, the effect cannot be something different from what it is, given that the cause is required to cause what it is meant to cause, in a deterministic fashion. Most authors involved in the context of the debate on divine agency in nature today would, in fact, seem to agree with these ideas.

The indeterminism found in the nature of quantum events, thus, is not understood in terms of non-deterministic *causes*, but rather in terms of *a-causal* events. There is a lack of causality, and hence a lack of determination, in nature. For Russell, Tracy, Murphy, and Plantinga, quantum mechanics brings some break in the ontological causal chain at the subatomic level of nature. Thus, future events are not caused, and hence not determined, by previous natural events. The fact that contemporary science now offers a view of nature in which there can be novelty in its development is explained by a non-causal view of causation rather than an indeterministic type of causation. This seems clear when both Russell and Plantinga affirm, for example, that nature offers insufficient causes for the collapse of the wave function: there are no natural causes sufficient to cause quantum events.

My point here is that, even if Russell, Plantinga *et al.* affirm that the dilemma of divine action within a deterministic universe is broken given the indeterministic character of the universe discovered in the twentieth-century, the notion of causality assumed in these discussions remains a deterministic notion. This stance means, as I will attempt to

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show in the following pages, that the notion of cause is univocal, which in the end will make God to act at the level of natural causes. Russell and Murphy, for example, assume this notion when they want to explain why it is necessary to admit that God acts in every event which is not fully determined by natural causes. They argue that, given the insufficient character of nature's causality, if events are not caused by God's action then they would have no sufficient cause, and hence they could not possibly exist. Therefore causes, regardless of their physical or non-physical character, are to be thought of univocally.

Second, I find that scholars supporting the quantum divine action thesis seem to hold that were God able to act whenever and wherever God wants within the universe, the autonomy of nature in its actions would be endangered. The reason seems to be the following: there is a fundamental incompatibility between the view of God acting in the universe here and now and the universe having its own autonomous natural causal processes. In defence of the autonomy of the natural order and of the existence of real causal connections in that order, God's causal power is restricted. If there is a natural cause, then God is not acting there (and certainly could not be acting there). This notion, again, points toward the univocity of the idea of cause being used in the whole discourse about quantum divine action.

The urgency to find adequate ways to account for God's activity in the world without denying nature's proper autonomous processes seems to have forced theologians to equate God's causality with nature's causality: the only way in which God could do something within the natural realm is if there is a situation within the natural world that would have no cause, *i.e.* a place where nature does nothing. In these places, hence, there would be no autonomous natural action, because there would be no action at all. Therefore, were God to act in these, there would be no incompatibility between nature's autonomy and God's power.

Of course, those who hold the quantum divine action thesis to be a non-interventionist model of divine action, take an incompatibilist view regarding God's actions and natural causality: where there is natural causality, there cannot be special divine causality. In this sense, the necessity of explaining the autonomy of nature appears as an indication of some reduction in God's power or activity. If God is to act in the universe, then nature should not be acting where and when

⁴ Russell (2006: 591); Murphy (1995: 338); Plantinga (2008: 393-395).

God is to act. God's causal power, then, is to be restricted to those places and moments when nature lacks sufficient causal power. The notion of causality assumed in postulating the quantum divine action thesis, then, is a univocal notion which implies that a cause is that which determines the outcome of an event. Second, this very notion requires that God's causality, at least in regards to special divine actions, should not diminish nature's autonomous actions and integrity.

Given these assumptions, I argue that the quantum divine action thesis renders God to act (specially) as another created cause, or how it is commonly expressed, God is forced to act as a cause among causes, that is, as a created cause. The first issue to tackle now is the meaning of this expression. After all, everyone involved in these debates would agree that God is a cause, in at least a similar way in which created things are also causes. One should consider here that the objection that God is taken to act as a 'cause-among-causes' does not want to deny the fact that God is a cause, or to affirm that God should not be said to cause. On the contrary, this objection means that it is not a good theological move to consider God to be acting as secondary/created causes. The objection is thus making emphasis on God's upmost transcendence, stressing that when God acts, God is always causing as a primary cause, and never as a secondary, created cause. The basic idea behind this objection, then, is that God should not be placed at the level of created causes, because doing so would mean denying or diminishing God's transcendence. Certainly, this objection is not meant to deny the possibility of God acting within the created order of nature as a cause (for example in performing miracles), but to defend God's non-worldliness.

What the quantum divine action thesis tells us is, ultimately, that God is bound by the laws of nature to act in nature. God needs to find openings or causal gaps in these laws in order to act, meaning that these laws bind God to act according to them. As I said, it is the univocal notion of causality which is assumed in the whole debate about divine action that prevents any metaphysical elasticity to distinguish God's causality from natural, created causality. It is precisely because of this univocal notion that proponents of this thesis need to find places for God to act where there is no created causality. This thesis, in the end, requires one cause not to be sufficiently causing in order to have another cause complementing that act of causing. It seems evident, then, that this thesis considers both the insufficient cause and the complementing

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cause to be of the same kind, thus acknowledging the univocity of the notions of cause and causation.

In this state of affairs I see two paths to follow: 1) one can accept God to be considered as acting as a cause among causes - al la John Polkinghorne (2001b) in his kenotic considerations, where he affirmed that special divine providence is exercised as a cause among causes; or 2) one can revise and examine the assumptions. In this respect, one could a) revise the scientific data or b) look at the philosophical notions involved in the discourse about divine action. It certainly is not the task of the philosopher or the theologian to revise the work of the scientists, and thus option 2.a should be left out of consideration here. As I expressed above, option 1 does not really satisfy the traditional notions of God's transcendence, and the goal of the whole debate on divine action is to allow for the traditional transcendent God to act in the created universe: the preservation of the traditional notion of God together with the full acceptance of contemporary science appears to be the goal of all the proponents of the quantum divine action thesis. So I will follow option 2.b, considering some of Thomas Aquinas' ideas on causation and the relation between divine and creaturely, primary and secondary, causation, as to portray a picture where God's and creature's causalities interact in a non-univocal manner.

III. AQUINAS ON GOD AS A CAUSE IN NATURE

Thomas Aquinas dealt with the question of God as a cause in nature in several places of his work throughout his life. His main concern was to distinguish the causality of the primary cause from that of the secondary cause. I have elsewhere presented and analysed in detail his views on the relation between primary and secondary causation, so I will introduce these ideas only briefly here.⁵ Aquinas, however, further analyses this distinction by affirming that God cannot be considered to act as a univocal cause, but rather as an equivocal or analogical causation.

To say that one can distinguish causes analogically means, for Aquinas, that one can identify a variety of modes of causing, which would all share at least one essential feature. Thus, following Aristotle, Aquinas affirms that even if the four causes of material beings (material, formal, efficient,

⁵ See my 'Revisiting Aquinas on Providence and Rising to the Challenge of Divine Action in Nature' (2014).

and final) are all called causes, they cause in different ways. For Aquinas, a cause is always that upon which something depends for its being or becoming, but the modes of causality and dependency vary greatly depending on the kinds of causes involved. Each of the four different causes will cause in a particular way, being, each of them, that upon which something depends, though that dependence would be with respect to different features of the thing caused. The final cause, which receives the name of final because it is the last to be accomplished, is the aim which starts and guides the action of the efficient cause or agent. The efficient cause is that whose influx or action determines the existence of a new being: the effect. It causes by giving a new form in an already existing matter. This new form in an already existing matter is what constitutes the new being or effect. Thus matter is the subject which receives the form from the efficient cause, and the form, which is received in the matter, disposes the matter to be this or that different kind of being. In this perspective the formal cause explains why something exists as this particular kind of thing, and the material cause explains why it can cease to be what it is and become something else.

The key point here is that causality is an analogous notion which can be employed in a number of ways. A cause is always that upon which something depends for its being or becoming, but the modes of causality and dependency vary greatly depending on the kinds of causes involved. In this manner, God is also said to be that upon which everything depends, but not in any similar way to the ways which something depends on the four causes. The way in which things depend upon God is, Aquinas teaches, in their very being and existence, as I shall explain below via the four moments of God action through secondary causes. God is the primary cause of things because what God causes is the very existence of all things, without which things simply are not. The first thing, so to speak, which is required to do anything is to be. Because of this, the secondary cause cannot do anything if it is not by way of the primary cause, which brings me to the ways in which Aguinas understands how God can be said to act in nature, within the grain of the causal created order, and without disrupting this order.

To argue for this position Aquinas makes use of four different ways in which something can be said to be the cause of the action of something else.⁶ First, a (primary) cause can give another (secondary) cause its

⁶ See De Pot., q. 3, a. 7.

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power to act. Since every operation consequent to a certain power is also said to belong to the giver of that power, and all power of any agent whatsoever is from God, God can be said to cause all the actions of nature, because he gives natural things the powers by which they are able to act, as from the first principle of all perfection. Second, God may be said to be the cause of an action by upholding the natural power in its being. God not only gave existence to things when they first began to exist, but also *gives* existence to them as long as they exist. So God is also always causing their causal powers. Again, God can be said to be the cause of every operation of created causes. I have called these two ways founding moments of God's acting in and through natural agents, while I have named the next two ways the dynamic moments.

The third and fourth ways depend on Aquinas' understanding of an instrumental cause. Aquinas teaches that a thing is said to cause another's action by moving it to act, as when someone applies the causal power of an instrument to action, for example when a man uses the knife's cutting power by applying its sharpness to cutting a loaf of bread or a saw to a piece of timber. For Aquinas, an instrument, when acting as an instrument, has two different effects: one which pertains to it according to its own nature, and another which pertains to it insofar as it is moved by the primary agent and that transcends its own nature. Each of these effects refers to each of the two dynamic moments of God acting in and through created causes. On the one hand, the first of these two ways of causing refers to the first action of an instrumental cause. Every agent performs its action according to its own nature and powers, moved by God to act, and to achieve its proper effect, in my example the cutting of the loaf of bread or the timber. On the other hand, the second way of causing the action of the instrument refers to the causing of an effect which goes beyond the power of any created cause, in my example, cutting the loaf of bread the shape of a star, for the joy of children (which the knife cannot do by its own power). The effect that transcends the power of the natural being when being applied by God, but which could be attained by participation in God's power, is instantiated being.⁷ Aguinas adds that this can only happen by the immanence of the universal power of God, the primary cause. Therefore, since the cause of an action is that by whose power that action is done, if one considers the power whereby the action is done, then the power of

⁷ See Wippel (2007); and my 'Revisiting Aquinas'.

the higher cause, God, is more immediate to the effect than the power of the lower cause. In these senses, then, is how Aquinas predicates to God that He is a cause in nature.

Even if one can say that God causes in nature, and in affirming this one is somewhat acknowledging that God and created causes cause in a similar way, i.e. in being that upon which things depend, the way in which the word 'cause' is predicated of the primary cause, God, is not the same as the way it is predicated of natural things. The use of the word 'cause' for God requires some qualification. Following his neo-Platonic analysis in his Commentary to the Book of Causes, Aquinas says, as I mentioned, that the primary cause is more influential in the effect of the secondary cause than the secondary cause itself. Given that the very being of the secondary cause is caused by the primary cause, all that the secondary cause is, is caused by the primary cause. The secondary cause is the real cause of its effect. Nevertheless, properly speaking, the primary cause is primarily the cause of the effect of the secondary cause, and then the secondary one can also be said to be a cause. Moreover, since the secondary cause does not act upon the effect except with the power of the primary cause, the effect does not proceed from the secondary cause except because of the power of the primary cause. Hence, the power of the primary cause, rather than that of the secondary cause, attains firstly to the effect.

These features of God's causality mean, Aquinas argues, that God's causation should not be thought of as a univocal cause, like when an animal generates another animal of the same species or when a quantum system produces a quantum event. Rather, Aquinas regards God's causation as analogical causation (or equivocal causation sometimes. It does not matter much for my argument which of these options Aquinas preferred at his time.) What really matters here is that for him God does not cause univocally. As Rudi Te Velde explains, 'the creature is the same as God but differently. While God is his being, the creature only participates in being, and thus possesses being.' God's effect falls short with respect to the perfection of its cause. The effect receives a diminished and remote likeness of God, although there is still an intelligible connection between cause and effect. Commenting on these ideas, William Stoeger and John Wippel emphasise that Aquinas' model of primary and secondary causes was developed precisely to stress that when one refers to God as

⁸ Te Velde (2006: 114). See also, In I Sent, d. 8, q. 1, a. 2, co.

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a cause, it is in a way which is unlike any other created cause, in a way that transcends what one can say or predicate about God.⁹

God, then, is said to be the cause of everything's action inasmuch as He gives everything the power to act and preserves that power in being (founding moments), and applies it to action inasmuch as by His power every other causal power acts (dynamic moments). This doctrine, however, should be understood in the sense that the causal powers of a natural thing suffice for being true causes in their own order, while requiring divine power to act, since God and the natural agents act on two different levels. Here is precisely where Aquinas' thought distinguishes from that of the scholars holding the quantum divine action thesis. The same effect, for Aguinas, is ascribed to a natural cause and to God, not as if God were complementing the lack of causal power in the natural cause, or the insufficiency of causality. It is not that part of the effect is performed by God and a part by the natural cause. Rather, for Aquinas the whole effect proceeds both from God and the natural cause, yet in different ways: just as the whole of the one same effect is ascribed to the instrument, and again the whole is ascribed to the principal agent.

Aguinas further argues that the operation of natural causes as secondary cause is, in a sense, necessary for God, because, even if God could produce the effect without nature. He wishes to act by means of nature in order to preserve order in things. It is not that God does not have the sufficient power to cause what He causes through natural causes. Were God willing to do so, He could. God, however, acts through natural causes because of the immensity of His goodness, by which He decides to communicate His similitude to things, not only in their existence, but also in their being causes of other things. Finally, this providential action is to be understood in the terms of the contemporary debate's special providential action, since it is an action which God does willingly here and now, when each natural agent acts, at any given time and place. Aquinas does not want to give away with the idea that God is involved in the actual working of the universe, and offers a complex analysis of the relations between the primary and secondary causes, in which the effect is produced by both the first and the secondary cause. This account of God's activity in nature helps to explain not only how God is profoundly involved in the course of nature, but also to understand the reason nature works at all.

⁹ Stoeger (2008: 232) and Wippel (2000: 117).

CONCLUSION

My suggestion is that the problems with the quantum divine action thesis arise because the debate on special divine action and contemporary science, and in particular the quantum divine action thesis, is working with a univocal notion of causality, which prevents any metaphysical elasticity to differentiate God's causality from natural, created, causality. Following Aquinas' analogical use of the notion of cause to refer to God and to natural beings, we are able to distinguish different created causes from the divine cause.

The quantum divine action thesis proponents, however, by trying to engage with the notions of causality which science presents in a univocal, loose flexibility to speak about God's action in the world. In the end, this is the ultimate reason for which God is considered to be acting as a natural cause. This is, as I suggest, a univocal notion which is both applied to God and to creatures, rendering God to act as a cause among causes. If the choice is to maintain a traditional notion of God, then I believe that we need to analyse, reflect, and evaluate those unexamined philosophical assumptions, in particular those about causality, which make it unavoidable to speak of a change in the notion of God.

BIBLIOGRAPHY

- Clayton, Philip. 1997. *God and Contemporary Science* (Edinburgh: Edinburgh University Press)
- Murphy, Nancey. 1995. 'Divine Action in the Natural Order', in Russell *et al.* (eds), *Chaos and Complexity: Scientific Perspectives on Divine Action* (Vatican City-Berkeley: Vatican Observatory-CTNS), pp. 325-357
- Peacocke, Arthur. 1995. 'God's Interaction with the World: The Implications of Deterministic Chaos and of Interconnected and Interdependent Complexity in Chaos and Complexity', in Russell *et al.* (eds), *Chaos and Complexity: Scientific Perspectives on Divine Action* (Vatican City-Berkeley: Vatican Observatory-CTNS), pp. 263-288
- Peter Harrison. 1995. 'Newtonian Science, Miracles, and the Laws of Nature', *Journal of the History of Ideas*, 56 (4): 531-553
- Plantinga, Alvin. 2008. 'What is "Intervention"?', *Theology and Science*, 6 (4): 369-401
- Plantinga, Alvin. 2011. Where the Conflict Really Lies: Science, Religion, and Naturalism (Oxford: Oxford University Press)

- Polkinghorne, John. 2001a. 'Physical Process, Quantum Events, and Divine Agency', in Russell *et al.* (eds), *Quantum Mechanics: Scientific Perspectives on Divine Action* (Vatican City-Berkeley: Vatican Observatory-CTNS), pp. 181-190
- Polkinghorne, John. 2001b. 'Kenotic Creation and Divine Action', in John Polkinghorne (ed.), *The Work of Love* (London: SPCK), pp. 90-106
- Robert Russell. 2001. 'Divine Action and Quantum Mechanics: a Fresh Assessment', in Russell *et al.* (eds), *Quantum Mechanics: Scientific Perspectives on Divine Action* (Vatican City-Berkeley: Vatican Observatory-CTNS), pp. 293-328
- Russell, Robert John. 2006. 'Quantum Physics and the Theology of Non-Interventionist Objective Divine Action', in Philip Clayton (ed.), *The Oxford Handbook of Religion and Science* (Oxford: Oxford University Press), pp. 579-595
- Russell, Robert. 2007. 'Five Key Topics on the Frontier of Theology and Science Today', *Dialog: a Journal of Theology*, 46 (3): 199-207
- Silva, Ignacio. 2014. 'Revisiting Aquinas on Providence and Rising to the Challenge of Divine Action in Nature', *The Journal of Religion*, 94 (3): 277-291
- Stoeger, William, SJ. 2008. 'Conceiving Divine Action in a Dynamic Universe', in Russell *et al.* (eds.), *Scientific Perspectives on Divine Action: Twenty Years of Challenge and Progress* (Vatican City-Berkeley: Vatican Observatory-CTNS), pp. 225-247
- Smedes, Taede A. 2004. *Chaos, Complexity, and God: Divine Action and Scientism* (Leuven, Paris, and Dudley, Mass.: Peeters)
- Te Velde, Rudi. 2006. Aquinas on God: The 'Divine Science' of the Summa Theologiae (Aldershot: Ashgate)
- Tracy, Thomas. 2012. 'Scientific Vetoes and the Hands-Off God: Can We Say that God Acts in History?', *Theology and Science*, 10 (1): 55-80
- Wippel, John F. 2000. *The Metaphysical Thought of Thomas Aquinas: From Finite Being to Uncreated Being* (Washington, DC: The Catholic University of America Press)
- Wippel, John F. 2007. 'Thomas Aquinas on Creatures as Causes of *esse*', in his *Metaphysical Themes in Thomas Aquinas II* (Washington DC: CUA Press), pp. 172–193

DIVINE ACTION AND GOD'S IMMUTABILITY: A HISTORICAL CASE STUDY ON HOW TO RESIST OCCASIONALISM

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Abstract. Today's debates present 'occasionalism' as the position that any satisfying account of divine action must avoid. In this paper I discuss how a leading Cartesian author of the end of the seventeenth century, Pierre-Sylvain Régis, attempted to avoid occasionalism. Régis's case is illuminating because it stresses both the difficulties connected with the traditional alternatives to occasionalism (so-called 'concurrentism' and 'mere-conservationism') and also those aspects embedded in the occasionalist position that should be taken into due account. The paper focuses on Régis's own account of secondary causation in order to show how the challenge of avoiding occasionalism can lead to the development of new accounts of divine action.

In solving problems it is not sufficient to make use of the general cause and to invoke what is called a *Deus ex machina*.

G. W. Leibniz, A New System of the Nature and Communication of Substances (1695)

I. DIVINE ACTION AND OCCASIONALISM: CONTEMPORARY WORRIES AND HISTORICAL CASES

Contemporary theologians, philosophers of religion and philosophers of science widely debate (and largely disagree) about what could be the best account of divine action. Nevertheless, they seem to have reached a consensus about what such an account should *not* be. The majority of the authors engaged in this debate refer to 'occasionalism' as the position that any satisfying account of divine action must avoid.¹ 'Occasionalism' is generally understood as the claim according to which God is not only constantly operating in the created world, but he is also the *only* cause causally efficacious, while finite creatures ('secondary causes' in the scholastic jargon) do not exercise any causal role.²

Occasionalism has a long history. During the medieval period, it was defended mainly among Islamic theologians. Authors such as Al-Ghazali were interested in demonstrating the inconsistency of the Aristotelian 'pagan' philosophy defended by Avicenna and Averroes. Among the arguments delivered against Aristotelianism, Islamic theologians argued extensively that finite creatures cannot have any causal efficacy on their own, by contending that God is the only cause constantly operating in nature. Yet, occasionalism never gained consensus among medieval Christian scholastics. The occasionalist position was discussed and rejected by all the main scholastic authors, from Aquinas to Suárez, and only a few medieval thinkers explicitly embraced it.3 Things suddenly changed in the second half of the seventeenth century. Not only did several of Descartes's disciples (Geulincx, La Forge, Cordemoy, Malebranche) explicitly brand occasionalism as the true output of Cartesianism, but all the most influential authors of the period (Locke, Boyle, Leibniz, Clarke, Bayle, Hume) considered occasionalism an option deserving serious consideration. Recognizing that 'occasionalism' has a history is important to avoid the risk of oversimplifications and misrepresentations in today's discussions.

In this paper I would like to focus on the case study offered by one of the most prominent Cartesian authorities of the end of the seventeenth century, Pierre-Sylvain Régis (1632-1707), in order to analyze how he attempted to resist the occasionalist position despite his endorsement of Descartes's philosophy. Régis's case is particularly interesting because it illuminates the insufficiency of other major scholastic attempts to resist occasionalism and presents an original new account of secondary

 $^{^{\}rm 1}$ See Murphy 1995 and 2009, Saunders 2002, Clyton 2004, Tracy 2009, Russell 2009, Silva 2011.

² For an overview of the occasionalist position see Freedoso 1994.

³ Perler and Rudolph 2000 provides the best discussion of medieval occasionalism. Yet, besides Islamic occasionalist only Pierre d'Ailly (1350-1420) and Gabriel Biel (1415-1495) are the main representatives of medieval occasionalism.

causation. The contemporary reader might wonder why Régis's case is relevant to *today*'s discussions since our contemporary conceptual landscape and account of the physical world seems incommensurate with that of a seventeenth-century Cartesian author. I have two responses to this concern.

My first answer is conceptual. In this paper I will concentrate my attention on the *metaphysical* argument defended by Régis, which is based on a reflection on the nature of God's immutability. At this level of metaphysical abstraction Régis's position should not be seen as incommensurate with today's discussions in theology and philosophy of religion since the concern for granting God's immutability is a metaphysical issue worth considering in itself.

My second answer is historical. Today's discussions on divine action often rely on a precise historical understanding of the seventeenth century 'scientific revolution,' which is usually depicted as the beginning of the ongoing process of the secularization of science. However, one of the main issues that remains unexplored is precisely how the concept of divine action evolved and in what ways did debates on divine action contribute to the later development of the scientific revolution. From this point of view, by examining Régis's position it will be possible to foster a more refined and less simplistic account of the interplay between metaphysical, theological and scientific concerns that shaped the debate on divine action across the seventeenth and eighteenth centuries.

In section 2, I outline Régis's argument against occasionalism and explain in which sense his account of secondary causation offers a new way to understand the relationship between divine action in nature and the causal efficacy of creatures. In section 3, I explain that the novelty of Régis's account is reflected in the early reception of his view and the criticism that it offers nothing but a form of occasionalism in disguise. Nonetheless, I also show that Régis's position is less idiosyncratic of what it might appear at first sight. To support this claim I offer evidence that his account of secondary causes is consistent, for instance, with some crucial points already defended by Spinoza for reasons analogous to that presented by Régis. In section 4, I offer a few conclusive remarks on the way in which this discussion can be useful for today's debates on divine action.

⁴ E.g. Dodds 2012.

⁵ E.g. Israel 2011.

II. RÉGIS'S ACCOUNT OF SECONDARY CAUSES AND HIS REJECTION OF OCCASIONALISM

Occasionalism is the result of two independent theses held together: (1) God acts *immediately* in nature, that is, he is immediately involved in the production of natural effects; and (2) secondary causes or finite beings do not have any causal power whatsoever. There are different ways to establish occasionalism. An *a priori* or theological way – defended mostly by Islamic theologians and seventeenth-century authors such as Malebranche – consists in showing that the first thesis entails the second. For instance, God's omnipotence entails that secondary causation is redundant. An *a posteriori* way – defended by Cartesian authors such as Geulincx and La Forge⁶ – consists in showing that the second thesis entails the first. For instance, since finite creatures *cannot* be causally efficacious (because, for different reasons that might be advanced, they fail to fully account for the production of phenomena that we observe), God must be constantly acting in nature in order to produce the events we experience.

From Aquinas to Suárez, a majoritarian alternative to occasionalism has been the so-called 'concurrentism'. Concurrentism holds the first thesis but rejects the second. Aquinas, for instance, agrees that God must be *immediately* involved in the operation of natural beings, although he aims to establish that this does not rule out secondary causation but leaves room for creatures to contribute to causal processes. The burden of concurrentism is to show *how* the cooperation between God and creatures can be presented in a consistent and convincing way. Concerning this problem, scholastics and later scholastics largely disagreed and offered a variety of different accounts that shall not concern us for our present purposes. However, it is important to note that a way

⁶ Aquinas refers to these kinds of arguments indirectly in *De Potentia*, III.7: 'according to Rabbi Moses some of the sages in the Moorish books of law asserted that all these natural forms are accidents, and since an accident cannot pass from one subject to another, they deemed it impossible for a natural agent by its form to produce in any way a similar form in another subject, and consequently they said that fire does not heat but God creates heat in that which is made hot.' Concerning La Forge see Sangiacomo 2014.

⁷ The main texts in which Aquinas defends this view are: *De Potentia*, III.7; *Summa Theologiae*, I q. 105 a. 5; *Summa Contra Gentiles*, III chs. 66-67; *Scriptum Super Sententiis*, II, dist. I, q. 1 a. 4. For an account of Aquinas's view on secondary causation, see Silva 2014. I will not discuss the consequences of Aquinas's position for human will and its freedom, on which see Dvořák 2013.

to avoid the difficulties raised by concurrentism is to reject *both* the thesis at the basis of the occasionalist position by holding that God does *not* act immediately in nature, but only mediately through secondary causes. Medieval opponents of Aquinas, such as John of Peter Olivi (ca. 1248–1298) and Durandus of Saint-Pourçain (ca. 1275-1332/4), were among the first defenders of this position, which is usually labelled 'mere conservationism', although I prefer to call it 'mediationism'. The majority of later scholastic authors, who were afraid of weakening the ontological dependence of creatures on God's power, regarded mediationism with great suspicion. ¹⁰

Régis's position does not match with any of the above-mentioned views. Régis rejects the first thesis of occasionalism by arguing that God *cannot* act immediately in nature. From this point of view, he agrees with mediationists and disagrees with both concurrentists and occasionalists. However, Régis also endorsed a qualified version of the second thesis held by occasionalists by arguing that secondary causes are not *per se* causes. This means that secondary causes do not have an intrinsic causal power, but they operate as instruments of God, able to bring about their effects only because the power they use is numerically the same as that of God himself. From this point of view, Régis's position is irreconcilable with that of both concurrentists and mediationists. Given this eccentricity of Régis's view, I will label it 'instrumental mediationism'. In the rest of this section I present Régis's reasons for defending such a position.

Régis's ontology admits three kinds of entities. The first is God, who is an absolutely perfect substance (i.e. a thing existing in itself or 'en elle-même'),¹² first cause and the creator of everything. The second includes two imperfect and dependent substances, namely, body and mind (*esprit*).¹³ The bodily substance is really distinct from the thinking

⁸ For a historical outline of the different positions and their evolution see Schmutz 2001.

⁹ Concerning Olivi see Frost 2014; concerning Durandus see Schmaltz 2008: 19-24.

¹⁰ See e.g., Suárez DM 22.1.1-23.

¹¹ In discussing Régis's position, I will refer to his two main works: *Cours entier de philosophie, ou Systeme general selon les principes de M. Descartes*, published in 1691 (hereafter *Cours*), and *L'Usage de la rasion et de la foy* published in 1704 (hereafter *Usage*). All translations are mine. For present purposes, the differences that sometimes occur between these two works do not concern us. For an overview of Régis's position and its relevance in the early modern discussion, see Schmaltz 2002.

¹² See *Cours*, pp. 72-73.

¹³ See Cours, pp. 80-81.

substance and they are both completely general when conceived as substances; however, they can be modified in various ways. When the body and mind are modified in a certain way, they are expressed as 'modal entities' ('estres modaux'), which defines the third kind of entity admitted by Régis's ontology. Properly speaking, finite bodies and human souls (*âmes*) are not substances but 'modal entities', that is, ways in which the bodily or thinking substances are modified.

With this general picture in mind we can better appreciate how Régis explains the relation between God's activity and finite things:

When I reflect on the specific way in which modal entities act, I see that they have no efficacy on their own. Thus, to stress this difference between the effects that God and modal entities bring about, I will call God 'primary efficient cause', and the modal entities 'secondary efficient causes'. By 'primary efficient cause' I understand that cause that acts by itself and through itself, while by 'secondary efficient cause' I understand that cause that acts in virtue of another. Since secondary causes act more immediately than the primary cause, to stress this difference I will attribute the production of all the modal entities to the secondary causes rather than to the first cause. (*Cours*, pp. 109-110)¹⁴

Two major aspects of Régis's account must be stressed since both represent crucial departures from concurrentism. First, God *does not* act directly on modal entities. Régis eagerly repeats that 'when I reflect on the fact that since God is immutable he can act only through a very simple act of will; I see that the succession that is observed among modal entities cannot derive immediately from God; thus, it must derive from secondary efficient causes' (*Cours*, p. 110). ¹⁵ In other words, because the effects produced by modal entities imply change and succession, these

¹⁴ 'Quand je fais reflexion sur la maniere particuliere dont les estres modaux agissent, je conçois qu'ils n'ont rien d'eux-mêmes qui soit efficace ; c'est pourquoy, pour marquer cette difference par rapport aux effets que Dieu et les estres modaux produisent ensemble, je veux appeler Dieu, *Cause efficiente premiere*, et nommer les Estres modaux, *Causes efficients secondes*, entendant par cause efficient premiere, celle qui agit d'elle-même et par elle-même, et par cause efficient seconde, celle qui agit par la vertu d'une autre. Et parce que les causes efficientes secondes agissent plus immediatement que la premiere, pour marquer encore cette difference, j'attribueray la production de tous les estres modaux, non à la cause premiere, mais aux causes secondes.'

¹⁵ 'Lors que je fais reflexion que Dieu estant immutable ne peut agir que par une volonté tres-simple; je vois bien que la succession qui se rencontre dans les choses modales ne peut venir immediatement de luy, et que par consequent elle doit proceder des causes efficientes secondes.'

effects cannot follow from God immediately (since he is immutable and simple) but must be determined by other modal entities.

The emphasis on the fact that God does not act immediately in the operations of modal entities is crucial to Régis's attack on occasionalism:

I say 'secondary efficient causes' rather than 'occasional causes' because occasional causes are incompatible with the idea of God. In fact, if by 'occasional causes' I understand those causes that determine God to produce some effect that he would not produce otherwise (unless these causes would offer him the occasion by themselves and without that he predetermined them), this would suppose in God a kind of indeterminacy that is incompatible with his immutability. Yet, if by 'occasional causes' I understand those causes that determine God's will, which is by itself general, this would entail the same problem. Thus, I shall not say that secondary causes are occasional causes. (*Cours*, p. 110)¹⁶

According to Régis, occasionalism presupposes that God is not determined by himself to produce certain particular effects. From this point of view, occasional causes are incompatible with God's immutability since they determine God to produce something that he would not have produced without the occasional cause acting upon him. Moreover, the occasional cause is defined as acting upon God directly in order to determine him to bring about *immediately* the effect that the occasional cause by itself has no power to produce.¹⁷ This entails that occasional causes make God immediately responsible for the production of finite and specific effects, which are once again incompatible with divine immutability and simplicity. Régis rules out occasionalism as such by precluding any possible immediate involvement of God in the causal process.

Nonetheless, Régis is adamant in admitting that secondary causes do *not* have any intrinsic causal power and can act only because God's primary causation enables them to act in a certain way. To explain

^{16 &#}x27;Je dis des causes efficientes secondes, et non pas des causes efficientes occasionelles, parce que les causes occasionelles paroissent répugnantes à l'idée de Dieu; car si par causes occasionelles, j'entends des causes qui déterminent Dieu à produire quelque effet qu'il ne produiroit pas, si ces causes ne luy en donnoient occasion d'elle-memes, et sans qu'il les ait prevenues, cela suppose en Dieu une indetermination qui est incompatible avec son immutabilité; et si j'entends des causes qui determinent la volonté de Dieu qui est d'elle-meme generale, cela suppose encore le meme défaut. Je ne diray donc point que les causes secondes sont des causes occasionelles.'

¹⁷ The insistence upon the fact that occasional causes determine God to bring about effect was stressed by occasionalists such as La Forge 1997: 148.

this point, Régis introduces a further comparison between occasional causes and instrumental causes in order to claim that only the secondary efficient causes work as *instrumental* causes:

To reject this opinion [i.e. occasionalism], it is enough to show the difference between an occasional cause and an instrumental cause. The difference is this: we call *occasional* cause that which determines a free agent to act, but which does not contribute in anything to the agent's action. On the contrary, we call *instrumental cause* that which is determined to act by a principal cause, but in such a way that it modifies the action of the principal cause. [...] This being said, it will be easy to show that all secondary causes are instrumental causes in relationship to the first cause. (*Usage*, ch. 36, p. 205)¹⁸

While Aquinas and his followers maintain that secondary causes are *per se* causes, Régis argues instead that secondary causes have no active power 'd'eux-mêmes'. Because God cannot act directly by producing changes in modal entities, he has to use secondary causes as his own instruments. However, Régis does not accommodate instrumental causality with intrinsic powers of finite things, as it happened in the concurrentist tradition.¹⁹ Rather, he equates secondary causes with 'instrumental' causes in the sense that they do not have any causal power at all beyond the way in which God makes use of them.

To better explain this point, let us assume that a cause A produces the effect E. We can express this relation in the simplest way by saying that

$$A \Rightarrow E$$

On the one hand, a concurrentist (e.g. Aquinas) would modify this expression in order to integrate God's immediate and direct concursus, by stating:

^{18 &#}x27;Pour refuter cette opinion, il suffit de faire voir quelle est la difference qui se trouve entre la cause occasionnelle et la cause instrumentale. Or elle consiste cette difference, en ce qu'on appelle cause occasionnelle celle qui détermine un agent libre f agir, mais qui ne contribue rien f son action ; et on appelle au contraire cause instrumentale, celle qui est déterminée f agir par une cause principale, mais de telle sorte qu'elle modifie elle-meme l'action de cette cause principale. [...] Or cela posé, il sera aisé de faire voir que toutes les causes secondes sont des causes instrumentales à l'égard de la cause premiere.'

¹⁹ Aquinas's account of instrumental causes is analogous to that of secondary causes: instrumental causes remain *per se* causes, although their causal power is exploited by a superior agent to produce effects that the instrumental cause would not be able to produce by itself. On this point see Albertson 1954. Suárez will defend Aquinas's view in DM 17.2.12.

$$A (+God) => E$$

An occasionalist, on the other hand, would stress the fact that A can be only an *explanatory* cause, or rather it provides the *occasion* for God to produce E. In this sense, she would say that

However, Régis's solution differs from both these formulations. It could be expressed by saying that

$$God(A) \Rightarrow E$$

First, Régis differs from both concurrentists and occasionalists insofar as he rules out God's immediate intervention. God does not act immediately to produce any effect whatsoever but he acts only *through* secondary causes. For instance, God does not immediately move a body, say B, but the motive force (i.e. God's will) applied to another body, say A, determines B to move in a certain way (according to the law of motion) when A collides with B. Régis's point is that, although without God's power neither A nor B could produce any effect, once God has bestowed his power (i.e. the motive force), A is the more proximate cause that determines B's motion on the basis of the physical properties of both A and B.²⁰

Second, Régis denies (*pace* occasionalists) that bodies have *only* an explanatory role. In fact, bodies can play an explanatory role because they are immediately involved in the causal process.²¹ Finite bodies channel God's general power by specifying its efficacy in order to bring about finite effects that could not be directly derived from God's infinite and immutable power. Third, Régis also denies (*pace* concurrentists) that bodies are endowed with intrinsic causal powers. Rather, they can operate only because God applies his will to them. Modal entities are 'instrumental' or 'secondary' causes in the sense that they can operate *only* because God allows them to operate.²²

Régis's fundamental reason for denying the immediacy of God's action in nature is an appeal to God's immutability. Since God is eternal,

²⁰ See Cours, pp. 303-306.

²¹ See *Usage*, ch. 36, p. 205.

 $^{^{22}}$ From this point of view, I disagree with Ott 2008, and 2009: 112-130, who argued that Régis would have simply melded Aquinas's concurrentisms with seventeenth century mechanist physics.

it is inconceivable that mutable and changeable effects follow *immediately* from his own nature. Régis's reason to deny that secondary causes are *per se* causes is that since they fully depend on God in order to exist and to be conserved in existence, it would be absurd to claim that they can have causal powers on their own. This does not mean that secondary causes are causally inefficacious – as occasionalists contend – but rather that they 'channel' God's own power by modifying it in order to produce specific effects.

III. RÉGIS'S RECEPTION AND HIS DEBT TO SPINOZA

Not only did Régis never present himself as a concurrentist in Aquinas's sense, but his contemporaries never perceived him in this way either. The first reaction to Régis's position came from Jean Du Hamel (ca. 1633-1714), a scholastic professor of the Collège du Plessis, who published his Reflexions Critiques sur le systeme cartesien de la philosophie de M. Regis in 1692. Du Hamel attacks the claim that secondary causes cannot produce any true action. According to Du Hamel, God's immediate involvement in the causal process is completely compatible with the fact that secondary causes are per se causes.²³ From this point of view, De Hamel objects to Régis's perspective that the standard concurrentist view is better placed to reject occasionalism. Régis's answer is apparently puzzling for a concurrentist such as Du Hamel since Régis wants to maintain that secondary causes do have a power of acting (pace occasionalist), but this power is not essentially embedded in their own nature, being rather God's own power infused in the secondary causes themselves.24 From this point of view, Régis refrains from joining the standard concurrentist position.

This is the reason why Régis's solution was often received, rather ironically, as a form of occasionalism in disguise. In 1694, Henri de Lelevel published his polemical pamphlet *La vray et la fausse metaphysique ou l'on refute les sentiments de M. Regis*. Concerning the issue of secondary causation, Lelevel claims that Régis's secondary causes are nothing but *occasional* causes.²⁵ He points out that Régis's account of secondary causation faces a dilemma: either we can perceive that secondary causes

²³ See Du Hamel 1692: 149-150.

²⁴ In the case of human will, see the reply in Régis 1692: 85.

²⁵ See Lelevel 1694: 121-122.

are endowed with a real power of acting or we cannot.²⁶ The first case would lead to concurrentism, and it would be the only way to preserve a real causal efficacy for secondary causes. Yet, we know that Régis rejects it. If God's power is not really distinguished from the power of secondary causes, how can we claim that secondary causes have any power at all? If God participates in the production of a certain effect, why is God's omnipotence insufficient to bring about that effect? Lelevel recognizes that Régis comes to agree more with his occasionalist opponents than with his plausible Thomist allies. As a result, Lelevel concludes that Régis's account of secondary causes is doomed to collapse in occasionalism.

Jacob Gousset stressed this point even more forcefully. In his Causarum Primae et Secundarum realis operatio rationibus confirmatur (published in 1716), Gousset reproduces Lelevel's charge by arguing that Régis was actually an occasionalist and that his system was at odds with concurrentism as properly understood. Gousset believes that scholastic concurrentism is the only true remedy against occasionalism (Gousset 1716: 112). He acknowledges that Régis expressly attempted to argue against La Forge and Malebranche – the two major occasionalists whom Gousset discusses in his book. However, according to Gousset, Régis's argument against occasionalism is purely rhetorical.²⁷ According to Gousset, Régis's 'secondary causes' are nothing but causae sine quibus non - typically invoked by occasionalists.²⁸ While an efficient cause is directly responsible for the production of a certain effect, a causa sine qua non is merely a condition (an occasion) for such a production. Therefore, a causa sine qua non cannot have any causal power on its own and must not be confused with an efficient cause.²⁹ Régis's secondary causes are causae sine quibus non (i.e. occasional causes) in disguise.

Gousset also expresses his scepticism about Régis's analogy between secondary and instrumental causes.³⁰ In fact, Gousset stresses that instrumental causes discussed by concurrentists are really endowed with active powers that will be then exploited and applied by the principal cause in order to bring about effects that the instrument alone could not

²⁶ See Lelevel 1694: 125-126.

²⁷ See Gousset 1716: 64.

²⁸ See Gousset 1716: 22.

²⁹ Gabriel Biel and Pierre d'Ailly were the main scholastic supporters of occasional causes intended as *causae sine quibus non*, both mentioned by Gousset 1716: 124-128. Concerning Biel, see Perler and Rudolph 2000: 189-201.

³⁰ See Gousset 1716: 65.

produce. On the contrary, Régis's understanding of instrumental causality denies any causal efficacy *per se* to instrumental causes by admitting that they can operate only because God bestows his own power on them.

This quick overview of the reception of Régis's account of 'instrumental mediationism' among his contemporaries provides evidence that Régis's effort to find a new alternative to both occasionalism and concurrentism appeared disorienting and problematic since its very reception. Yet, was Régis's position really so idiosyncratic in the early modern period? We can better understand the status and degree of novelty of Régis's account of secondary causation by verifying what could have been a plausible early modern source for it.

Descartes is not a promising candidate. Descartes's followers interpreted him alternatively as the father of occasionalism (e.g. La Forge, Cordemoy, Malebranche) and as a classic concurrentist (e.g. Gousset). Today scholars also disagree on whether Descartes was an occasionalist (e.g. Garber 1992: 299-305), a concurrentist (e.g. Platt 2011), or a mere conservationist (e.g. Schmaltz 2008: 125-128). Be that as it may, Régis argues expressly against occasionalism. Moreover, he differs significantly from concurrentism because he denies that finite things are endowed with active powers. *A fortiori*, then, he could have neither been a mere conservationist. Hence, irrespective of how we decide to collocate Descartes's position, it seems safe to assume that Régis's own account of secondary causation is not deduced 'according to the principles of M. Descartes'.

Nor does Dom Robert Desgabets, who inspired several of Régis's claims, seem to be a feasible source of his account of secondary causation. Desgabets claimed that 'it is the contact among bodies that determines God to move those that were at rest.' The fact that a body determines God is exactly the kind of occasionalist claim that Régis wants to contrast. Moreover, Desgabets expressly argues that bodies do not have any force on their own and thus that all secondary causes should be dismissed. Desgabets's dismissal of secondary causes seems to support occasionalism rather than contrast it.

³¹ Desgabets 1983-1985, III, p. 88.

³² Desgabets 1983-1985, III, pp. 88-89.

³³ Schmaltz (2002: 256) agrees that 'Regis was more consistent than Desgabets in his rejection of an occasionalism in Lelevel and Malebranche that relates creatures directly to God'.

A more likely candidate to explain Régis's position is Descartes's most heterodox disciple, namely, Baruch Spinoza. In the *Usage*, Régis takes care to refute Spinoza's metaphysics.³⁴ Nonetheless, the refutation demonstrates two important aspects of Régis's attitude toward Spinoza. First, Régis knew very well Spinoza's *Opera Posthuma* and was well acquainted with the *Ethics*. Second, Régis's confutation of Spinoza concerns the claim that God is the *only* substance and each finite thing is just God's modification.³⁵ Actually, no one in the seventeenth century would have openly endorsed this claim. However, Régis admits that Spinoza's principles might be helpful to some extent.³⁶ In fact, Spinoza's metaphysics provides remarkable support for Régis's account of secondary causation.

First, Spinoza is deeply committed to the fact that God does not produce *immediately* any finite effect. Spinoza demonstrates that from God's infinite nature only infinite effects can follow (E1p21)³⁷. However, every finite thing must have been determined to act by God (E1p26).³⁸ Therefore, God must have determined every finite thing to act and operate only through other finite things (E1p28).³⁹ The resemblance of

³⁴ *Usage*, pp. 481-500. Concerning the historical background of Régis's refutation, see Vernière 1954, vol. 1, pp. 250-257.

³⁵ Henri de Boulanviller effectively summarized the general strategy of Régis's refutation by pointing out that 'la plus grande partie de ces difficultés ne consiste que dans une distinction de substance en général et de substance en particulier, ce qui le met hors de la question dont il s'agit, puisque Spinosa n'admet point de substance particulière' (Boulanviller 1973: 233. Boulanviller never published his manuscript of *Examen de la Réfutation faite par M. Régis de l'Opinion de Spinosa sur l'Existence et la Nature de Dieu*, which is actually not dated).

³⁶ E.g. *Usage*, p. 499: '[ils] servent au moins, quand ils sont pris dans un bon sens, à confirmer ce que nous avons dit de la nature et de l'existence de Dieu.' Régis is here referring to his account of God conceived as 'une Pensée parfaite' (ibid.).

³⁷ 'All the things which follow from the absolute nature of any of God's attributes have always had to exist and be infinite, or are, through the same attribute, eternal and infinite.' All quotes from the *Ethics* are from Spinoza 1994, quotes from other works are from Spinoza 2002.

³⁸ 'A thing which has been determined to produce an effect has necessarily been determined in this way by God; and one which has not been determined by God cannot determine itself to produce an effect.'

³⁹ Cf. E1p28dem: 'Whatever has been determined to exist and produce an effect has been so determined by God (by P26 and P24C). But what is finite and has a determinate existence could not have been produced by the absolute nature of an attribute of God [...]. It had, therefore, to follow from, or be determined to exist and produce an effect by God

Spinoza's argument to Régis's denial of God's *immediate* action is crystal clear.⁴⁰

Second, because finite things are nothing but modifications, they have no power to act for themselves. Finite modes completely depend on God's activity to bring about their effects. In the *Ethics*, however, Spinoza does not deny finite activity. Rather, he derives finite activity from the fact that things are a modification of God and God's essence is nothing but his power to act (E1p34). Hence, 'singular things are modes by which God's attributes are expressed in a certain and determinate way (by 1p25c), that is (by 1p34), things that express, in a certain and determinate way, God's power, by which God is and acts' (E3p6dem). Again, Spinoza claims that 'modal entities' do have causal powers. However, the causal efficacy of finite modes does not imply that they are causes 'd'eux-mêmes', but rather that God himself acts through them.⁴¹

Of course, Spinoza takes God as the substance to which finite modes inhere. Substance monism is crucial to fully understanding the meaning that these two claims have in the *Ethics*. Nonetheless, both claims do not conceptually depend on substance monism. God does not produce immediately any finite effect because finite effects cannot follow from an infinite cause. This claim does not depend on the thesis that God is the only substance, but rather on the ontological heterogeneity between infinite and finite effects. Furthermore, Spinoza denies that modes could be *per se* causes because modes do not exist *per se* but they inhere in a substance. Again, this claim does not depend on assuming that God is the only substance, but rather on the ontological difference between substance (existing *in se*) and modes (existing *in alio*). Spinoza's *Metaphysical Thoughts* (CM), published in 1663 as an appendix to the *Principles of Cartesian Philosophy*, provide evidence to the fact that

or an attribute of God insofar as it is modified by a modification which is finite and has a determinate existence.'

⁴⁰ Cf. E1p28s: 'since certain things had to be produced by God immediately, namely, those which follow necessarily from his absolute nature, and others [...] had to be produced by the mediation of these first things, it follows: I. That God is absolutely the proximate cause of the things produced immediately by him [...]. II. That God cannot properly be called the remote cause of singular things, except perhaps so that we may distinguish them from those things that he has produced immediately, or rather, that follow from his absolute nature.'

⁴¹ Spinoza often presents finite things as the passive material in God's active hands, as clay in the potter's hands (*chomer beyad hayotzer*) – a biblical metaphor Spinoza employs on several occasions (e.g., TTP, note 34).

these two points can be conceptually separated from substance monism. *Metaphysical Thoughts* is presented as a 'Cartesian' discussion and does not include any claim for substance monism.

In the CM, Spinoza suggests that God does not create immediately modifications of substances. 42 Spinoza defines creation as 'an operation in which no causes concur beyond the efficient cause; or that a created thing is that which presupposes nothing except God for its existence' (CM2, 10, p. 203). However, he expressly remarks that 'from this definition it clearly follows that there is no creation of accidents and modes. For these presuppose a created substance besides God' (CM2, 10, p. 204). Indeed, 'created is every thing whose essence is clearly conceived without any existence, and which is nevertheless conceived through itself: for example matter' (CM2, 10, p. 204). God directly creates and constantly conserves only *substances* and not their *modifications*. Only a substance is 'conceived through itself' while a mode is conceived through something else. This does not deny that modes, such as particular bodies, depend on God's power to produce whatever effect they produce. Should God stop to conserve their substances, modes would completely cease to exist. Nonetheless, God's creation and conservation implies only an 'indirect' concursus with finite modes. Spinoza himself recognizes that this view is quite far from that of Aquinas and other scholastics, 'who, accepting God's concurrence, interpret it in a sense quite at variance with what we have expounded' (CM2, 11, p. 207).

In the *Metaphysical Thoughts* Spinoza also argues that finite things have no other power than that provided by God's continuous concursus. According to Spinoza, finite things do have a 'striving' or 'conatus' to self-preservation, which suggests a power to produce certain effects. On the one hand, Spinoza argues against the 'distinction between the *conatus* of a thing and the thing itself' (CM1, 6, p. 188), that is, he suggests that the *conatus* ought not to be distinguished from the thing itself.⁴³ If finite things have such a conatus, they must be endowed with some causal efficacy. On the other hand, however, he claims that the 'force [through

⁴² Spinoza's correspondent, Willem van Blijenbergh, attributes this claim to him (cf. Letter 18, in Spinoza 2002: 806). However, in his replies, Spinoza only maintains that God (necessarily) creates and conserves the *essence* of each thing (see, e.g., Letter 23, in Spinoza 2002: 832), from which (necessarily) follows every effect that the thing can produce.

⁴³ Spinoza's argument seems here very similar to what Descartes puts forward in *Principles*, II, art. 43.

which things persevere in their own being] is different from the things themselves' (CM2, 6, p. 197). Finite self-preservation is only made possible and constantly supported by God's continuous creation. Finite things receive their power to act from God only, and this power does not exist in them beyond God's activity. As Spinoza writes, 'no created thing affects anything by its own force, just as no created thing began to exist by its own force' (CM1, 3, p. 184). More explicitly, he claims: 'we have demonstrated that things never have any power from themselves to affect anything or to determine themselves to any action' (CM2, 11, p. 207). Finite things do have causal powers, but these powers consist of nothing beyond God's own power.

I am not committed here to discussing whether these claims are coherent or fully consistent. The only point that I would like to stress is that the comparison between the *Ethics* and the *Metaphysical Thoughts* reveals that Spinoza constantly holds the two claims at stake: 1) God does not act directly in producing finite modes; and 2) finite things have no causal power of their own. Spinoza holds these two claims irrespective of his endorsement of substance monism. Both these claims are much in the vein of what Régis wanted to argue. The interesting point, of course, is not whether Régis was a full-blown Spinozist. Rather, the reference to Spinoza is worth noting because it confirms that in order to contrast the assaults of occasionalism, Régis did not simply resuscitate medieval concurrentism but preferred to defend a position already espoused by Spinoza. Arguably, Régis's account of secondary causation seemed so controversial to his contemporaries because it was difficult to encapsulate it in the three major scholastic accounts of God's concurrence.

⁴⁴ In the *Metaphysical Thoughts*, Spinoza follows Descartes (and the scholastic tradition) in equating creation and conservation. In his *Cours*, Régis distinguishes the immediate creation of substances from the *generation* of modal entities. Nonetheless, he states that 'la conservation des substances n'est que leur creation continuée' (*Cours*, p. 101). In his *Usage* Régis argues instead that creation refers to substances only while conservation refers to modal beings, and he rejects the scholastic equation between conservation and creation (*Usage*, pp. 158-166). Régis is led to this position by his need to defend the doctrine of the 'indefectibility of substances' that he inherited from Desgabets (see Schmaltz 2002: 94-113), which plays a much more prominent role in the *Usage* rather than in the *Cours*. For present purposes, however, this change only indicates that Régis is willing to weaken even that kind of *immediate* involvement of God's activity in finite beings that was represented by his continuous creation.

IV. REJECTING OCCASIONALISM: NOT SO EASY

The discussion of Régis's position offers evidence of the fact that rejecting occasionalism is by no means a simple enterprise. The exact meaning of the occasionalist claim that God is the only cause in nature depends on the specific arguments used to support it. Resorting to occasionalism as an *ultima ratio* solution for the problem of causal interactions among bodies is very different from defending occasionalism on the basis of strong *a priori* theological concerns regarding God's omnipotence. Even assuming that we should *not* embrace the occasionalist position, a mere denial of it does not entail any positive account of secondary causation in particular.

Régis's case illustrates some of the main problems that affect the two traditional alternatives to occasionalism developed in scholastic and later scholastic thought. Although concurrentism can be developed in a variety of ways, the very reason for embracing it is the possibility of maintaining the thesis that God acts immediately in nature, although without undermining the causal efficacy of secondary causes. However, this claim seems to conflict with God's immutability and infinity. Concurrentists try to avoid this problem by maintaining that God always operates uniformly in nature and that secondary causes actually modify and determine through their own causal powers God's general power. However, as Duns Scotus already noted (Ordinatio, IV, dist. 1, q. 4) against Aquinas, it is far from obvious that it would be possible to distinguish in a given effect a part of it immediately arising from God and another part immediately arising from the secondary cause. For instance, although Thomists could claim that God bestows a general esse on his creatures and then they modify it in specific ways, Scotus objected that in finite effects it is impossible to distinguish between this general esse and the determination arising from secondary causes. In fact, we do not experience general esse but always a specifically modified and determined being. But if it is not possible to clearly separate between what depends immediately on God and what depends immediately on the secondary cause, it seems unclear why and how the claim that God concurs immediately with secondary causes can be maintained. Furthermore, following Spinoza's argument, it seems impossible that finite effects could follow immediately from an infinite Being. From this point of view, Régis's instrumental mediationism has the advantage of avoiding these metaphysical worries.

However, Régis also acknowledges that there is a theological concern at the basis of occasionalism that should be taken seriously, which is about the ontological autonomy of secondary causes. Both concurrentists and traditional mediationists consider secondary causes as *per se* causes, that is, as intrinsically endowed with causal powers. Yet, since secondary causes completely depend on God for their existence and conservation in being, it seems difficult to conceive of how they could be endowed with causal powers *per se*, that is, with causal powers numerically different from God's own power. Should God withdraw his constant act of creation and conservation, secondary causes would simply cease to exist and act. This is the reason why Régis (and in a more extreme way Spinoza) defended a non-substantivist account of finite things, by conceiving them not as *substances* but rather as *modes* (i.e. as entities that cannot be conceived of *per se* but must be referred to something else in order to exist and be conceived).

To conclude, the case of Régis illustrates that when today's theologians and philosophers join their voices in the common admonition that a workable account of divine action should reject occasionalism, it must be carefully considered that such a rejection is neither easy nor univocal. Régis's position exemplifies that the more common and established alternatives to occasionalism are not without their own difficulties, to which Régis's 'instrumental mediationism' attempts to remedy. The take home message of this historical analysis is not that Régis's account must be universally adopted or taken as the ultimate solution to the problem of finding an alternative to occasionalism. Rather, Régis's case - with all the difficulties that it entails and that were perceived by his contemporaries – illustrates how the challenge of occasionalism forces us to critically evaluate past accounts of divine action and seek new solutions. This was true for Aquinas's earlier effort to outline the concurrentist model and for several later authors who were engaged in developing different varieties of it. This was true for Durandus's mediationism and for Régis's view as well. From this point of view, occasionalism can be appreciated in today's discussions if not as a viable position at least as a proper occasion to deepen the nature of divine action and its relationship with the causal power of finite creatures.

BIBLIOGRAPHY

- Albertson, James S. 1954. 'Instrumental Causality in St Thomas Aquinas', *The New Scholasticism*, 28: 409-435
- Aquinas, St. Thomas. *Opera Omnia*, ed. by Enrique Alarcon, available at: http://www.corpusthomisticum.org/iopera.html [accessed 23/11/2015], translated by Fathers of the English Dominican Province, available at: http://dhspriory.org/thomas/index.html [accessed 23/11/2015]
- Boulanviller, Henri de. 1973. *Oeuvres Philosophiques*, edited by Renée Simon (The Hague: Martinus Nijhoff)
- Clayton, P. 2004. 'Natural Law and Divine Action: The Search for an Expanded Theory of Causation', *Zygon*, 39, no. 3: 615-636
- Desgabets, Robert. 1983-85. *Oeuvres philosophiques inédites*, introduction par G. Rodis-Lewis, texte établi et annoté par J. Beaude (Amsterdam: Quadratures), 7 vols
- Du Hamel, Jean. 1692. Reflexions Critiques sur le systeme cartesien de la philosophie de M. Regis (Paris: Edme Couterot)
- Dodds, M. J. 2012. *Unlocking Divine Action: Contemporary Science and Thomas Aquinas* (Washington DC: The Catholic University of America Press)
- Dvořák, Petr. 2013. 'The Concurrentism of Thomas Aquinas: Divine Causation and Human Freedom', *Philosophia*, 41: 617–634
- Freddoso, Alfred J. 1994. 'God's General Concurrence With Secondary Causes: Pitfalls And Prospects', *American Catholic Philosophical Quarterly*, 67, no. 2: 131-156
- Frost, Gloria. 2014. 'Peter Olivi's Rejection of God's Concurrence with Created Causes', *British Journal for the History of Philosophy*, available at: http://dx.doi.org/10.1080/09608788.2014.949218> [accessed 23/11/2015]
- Garber, Daniel. 1992. *Descartes' Metaphysical Physics* (Chicago: University of Chicago Press)
- Gousset, Jacob. 1716. Causarum Primae et Secundarum realis operatio rationibus confirmatur, et ab abjectionibus defenditur (Leovardiae: Franciscus Halma, Ordinibus Frisiae Typographus)
- Israel, Jonathan. 2001. Radical Enlightenment: Philosophy and the Making of Modernity 1650-1750 (Oxford: Oxford University Press)
- La Forge, Louis de. 1997. *Treatise on The Human Mind (1664)*, translated with an Introduction and Notes by D. M. Clarke (Dordrecht-Boston-London: Kluwer)
- Lelevel, Henri de. 1694. La Vraye et la Fausse Metaphysique, ou l'on refute les sentimens de M. Régis et de ses adveraires sur cette matiere (Rotterdam: Reinier Leers)
- Murphy, Nancey. 1995. 'Divine Action in the Natural Order', in CC, pp. 325-357

- Murphy, Nancey. 2009. 'Divine Action in the Natural Order: Buridan's Ass and Schrödinger's Cat', in F. LeRon Shults, Nancey Murphy and Robert John Russell (eds), *Philosophy, Science and Divine Action* (Leiden-Boston: Brill), pp. 263-303
- Ott, Walter. 2008. 'Régis's Scholastic Mechanism', Studies in History and Philosophy of Science, 39: 2-14
- Ott, Walter. 2009. Causation and Laws of Nature in Early Modern Philosophy (Oxford: Oxford University Press)
- Perler, Dominik, and Ulrich Rudolph. 2000. Occasionalismus. Theorien der Kausalität im arabisch-islamischen und im europäischen Denken (Göttingen: Vandenhoeck & Ruprecht)
- Platt, Andrew R. 2011. 'Divine Activity and Motive Power in Descartes's Physics', British Journal for the History of Philosophy, 19, part I: no. 4: 623-646; part II: no. 5: 849-871
- Régis, Pierre-Sylvain. 1691. Cours entier de philosophie, ou Systeme general selon les principes de M. Descartes (Amsterdam: Huguetan)
- Régis, Pierre-Sylvain. 1692. Réponse aux Réflexions critiques de M. Du Hamel sur le système cartésien de la philosophie de M. Regis (Paris: Jean Cusson)
- Régis, Pierre-Sylvain. 1704. L'Usage de la Raison et de la Foy ou l'Accord de la Foy et de la Raison (Paris: Jean Cusson)
- Russell, R. J. 2009. 'Divine Action and Quantum Mechanics: A Reassessment', in F. LeRon Shults, Nancey Murphy, and Robert John Russell (eds), *Philosophy, Science and Divine Action* (Leiden-Boston: Brill), pp. 351-403
- Sangiacomo, Andrea. 2014. 'Louis de La Forge and the "Non-Transfer Argument" for Occasionalism', *British Journal for the History of Philosophy*, no.1: 60-80
- Saunders, Nicholas. 2002. *Divine Action and Modern Science* (Cambridge: Cambridge University Press)
- Schmaltz, Tad M. 2002. *Radical Cartesianism: The French Reception of Descartes* (Cambridge: Cambridge University Press)
- Schmaltz, Tad M. 2008. *Descartes on Causation* (New York: Oxford University Press)
- Schmutz, Jacob. 2001. 'La doctrine médiévale des causes et la théologie de la nature pure (XIIIe-XVIIe sičcles)', *Revue thomiste*, 101, nos. 1-2: 217-264
- Silva, Ignacio. 2013. 'Thomas Aquinas Holds Fast: Objections to Aquinas within Today's Debate on Divine Action', *The Heythrop Journal*, 54, no. 4: 658-667
- Silva, Ignacio. 2014. 'Revisiting Aquinas on Providence and Rising to the Challenge of Divine Action in Nature', *The Journal of Religion*, 94 (3): 277-91
- Spinoza, Baruch. 1994. *A Spinoza Reader: The Ethics and Other Works*, edited and translated by E. Curley (Princeton: Princeton University Press)
- Spinoza, Baruch. 2002. *Complete Works*, with the translation of Samuel Shirley, edited by Michael L. Morgan (Indianapolis: Hackett)

- Suárez, Francisco. 1994. On Efficient Causality: Metaphysical Disputations 17, 18 and 19, translated by A. J. Freddoso (New Haven: Yale University Press)
- Suárez, Francisco. 2002. On Creation, Conservation, and Concurrence: Metaphysical Disputation 20-22, translation and introduction by A. J. Freddoso (South Bend: St. Augustine's Press)
- Tracy, Thomas. 2009. 'Creation, Providence, and Quantum Chance', in F. LeRon Shults, Nancey Murphy, and Robert John Russell (eds), *Philosophy, Science and Divine Action* (Leiden-Boston: Brill), pp. 227-261
- Vernière, Paul. 1954. Spinoza et la pensée française avant la Révolution, (2 vols) (Paris: Puf)
- Vatican Observatory / Centre for Theology and the Natural Sciences Series:
- CC = Chaos and Complexity: Scientific Perspectives on Divine Action, Vol. II, ed. by Robert John Russell, Nancey Murphy, and Arthur R. Peacocke (Vatican City State: Vatican Observatory and Berkeley: Centre for Theology and the Natural Sciences, 1995)
- QCLN = Quantum Cosmology and the Laws of Nature: Scientific Perspectives on Divine Action, Vol. I, ed. by Robert John Russell, Nancey Murphy, and C.
 J. Isham (Vatican City State: Vatican Observatory and Berkeley: Centre for Theology and the Natural Sciences, 1993)
- TCP = Scientific Perspectives on Divine Action: Twenty Years of Challenge and Progress, ed. by Robert John Russell, Nancey Murphy, and William R. Stoeger, S. J. (Vatican City State: Vatican Observatory and Berkeley: Centre for Theology and the Natural Sciences, 2008)

TO MAKE A RAINBOW - GOD'S WORK IN NATURE

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Abstract. The Torah lays out a rich idea of God's governance in the Scroll of Esther: Circumstance lays the warp, but human choices weave the woof of destiny. God remains unseen. Delegation of agency, including human freedom, is implicit in the act of creation: God does not clutch efficacy jealously to his breast. Biblically, God acts through nature, making the elements his servitors. Miracles do not violate God's covenant with nature. Maimonides, following rabbinic homilies, finds them embedded in that covenant. Divine agency is clearest today in evolution and its special case, the emergence of autonomy and the rise of consciousness and personhood.

The book of Esther stands alone in the Hebrew canon as the one book that does not mention God.¹ Its record of a redemptive moment that Jews still celebrate joyously as miraculous is framed as a court romance, drawing its sense of realism from a narrative strategy that casts a penetrating eye on episodes of palace intrigue, hushed conversations, secret plots, private messages, a sleepless king, a golden sceptre, royal ring and seal, palace chronicles, and rescripts sent by courier throughout the polyglot satrapies of a vast empire, foiling a monstrous, genocidal plot blown up from pride and pettiness but exploded by the courage of a lovely queen and her resourceful uncle and guardian. If God is active here, his hand is unseen. The closest Esther's scroll comes to mentioning God is Mordecai's challenge sent to Esther when she informed him of the mortal danger she faced should she approach the king unbidden:

Do not imagine yourself in the palace surviving every Jew. If you keep silent now relief and rescue for the Jews will arise elsewhere, but you and

¹ God is mentioned only obliquely in Song of Songs 8:6, where passion is called a *Godfierce flame* – but the rabbinic tradition takes the thought of peace in the name Shelomo in the song's first line as an allusion to God, as the source of all peace.

your father's house will perish – And who knows if it was for a time like this that you came to royal rank (4:13-14).

Mordecai's tone takes its edge from the gravity of the crisis. But his trust in God's salvation is hedged in reticence. The danger is real, despite the hopes piety musters; and Mordecai does not know what form rescue might take. He pointedly reminds his ward of who she is, lest palace life has loosed her loyalties. But he speaks cautiously of providence. More courtier than theologian, he makes doubt the ally of his argument: Who knows if it was for just such a moment that you, of all women, became a royal consort. Lots were cast twice, then, in a way: overtly in choosing a day on which the Jews of every province were to die; more hiddenly, in Esther's choice as queen.

Facing her moment, Esther asks that her people fast for her – a fast still kept. She and her maidens will fast too. Then she will approach the king, despite the dictates of prudence – and if I perish, I perish (4:16). She does not echo Mordecai's bluff assurance that somehow God will act but makes her choice not knowing if she will be God's instrument or just another victim in the maw of injustice.

Punning in Hebrew on Esther's Persian name,² an eponym of Astarte, as her uncle's was of Marduk, the Talmudic rabbis see hints of God's hiddenness: *haster astir panay* (Deuteronomy 31:18, quoted at Babylonian Talmud Hullin 139b) – *I shall surely hide My face...* The loss of intimacy with God may be the scar of spiritual exile warned of as Moses' warms to his cautionary final song to Israel. But it is also part of the human condition. As Roger Scruton writes, drawing on Simone Weil's reflections, 'God can show himself in this world only by entirely withdrawing from it: to appear among us clothed in the divine attributes would be to absorb and annihilate what is *not* God, and so to undo the work of creation.... "thou canst not see my face, for there shall be no man see me and live" (Exodus 33:20).'³

Isaiah takes up God's hiddenness when he pictures potentates from several nations saying *Indeed*, *You are a God that hides yourself* (45:15), but almost in the same breath acknowledging God as the sole true divinity, *there is no other* (45:14). Ibn Ezra (1093-1167) parses that double-edged thought: God was hidden, yet active in saving Israel: 'As

² Her Hebrew name was Hadassah (Esther 2:7), a name taken from the fragrant myrtle.

³ Roger Scruton, *The Soul of the World* (Princeton: Princeton University Press, 2014), p. 71; cf. p. 10: 'God reveals himself by concealing himself.'

the commentators say, although unseen God showed himself for Israel's sake.' Like Esther and Mordecai we do not know when or how God will act. Unlike them, we often fail to notice just when or how God *has* acted in our lives. That makes the Book of Esther keenly relevant for us.

Esther and Mordecai are not marionettes. Their actions are their own. That is part of what it means to say that God created heaven and earth and all living creatures: God gives more than bare existence – as if anything had bare existence with no character or nature of its own, no dispositions or capacities – or, in the human case, no power to choose and plot a course.

Esther faced a momentous choice. So, in his way, did Mordecai. He needed to think through the options and shoulder risks that others might have shirked. The choices of the two would have a lasting impact on Israel, and on the choosers. They were making decisions about who they would be. Esther, above all, at her critical moment, became the person of her choice. But, despite its prominence, her situation is paradigmatic of human choices, even those too close, familiar, or routine to dominate awareness for most of us most of the time. God set the stage, just as Mordecai proposed, seeing an opportunity in the midst of danger. But Esther's choice was hers.

It's natural enough to think of divine action as an intervention. When reporters appear after a tornado and press a microphone into the face of someone whose home was spared, and drop the formulaic gambit, 'What did it feel like when you saw your neighbours' homes swept away and yours was untouched?' we're ready for the formulaic answer, 'I guess Somebody up there was looking out for us.' But how reflective is that? Was God ignoring the neighbours? And if God made all things, did He not make the storm? Is God active only when a crisis touches us, and beseeched or thanked only by asking for nature to change course? That's unreasonable and self-serving. It's unjust to others and pays scant respect to God.

In the Book of Job we overhear God speaking from the storm wind, not in the still small voice He used in speaking to Elijah (1 Kings 19:11-13). But one still needs to know how to listen. The storm wind is not typically an instrument of judgment. It cannot discriminate, as divine judgment should – as pictured in the narrative of Noah's flood. Recall the covenant

⁴ Abraham Ibn Ezra, *Commentary on Isaiah*, ed. by M. Friedlander (London, 1873) Hebrew, 2.78; English 1.209; the translation here is mine.

with nature that follows: *seedtime and harvest* will endure (Genesis 8:22). God will no longer interfere. He knows that human beings incline to evil from their youth.

Mordecai's reticence gives us a hint of something distinctively Jewish in his reticence about God's action in our lives. Beyond that cultural caution, Jewish philosophy avoids setting freedom against nature. We tend to see human powers of choice as part of nature, not alien to it.⁵ Freedom is Godgiven. By the same token, we do not play off nature against God in a zero-sum explanatory game, as though natural causes somehow excluded divine action, so that the more we know scientifically the less room remains for God. On the contrary, the better we understand nature's workings (including those of human minds and souls) the abler we are to see and celebrate God's work.⁶

If we see God's work everywhere, as Maimonides says a true monotheist will, and regard nature as an expression of God's wisdom – and nature's bounty as a gift of God's grace – we gain a sense of miracles everywhere. Thus, in an ancient prayer still recited, protesting our inability to thank God adequately for one thousandth of His millions of favours, each drop of rain is counted among the favours for which we owe God gratitude (Babylonian Talmud, Berakhot 59b, Ta'anit 6b).

Clearly rain can be a blessing. And, like any natural occurrence, it can also be a trial. Yet a trial too can be made a blessing – much as a poet, or creative artist, or inventor makes an opportunity of a difficulty. So Abraham is blessed when he surmounts his trial when hearing that he must offer up his long awaited son (Genesis 22). His crisis leads him to discovery of the unity of holiness with love, and its incompatibility with violence and violation. The God of monotheism is not the *mysterium tremendum* that beckons wantonly to pagan piety. It is through that discovery that Abraham becomes a blessing to all the nations of the earth.⁷

⁵ See, inter alia, Maimonides, *Mishneh Torah* I, *Hilkhot Teshuvah* V, edited and translated by Moses Hyamson (Jerusalem and New York: Feldheim, 1974), pp. 86-88; 'Eight Chapters', 5 and 8, edited and translated by Joseph Gorfinkle (New York: Columbia University Press, 1903).

⁶ This thought is developed in Lenn E. Goodman, *Creation and Evolution* (London: Routledge, 2010), especially Chapter 5.

⁷ See Lenn E. Goodman, *God of Abraham*, Chapter 1, and *Judaism: A Contemporary Philosophical Investigation*, forthcoming.

Esther too faces a test, not of faith in the familiar sense. Her trust is not that God will reach out and catch her if she falls. Her courage rises as she acknowledges that she might die. Her faith is her commitment to God's truth. She manifests it in choosing the nobler act. God set the conditions. But it was she who rose to the test – summoning Israel to fast with her, to ensure them to be worthy of her risk. God acted, but not by disrupting nature's course. In less momentous crises too, although our penchant is to treat our crises as a test of God, it is not God but we who are tested, and who need the test, if we are to become the human beings we can be.⁸

To think of miracles as exceptions to nature's course one must have some core idea of nature. So it's strange to find Leo Strauss arguing, 'The Old Testament, whose basic premise may be said to be the implicit rejection of philosophy, does not know "nature": the Hebrew term for "nature" is unknown to the Hebrew Bible. But, as Nahmanides (1195-1270) said, a cow would not notice a miracle if it saw one.

The word Strauss finds missing biblically is the *medieval* term for nature (*teva*'), based on the Arabic (*tabi'a*), a term well attested among Arabic translators of Greek works and among philosophers who wrote in Arabic. The base meaning is to sink, as in the Song of Moses, where Pharaoh's host are sunk in the Sea of Reeds (Exodus 15:4), or David's stone sinks into Goliath's forehead (1 Samuel 17:49). So the term was a natural choice in medieval philosophy, suggesting the impress or stamp of a thing, as in the biblical word for a signet ring (*taba'at*). The root acquires overtones of the idea of nature when Proverbs speaks of mountains sunk as piers anchoring the earth (8:25). In the Psalms (102:26) those foundations assure stability: *He anchored the earth on its footings, never to totter* (104:5). Perhaps Strauss missed that thought, presuming nature must be set apart from any thought of God's commitment to it.

While the Torah does not use the root *t-b-* 'to signify nature directly, it has other words to do that job. One is *yetzer*, one's inclination, as in *the bent* (yetzer) *of a man's heart is evil from his youth* (Genesis 8:21), reading

⁸ See Exodus 17:2-17, Deuteronomy 6:16.

⁹ Leo Strauss, *Natural Right and History* (Chicago: University of Chicago Press, 1953), p. 81. For philosophy in scripture, see Lenn E. Goodman, *Judaism: A Contemporary Philosophical Investigation*, forthcoming.

¹⁰ Ilai Alon and S. Abed., *Al-Farabi's Philosophical Lexicon* (Cambridge: Gibb Memorial Trust, 2008), 1.238, 2.655.

nature in its familiar local sense, referring to the character of a thing or a person rather than cosmic constancy. But the Torah does broach its idea of nature from the outset, by contrasting God's handiwork with the primordial *tohu va-vohu*. It carries the idea further when it tells of the sprouting herbage, the seed-bearing plants yielding fruit of their kind (Genesis 1:11), the sun and moon presiding over day and night (1:16), and living creatures reaching for transcendence by the avenue open to them, striving to be fruitful and multiply (1:20-25). The focus is on God's creation of all these: You are Lord, You alone. You made the sky and the sky beyond the sky, and all their host, the earth and all that is upon it, the seas and all that they contain. You give life to them all, and all the host of heaven bow before you (Nehemiah 9:6).

God empowers living beings to perpetuate their kind, a blessing directly spoken in the human case since the first couple receive not just the breath of life but also articulate speech (Genesis 1:28). Creation, is God's act, but vitality, procreation, thought, and speech are gifts freely bestowed. In recognizing the diverse and fecund, swarming, flying, swimming, and creeping creatures, scripture defines nature ostensively, surveying God's creatures and the nisus of their claims, making nature the backdrop of Israel's history and mission and the anchor of its argument for God's reality and act.

The Torah does not alienate God from his work. So God is typically said to act by way of his creations: Pharaoh and his people are afflicted by lice and boils, frogs and darkness, swarming creatures, cattle plagues, locusts and hail. The first and last plagues, the bloody waters and the slaying of the firstborn, have their impact, if not their origins, on the natures they affect. Only at the outset does God create from nothing.

Israel, trapped with their backs to the sea, crossed dryshod when the Lord drove back the sea with a strong east wind all that night (Exodus 14:21). Pharaoh pursues his departing slaves, after a natural change of heart (14:5). God shields Israel behind a dark cloud (14:19-20). When the people reach the far shore, the sea returned to its steady flow [aitano, its regular course – another way of citing nature; cf. Psalms 74:15] (14:27). It is the returning waters that allow the song of Moses to say that God cast Pharaoh's chariotry and his host into the sea (15:4). The implements of all the miracles are natural.

In Job, as Saadiah explains, 11 nature is the theme of God's speech from the stormwind. Again we hear of God's laying earth's foundations, but the imagery of sound design is followed up in allusions to the earth's measure and cornerstone (38:6). God set limits to the reach of the waves (38:8-11; cf. Psalms 104:9). Snow and hail, torrents and thunderstorms, sprouting grass, frost, rain, and ice, serve at His command. God, not man, reins in the Pleiades or looses Orion. Rains fall on wastelands (38:22-31). For man is not the be-all and end-all of creation. God imparts reason (38:36) but also provides the lion its prey and feeds the ravens' young (38:39). He knows the seasons of birth and gestation for deer and mountain goats (39:1-2) and gives the onager his freedom. For a wild ass would laugh at city throngs (39:5); a wild ox would hardly lodge at some farmer's crib, or plough his furrow, or gather his seedcorn from the threshing floor (39:9-11). Nature is wild and free, overseen by God, whose mercies are on all his works (Psalms 145:9). The greatest land or water creatures are scarcely playthings to God (Job 40-41).

It was Hume who had a weak idea of nature. His dogmatic empiricism undermines the idea of an inner regularity in things, leaving him no better case against miracles than his finding them unusual. That sets his brief against miracles on the same footing as his refusal to believe a Black man could be talented.¹²

¹¹ Saadiah, *The Book of Theodicy*, tr. by L. E. Goodman (New Haven: Yale University Press, 1988), at Job 38 and 39, pp. 383-84, 393-94.

¹² In 1753 Hume added a note to his essay, 'Of National Characters', maintaining 'the negroes and in general all other species of men (for there are four or five different kinds) to be naturally inferior to whites'. His evidence: 'There never was a civilized nation of any other complexion than white, nor even any individual eminent in either action or speculation. No ingenious manufactures amongst them, no sciences. [...] Such a uniform and constant difference could not happen, in so many countries and ages if nature had not made an original distinction betwixt these breeds of men. Not to mention our colonies, there are Negroe slaves dispersed all over Europe, of which none ever discovered any symptoms of ingenuity; tho' low people, without education, will start up amongst us, and distinguish themselves in every profession. In Jamaica, indeed, they talk of one negroe as a man of parts and learning; but 'tis likely he is admired for very slender accomplishments, like a parrot, who speaks a few words very plainly.' David Hume, The Philosophical Works, ed. by T. H. Green and T. H. Grose (London, 1882), 3.253. Criticized by James Beattie, an Aberdeen professor, for ignoring the civilizations of Mexico and Peru and failing to survey 'all the negroes that now are or ever were on the face of the earth' (An Essay on the Nature and Immutability of Truth in opposition to Sophistry and Scepticism (Edinburgh, 1770), pp. 48-82), Hume revised his note for what proved the posthumous edition of his

Biblically there's bound to be some tension between talk of miracles and thoughts of nature, with God its guarantor. The Talmudic Rabbis seek to ease the tension by imagining the prominent exceptions to nature's regularity woven into its fabric from the start:

Ten things were created on the Sabbath eve at twilight: the mouth of the earth [that swallowed Koraḥ and his cohort (Numbers 16)], the mouth of the well [of Miriam¹³], the mouth of the she-ass [of Balaam (Numbers 22:28)], the rainbow (Genesis 9:13-17), the manna (Exodus 16:14-26), Moses' rod (Exodus 4:17, etc.), the Shamir [whose tracks cleaved the stones for Solomon's temple, lest any iron tool desecrate it with even a suggestion of bloodshed (Exodus 20:22, 1 Kings 6:7)], the letters, writing, and tablets [of the Decalogue (Exodus 24:12)]. Some say, imps too, Moses' grave [prepared by God (Deuteronomy 34:6)], the ram of Abraham (Genesis 22:13). And some say, the tongs made with tongs. (Mishnah Avot 5.8)

The first tongs, mentioned, as if in an afterthought, stand for the difficulties inherent in the emergence of higher from simpler things: How were tongs made without tongs to handle them at the forge? If nothing comes from nothing, how can the greater emerge from the less? Theism, along with Plato's thesis as to the primacy of absolute over relative value

writings, 1777, deleting his general reference to non-white races and with it the word 'species', with its overtones of polygenism, thus focusing his diatribe more sharply on Blacks and bypassing Beattie's countercases. Hume had let the offensive note stand in all editions of his essay down to and including that of 1770, when Beattie's criticism appeared. Henry Louis Gates identifies Hume's 'man of parts' as Francis Williams, a Cambridge graduate and teacher of Latin and mathematics, who also published poetry in Latin. Hume ignored Williams' public protest of his parrot remark, leading Richard Popkin to call Hume a 'lousy empirical scientist' and a 'dishonest researcher', for failing to acknowledge 'the facts that disproved his claim'. Richard Popkin, 'Hume's Racism Reconsidered, in The Third Force in Seventeenth-Century Thought (Leiden: Brill, 1992), pp. 64-75. See John Immerwahr, 'Hume's Revised Racism', Journal of the History of Ideas, 53 (1992), 481-86. Hume did not confine his prejudice to blacks. Writing from Izmir in 1748, he declared, 'The ingenuity, industry, and activity of the ancient Greeks have nothing in common with the stupidity and indolence of the present inhabitants of those regions. What matters here is that Hume allowed himself to generalize on the basis of slight and narrow experience and to transform his generalization about a race (or congeries of races) into a pronouncement about what was possible for all of those he felt licensed to despise.

¹³ Immediately after Miriam's death we read: *there was no water for the community* (see Exodus 20:1-2). The Sages infer that while Miriam lived a miraculous well followed the Israelites during their wanderings.

(and thus the possibility of emanation as well as creation), depends on a coherent answer to that question.

The letters of the Decalogue and substance of the tablets on which a supernal God might inscribe his teachings again raise questions of causal and ontic primacy, and God's creative role. Aristotle touches the question when he speaks of the role of the Active Intellect:

... one does not decide to decide, which would presuppose some prior decision. There must be a starting point. Nor does one think after first thinking one will think, and so ad infinitum. So thought does not originate from thinking, nor a decision from a prior decision. What, then, could be the starting point but chance? So everything would start from chance? But perhaps there is a starting point with none before it, that can act just by being what it is. That is what we are looking for, the origin of movement in the soul. The answer is clear: In the soul as in the universe, all is moved by God. For in a way the divine within us is what moves everything. Reasoning begins not from reasoning but from something greater. And what could be greater than mind and knowing but God? (Eudemian Ethics VIII 1248a18-29).

If we hope to wrestle with what it means to speak of God's act in nature and the mystery of the nexus of the Transcendent to the here and now in ourselves or in the cosmos, we must address such questions about the priority of the Infinite to the finite. But consider first the other things created in the twilight of the sixth day.

None of them, plainly, sprung from nature's familiar order. Yet neither did they breach God's plan. All ten served Israel's welfare and mission. Built into nature's fabric, they underscore the subtext of the numerous liturgical blessings that acknowledge God's grace in 'sanctifying us with His commandments'. What that subtext pronounces is the thought that the Torah reveals concretely what the Supernal wills *for us*. Israel's destiny is woven into nature's fabric: The warp of history unfolds in natural events; the weft is added by our individual and communal acts and choices. Unlike the threads spun and cut by Hesiod's fates, these do not preempt our opportunities to act. Hence the irony of Esther's Scroll: Haman's lots fell out as they would, but history reversed his plans. The outcome arose not simply from God's judgment but from Esther's choice. Plato, similarly, gives freedom its say, putting into the mouth of Lachesis, the daughter of Necessity, the speech that countermands her ancient, fatalistic role:

No divinity shall cast lots for you. You shall choose your own deity. Let him to whom falls the first lot first select a life to which he must cleave. But virtue has no master over her; each shall have more or less of her as he honours or despites her. The blame is his who chooses. God is blameless. (*Republic* X 617e)

Like Plato, Maimonides holds God above reproach (cf. Deuteronomy 32:4-5). Like Heraclitus he finds the key to destiny in character, not the stars. His God, like Plato's, is above change as well as above reproach. Reading the list of things created in the twilight of the sixth day, Maimonides says of the Sages, 'they did not believe that God changes his mind. At the outset of creation He set into nature those things by which all would be done that would be done'. God used and augmented the natural powers of things. 'Outcomes that were frequent were natural; those that were extraordinary, reserved for a remote future, were marvels. But all were alike.' All expressed the natures God imparted.

Maimonides outdoes the ancient rabbis in naturalizing miracles, weaving yet more tightly into nature's fabric marvels not listed as created in the twilight of the first Sabbath: The parting of the waters for Israel (Exodus 14:21) and Joshua (Joshua 3:13-17),¹⁵ the natures that made possible the miracles of Elijah (1 Kings 17-19) and Elisha (2 Kings 4-7), the halting of the sun and moon at Gibeon (Joshua 10:13), and every other scriptural miracle.

The occasionalists of the kalam devised a different strategy. Rather than naturalize miracles, they made every event an act of God. Since nothing can do or be more than God pleases, nothing can outlast its instant or exceed its place. Beings were atoms. Each had a position but no lasting duration, no size, and no causal power. All power belongs to God (Qur'an 18:39).

The notion of dimensionless atoms was pilloried by Avicenna for the geometrical paradoxes it entrained. Even earlier, al-Ash'arī, within the Islamic kalām, had seen the difficulties for perceptual realism entailed by denying natural causality. Maimonides sharply criticized the kalām occasionalists for erasing the very idea of nature and undermining God's role as Creator of a coherent cosmos. Why, he asked, would God create things no one needs if, say, food does not sustain us and medicines

¹⁴ Maimonides' Commentary Mishnah Avot, at 5.6.

¹⁵ Y. Tzvi Langermann, 'Maimonides and Miracles', *Jewish History*, 18 (2004), 147-172 (p. 151).

cannot treat our illnesses? On the contrary, God's providence, working through nature, grants resources in proportion to our need – air most abundantly, then water, then simple, wholesome foods. Nature, by God's grace, provides mother's milk for babes until they're ready for solid food. God, through nature, lets some life forms depend on others, as all animals depend ultimately on plants. The Psalmist (104) sweepingly alludes to all four elements – wind and fire, earth and sea – as God's instrumentalities (*Guide* II 6). God loses nothing by empowering natural things, and it does not diminish his sway to delegate human powers of free choice. Langermann finds Maimonides warmer toward miracles in his later works. Yet, at no time, he stresses, did Maimonides surrender his belief in nature's causal continuity. From his youth, 'the regularity of natural events' was for him 'the greatest proof' of God's rule. 16

God's covenant found confirmation, Maimonides holds, not in miracles but in its content (cf. Deuteronomy 18:15-25).¹⁷ Indeed, Maimonides found the strongest ground for loyalty to that covenant, as he states in writing to the beleaguered Jews of Yemen, neither in the natural order nor in miracles but in the giving of the Law. That theophany was normative. The Torah's bestowal did not disrupt the laws of nature but touched the minds of all: God reached out, and Israel responded by reaching up toward Him.¹⁸

That thought captures a second strategy of Maimonides' for naturalizing miracles, perhaps more welcome than the midrashic twilight to those who share Maimonides' belief that causal regularity is the surest sign of God's rule. All the movements of Balaam's ass, he argues, were brought about by an angel (*Guide* I 6). But in Maimonides' voluntaristic version of neoplatonism, angels are the forms and forces God imparts, allowing things to act.¹⁹ They are the natures of things. But later in the *Guide* (II 42) Maimonides locates Balaam's conversation with his she-ass in a prophetic vision. Likewise Jacob's wrestling match (Genesis 32:25-33)

¹⁶ Langermann, 'Maimonides and Miracles', p. 148.

¹⁷ Maimonides, Epistle to Yemen, tr. by Abraham Halkin, in *Crisis and Leadership: Epistles of Maimonides* (Philadelphia: Jewish Publication Society, 1985), p. 113.

¹⁸ Maimonides, Epistle to Yemen, tr. by Halkin, in *Crisis and Leadership*, p. 104; *Guide* I 54, 63, III 6, 'Eight Chapters', citing Mekhilta to Exodus 15:2.

¹⁹ See Lenn E. Goodman, *Maimonidean Naturalism* in *Neoplatonism and Jewish Thought*, edited by L. E. Goodman (Albany: SUNY Press, 1992), pp. 139-72, and in *Maimonides and the Sciences*, edited by Robert Cohen and Hillel Levine (Boston: Kluwer, 2000), pp. 57-85.

and Joshua's encounter with an angel (Joshua 5:13-15). Generalizing, Maimonides writes: 'Do not imagine for a moment that an angel can be seen or heard to speak unless in the dreams and visions of prophecy, as the principle is clearly stated: *in a vision do I make myself known to him, in a dream do I speak to him* (Numbers 12:6).'

Even as he presses that universal thesis, Maimonides stresses the reality of angels as God's intermediaries: Subjectivity need not entail unreality. The mind is the meeting place of the finite with the Infinite. God governs nature through minds, celestial or human. So bracketing the miraculous within the realm of experience need not mean its dismissal. And the experience, as Sinai reveals, need not be private.

Bible scholars tell us that poetry like the Song at the Sea antedates its prose settings, which relate an ancient living experience to a later moment. Hence the opening word (az, then) of the verse introducing Moses' song: Then did Moses and the Children of Israel sing this song to the Lord: (Exodus 15:1). God's fighting for the Israelites, so recently slaves whose children were cast into the Nile and whose taskmasters expected to beat them with impunity, belongs to their experience: The tide turned, Egypt's chariotry sank like a stone, like lead in the mighty waters, the sea seemed to part, its waters to stand up like walls as Israel passed.²⁰ No Israelite heard the foe promising themselves booty. But the people, singing joyously, could taste the irony of Egypt's defeat as God's breath sent back the sea. The shared epiphany was captured in the poet's words – just as Deborah's song seizes its moment, picturing Sisera's mother at her lattice, reassured by her tactful ladies that only the rich booty can have detained the brigands' chariots; then the perspective shifts from the uneasy reassurance of the ladies awaiting the ravished Israelite women (Judges 5:30) to Israel's realization that the roads are safe (cf. 5:6-7), and the prose historian's verdict: the land had peace for forty years (5:31).

A shared moment is again captured when Joshua orders sun and moon to halt while he completes the enemy's rout – the poet's words, preserved from the vanished Book of Jashar (Joshua 10:12-13). The stars did not literally battle Sisera, but the triumph was no less real for that – and no less real in the Six Day War, or at Entebbe in the year of America's

²⁰ The midrash tellingly calls the Sea of Reeds a swamp. See *Mekhilta Shirata* at Exodus 15:5, tr. by Judah Goldin in *The Song at the Sea* (New Haven: Yale University Press, 1971), p. 139. Much depended on perception: Israel felt trapped by the sea before the tide turned – the tide of the sea, and the tide of trust. The waters that had seemed an impassable barrier were soon to engulf Pharaoh's chariotry.

bicentennial. Each generation has its triumphs and visions. If the cause is just, there is no blasphemy in seeing the work and hand of God. The clearest shared theophany for Israel was the moment when all stood before God at Sinai and, according to their capacity, experienced the commanding Reality inviting each to rise in emulation of God's holiness by following the Law that articulates Israel's way of life. The moment was no messy ecstasy but a gateway. Midrashically, every future generation was present; liturgically, later generations relive the moment, rising to hear the Decalogue read out from the Torah scroll.

It's natural, not least in times of crisis for outstanding characters to be adorned in popular imagination or sacred history with tales of marvels like those that decorate the memory of Elisha or Elijah, or the latest wunder-rebbe, giving charisma its glister. But greatness needs no tinsel. Little clings to the real Lincoln or Gandhi. The Church can routinize the awe by requiring documented miracles of its saints, an expectation Anselm tried to duck, more focused on God's epiphany to the mind than on the laying on of healing hands. For Israel the epiphanies that matter most are experiential, yet shared: The biblical miracles of Moses relate more to his people than his person – to Israel's sense of providence and chosenness for a mission. Even the heaviest midrashic embellishment cannot overwrite the events or disable with credulity or incredulity the meanings we naturally seek and find in historic patterns. Human beings are meaning makers, but our penchant to connect the dots does not make every construct as good as any other, as though life and experience were a duck-rabbit whose chief message was its own ambiguity.

Natural miracles are distinguished less by their rarity than by their reception. Yet events can have a real significance. Most tellingly, the very existence and dynamic of beings, as I've long argued, sets real value before us. The fact of life, or the existence of anything at all, come closest to what I call a miracle, not for rarity, or even improbability, but for the natural marvel. Scientists as well as poets see these things – and moderns see nothing different from what the ancients saw – although scientists today may be as reticent as Mordecai in naming them. The rainbow is a sign, not in spite of optics, but by its beauty. Diverse interests may lay claim to its meaning. But that cannot make one construal no better than an other.

In Israel's case the memory of Egypt is made a moral imperative, from God's mouth, to love the stranger, since we were strangers (Deuteronomy 10:19). That memory, so construed, defines a sense of destiny and

a mission chosen. How unlike *Geworfenheit*! Its moral truth seconds its historical verisimilitude. Vengeance was not the message taken. If Israel has long been the suffering servant, as Isaiah saw,²¹ there is no less truth in her glimpses of herself in memory as God's once youthful bride and lover, sometimes bereft but never divorced or forsaken. Jeremiah recounts God's words: *I remember you for your youthful grace, your love as a bride, how you followed Me in the desert, a land unsown...*(2:2).²² The prophets, seeing God's hand in Israel's sufferings, can honestly claim a license to see the same hand in her triumphs.

There's both power and weakness in construing all that occurs as meaningful for oneself, or one's people. The moral use made of such a construal helps draw the line, but so does our command of science, general and human. Henchard's last delusion in *The Mayor of Casterbridge* is his conviction that fate has conspired against him. There's a similar mingling of self-pity and self-congratulation in the existentialists' idea of life's absurdity, and its mirror image in their notion that warm embrace of any choice can make the choice right – much like the moral solipsism of the egoist who casts himself as the hero of the piece and takes every person, thing, and event he meets as stage business, props and settings meant to show off his own acts and passions.

Knowing one's place in nature is the real start of wisdom, pointed to in the Delphic admonition to self-knowledge, the maxim as it stood before Plato inverted it by portraying Socrates as finding there a hidden hint of the divinity of the self. The ancient maxim was a counsel of piety that links hands with the admonition of the Psalms: *Piety is the start of wisdom* (111:10). Piety counsels modesty, and modesty knows that

²¹ See Lenn E. Goodman, On Justice, p. 168.

²² In the liturgy of the Day of Atonement these words of Jeremiah's recur repeatedly. Rashi introduces his commentary on the Song of Songs: 'Through the Holy Spirit Solomon saw that Israel would be exiled time and again and suffer desolation upon desolation, taunted in exile with her former glory. Recalling the early love that once favored them above all nations, they would say, *I will return to my first husband. It was better for me then than now* (Hosea 2:9). They would remember his love, *how faithless they had been* (Leviticus 26:40), and the favors he had promised them in the end. So he wrote this book, inspired by the Holy Spirit, in the voice of a woman, bereft and forlorn, yearning for her husband, longing for her sweetheart, recalling her young love of him, and confessing her wrongs. But her lover suffers with her (cf. Isaiah 63:9), remembering her youthful grace, her charms, and the fair actions that bound him to her in love in days past. He never meant to make her suffer (cf. Jeremiah 3:33). She was never divorced, He says, but was still his wife, and He her husband (cf. Isaiah 50:1, Hosea 2:4). He will yet return to her.'

others too have needs and projects, that they as well as we live in a natural world where all things exercise a conatus that may affect or concern us but hardly turns exclusively to serve or thwart our interests. Plato was right, of course – up to a point. There is a bit of God in us, breathed into our bodies in the breath of life and light of consciousness. That's why Mordecai and Esther were able to act, to hear the still small voice, and take their people with them.

Piety is not reticence or abdication. Mordecai might have held his peace and told himself that nothing could be done. He might have convinced himself that speaking out would only make things worse. Isaiah Berlin, a brilliant man and beloved teacher, chose tragic silence (as he would confess) when his British masters held him back. He spoke out later, courageously, against communism. But he saw no way to do what Jan Karski or Raphael Lemkin did before Nazism had borne its full measure of dark and ugly fruit. And many others, close to FDR, the Ahasuerus of our times, allowed themselves to be silenced, fearing loss of face or influence, while six million died. Not so Natan Sharansky in the Soviet case, or Avi Weiss. Their words and acts reached the ears of Scoop Jackson and other Senators and rescued millions of their people from the Soviet bear's paws.

It took no praeternatural powers for Theodore Herzl to foresee the denouement for European Jewry – only intellectual honesty and moral courage, refusal to hide from the facts or from his own flesh. Lemkin could document the nisus of Axis legislation in the occupied lands. Even before he coined the term he knew the stench of genocide. Herzl did not live to see the State of Israel, any more than Moses lived to enter the Land. But Herzl's 54 years were long enough to launch the Zionist movement that would build the state. As for Avi Weiss and Natan Sharansky, they lived to see the Soviet empire collapse, and both still speak out for truth, which in the lexicon of Judaism is synonymous with justice. Even Lemkin, in just 59 years, lived to see the fall of the Reich to last a thousand years and served as father, mother, and midwife in making the United Nations pay at least lip service to his judicial vision branding genocide a crime.

Returning, as promised, to the primacy of the actual and precedence of the Infinite, from which the finite springs. Emergence is the theme I'd like to close on, a cosmic rather than local truth. For part of what makes one reading of events more credible (and saner) than another is fitting together the facets of experience into a coherent whole.²³ That's the standard science uses, and theists too should use it when they speak of God's governance or of creation, not reserving separate epistemologies for one day of the week.

Natural miracles are not alien to the work of science. I'll focus on two special cases of emergence here, one sheathed within the other: the work of evolution, and the rise of souls and minds.²⁴ I see evolution as evidence for theism, given the localization of value in the history of every species. In the same light, the emergence of mind and soul from their biological roots points to God's work in nature. For there is a directionality to evolution in the groping (as Teilhard put it) of the lineages of life toward the light – that is, toward self direction. That arrow points toward God. We can see it whether we look upward from our lab benches and writing desks or vault upwards, as the prophets do, and try to see things from God's universal standpoint.

We face an objection here, not so much to the fact of evolution, which has become all but sacred doctrine in most educated circles, but perhaps to emergence, and almost certainly (surprisingly enough) to consciousness, which might have been thought (and has been thought) the most salient fact we know. The present essay is hardly the ideal place to vindicate as fully as they deserve the claims I've made here, no more than naming the chief instances of what I take to be God's special actions vis a vis the world in which we live. Each of these claims is such that many books could be devoted to it, and have been. Several of those books are mine. But I'll try, at least, to suggest the arguments they broach at far greater length than is possible or appropriate here – and hope to whet the reader's appetite for a fuller exposition.

(1) I've suggested that God acts in there being something rather than nothing. It's true, as Hume proposes, that there's no necessity in seeking an absolute cause for all contingency. But I caution, as I did in *God of Abraham*, that there's a price to pay in abandoning the search for an ultimate beyond all conditioned causes: The quest for understanding breaks down, and science is emptied of content if all things are explained in terms of one another or in terms of something else that's left without

²³ See Lenn E. Goodman, *In Defense of Truth: A Pluralistic Approach* (Amherst, NY: Humanity Books, 2001), Chapter 5.

²⁴ See Lenn E. Goodman, *Creation and Evolution* and Lenn E. Goodman and D. G. Caramenico, *Coming to Mind: The Soul and its Body* (Chicago: University of Chicago Press, 2013).

an explanation. In such a case the wholesome impulse of inquiry ends in circularity or in an infinite regress; the promise of understanding that prompted inquiry deadends, leaving nothing in the end explained – for A is explained in terms of B, and B in terms of C, but N, on which the entire chain depends, is left unexplained, being simply brought back to A or some combination of those earlier terms, if it is not left a surd, and the hope of understanding pinned to the wall by positivism.

- (2) I've read evolution theistically. That's not an inevitable or even a very familiar reading. But biological evolution calls to our attention the local goods that organisms pursue in their myriad ways – not just for the immediate individual but for its kind and lineage. The purposiveness we see in evolution - easily denied or overlooked, since it's hardly our purposes that life at large pursues – is redolent of the goods that drive or draw organic nature, inviting us to reconsider another kind of causal sequence and another kind of causal ultimacy alongside the causality of mechanism, which so typically is pressed into its service in the living world. It's the telic kind of causality and ultimacy that inspired both biblical and classical thinkers to read the dynamism of nature in theistic terms. I have much more to say about evolutionary theism in Creation and Evolution. So I commend that Darwinian book to readers who would like to see that argument articulated more fully, or who simply would like to see why theism and neodarwinism are not conceptually the foes they've been cracked up to be.
- (3) I've called biological evolution a special case of emergence in a broad sense, the kind known in the history of stars, and throughout the cosmos. Emergence of that kind, I think, reveals the dynamism (rather than inertness) of matter. I've also called the rise of consciousness a special case of biological evolution. Many philosophers have treated consciousness as a mystery. But that outlook, I suspect, reflects the difficulty they find in reducing mind to mechanism.²⁵ If one thinks

²⁵ There's a rich array of alternatives to mechanist accounts of consciousness represented in *The Waning of Materialism*, edited by Robert C. Coons and George Bealer (Oxford: Oxford University Press, 2010). To single out just one paper from that symposium, William Hasker notes the enduring good sense of Leibniz's celebrated windmill argument: Enlarging a putative thinking/perceiving machine to the scale of a windmill, inside which one could walk about, would still show us nothing more than 'parts pushing one another'. Nothing would reveal the (subjective) essence of perception – let alone other dimensions of consciousness. (I find it telling Leibniz is the author of this argument since he devised the second generation of computer after

explanation must mean reduction of complexes to their parts and outcomes to their origins, it's clear that consciousness, autonomy, choice, human agency, and creativity will never be understood – any more than we can explain the chemistry or taste of salt by delineating the properties of its elements, sodium and chlorine. Something new has happened here that goes beyond the properties of the elements. Any cook or chemist knows about such things. Indeed, to make sense of the chemist's critical distinction between mixtures and compounds, demands dealing with the notion of emergence – not abandoning reduction, but scuttling the dogma of reductionism.

Souls, as Greg Caramenico and I argued in Coming to Mind, do things quite impossible for the chemical constituents of the bodies in which they emerge. Souls, we argue, are not auras or wisps of smoke - or anything quasi-physical. The terms that properly describe their action are not the same as those describing the matter underlying their capabilities. The notional separability of consciousness from human behaviour that once inspired Descartes to set the soul (alarmingly) apart from nature has since been pled in some quarters to warrant claims that one's consciousness might be downloaded into a (powerful enough) computer, or to argue that there's no a priori reason why zombies might not walk the earth, indistinguishable from humans, but utterly without consciousness. But notional separability, I would argue, is a far cry from natural separation. I suspect that the intimacy and intricacy of our embodiment renders souls inseparable from their bodies. What matters for our present interest is that souls do emerge in bodies like our own – developmentally as we grow and learn, and phylogenetically in the course of evolution. The rise of souls and consciousness is not proof of divine action. But it is evidence, taking its place alongside nature's constancy and continuity, as an expression of divine love.

The human mind, I've intimated, is the meeting place of finitude with the Infinite. We can see that pretty clearly if we ask ourselves about the human capacity to conceive infinity – conceive and not imagine. Descartes illustrates the difference by pointing out that we readily conceive the difference between a chiliagon and a myriagon, although imagination

Pascal's adding machine – and reflected seriously about a mechanism that could be made to perform conceptual analysis using a specially devised binary symbol system. With arguments like Leibniz's in mind, Hasker commends a strong form of substance emergentism comparable to the position argued for in *Coming to Mind*.

merely blurs the two. Similarly, we readily conceive a circle, although we have trouble imagining a perfect one. From one perspective, a circle is a polygon of infinite sides and angles. In saying so we acknowledge at least one fact about the infinite. Mathematicians, as we know, routinely work with quantities thought of as extended to infinity. A keen and creative mathematician like Georg Cantor conceived diverse *orders* of infinity, with demonstrable quantitative relations. Today we find a new sense in Nehemiah's words about the sky beyond the sky. To reach for God's infinity conceptually is more demanding than just to picture some vast expanse. When we speak of God, we're speaking of Perfection, and we must guard against tainting our ideas of that perfection with any tincture of our human limitations. But we reach in God's direction when we think of infinite goodness, wisdom, and uncompromised Reality.

If we ask ourselves the old midrashic question about the matter on which God's precepts might be written, it's pretty clear today that it would be the human brain, the organ of the soul. A product of evolution, but open to experience and groundwork of what we have that makes us capable of creativity and caring, each human brain builds as many synaptic connections as there are elementary particles in the universe. How a brain could arise from simpler matter, and how consciousness, memory, agency, perception, and creativity could emerge from the brains of persons are questions that our sciences address in promising and fruitful ways. But the risk is everpresent, when we tell such stories, that reductionism will erase what it professed to explain. Darwin made no such error. He did not, in discovering how one species arises from another, erase the explanandum, or its differentiae, leaving explanation with nothing to explain.

The mind, we say, is made possible by the brain. That much was known to Galen, although we know much more now about just how that possibility must work. But we need to remain careful not to forget that the mind is not the brain, any more than human beings are apes, or apes are mere machines or chemicals. Consciousness makes us subjects, not mere objects. The fact of consciousness is rife with moral, aesthetic, and

²⁶ Worth reading here: William Hasker, *The Emergent Self* (Ithaca: Cornell University Press, 1999); Philip Clayton, *Mind and Emergence: From Quantum to Consciousness* (Oxford: Oxford University Press, 2004); Gerald M. Edelman, *Wider than the Sky: The Phenomenal Gift of Consciousness* (New Haven: Yale University Press, 2005); Evan Thompson, *Mind in Life: Biology, Phenomenology, and the Sciences of Mind* (Cambridge: Harvard University Press, 2007).

spiritual implications. Spirit is part of the human story, whether it shapes a quest for God or pursues artistic, scientific, or intellectual purposes, or simply struggles to stay alive and preserve one's loved ones, or humanity, or nature. Reason is our guardian angel here. Analysis breaks things down conceptually. But it need not destroy them. Synthesis can relate things to one another and see a larger whole. So long as a reductionist bias has not denatured our understanding we will recognize an up and a down to complexity – and to value. Knowing up from down can help orient us toward God's work in nature, if we allow ourselves to look. The upward path faces the divine. But so, in a way, does the downward. For God's work is all around us waiting to be discovered.

THE MIND OF GOD

COLIN MCGINN

Abstract. A radically dualist view of the relationship between God and the universe is apt to make the problem of Divine intervention more difficult than under other metaphysical conceptions. We need to find a closer relationship than this if the causal picture is to work. We could try saying that God is realized by the universe, without being reducible to the universe. He has no further substance over and above that of the universe, but he is not simply identical to the universe (I suppose this would qualify as a type of pantheism). I am not sure I know what this idea of realization comes to for the case of God and the universe, but it least it promises to make it feasible for God to be enmeshed in the natural causal order, without collapsing into it. It is not so much that God intervenes as supervenes, to use the jargon. On this picture, there is a megauniverse that includes both the physical universe and God, with the two locked somehow together.

I. DIVINE PSYCHOLOGY

A typical university education in the science of psychology will include a course entitled 'comparative psychology', which deals with animal psychology and its similarities to, and differences from, human psychology. But I have never heard of a psychology degree that offers a comparative psychology course on divine psychology and its relation to human and animal psychology. Yet God must have a psychology, because he has a mind. And there must be a philosophy of mind appropriate to the divine mind too. God has various mental faculties, and these must have a nature and a *modus operandi*. There must be a way that God's mind is. So why can't we study the mind of God? Why do we find this gap in the curriculum?

It can hardly be that the subject is deemed unacceptably impious, because theology studies God in all sorts of ways - so can't he be studied psychologically? If we can discuss God's plans and intentions, then he must have plans and intentions; and then we can ask theoretical questions about these divine mental attributes. Any being with states of mind must have a psychology in which those states feature. It might be agreed that God has a psychology, but denied that we can study it, because we can't do experiments on God or observe his behaviour. We therefore cannot have a proper empirical science of God's mind. It is no doubt true that we can't use God as an experimental subject, along with the usual herd of conscripted undergraduate subjects, because of his general unavailability; but it is wrong to conclude from this that we cannot meaningfully investigate God's mind. We cannot perform experiments on Shakespeare either (or any other dead person) but that doesn't mean that we can't make justified statements about the mind of Shakespeare. Why? Because we know quite a lot about Shakespeare's mind from the evidence of it he left behind, as well as from his membership in the human race, and from that we can make reasonable inferences. Experimental evidence is not the only kind of psychological evidence there is. So we might have enough information about God that we can make sensible inferences about the nature of his mind. The right thing to do is look and see.

Another objection to the project of divine psychology might be made: we cannot have a psychological theory of God's mind because God does not exist. It would be like having a comparative psychology that included the unicorn - a nonexistent beast with a nonexistent mind. But this is a bad argument: we can ask about the mind of Sherlock Holmes without presupposing that he exists. Fictional characters have minds too, and hence psychologies. Thus we know that Holmes has a very high IQ, is easily bored, and is subject to narcotic cravings. We also know that he has a language faculty and hence must have acquired language during childhood, with all the psychological machinery that that implies. Even if God is merely a fictional character, with no existence, we can still ask what kind of psychology he has. The evidence for this will come from human intentionality - how God has been depicted and conceived in various traditions of religious thought. God (the fictional character) must have a psychology that is such that those depictions could hold of him – just as with Sherlock Holmes and other fictional characters. If God exists, on the other hand, then his mind also exists, and hence has an existent nature - which can in principle be investigated. Our knowledge here can

only be tentative, to be sure, but that is true of large tracts of human knowledge in general.¹

So there seems no objection of principle to pursuing the subject of divine psychology, though it might prove arduous and elusive. Our approach will naturally be comparative: how does divine psychology compare to human psychology? I will be unavoidably sketchy about this in what follows, but I think the outlines of the divine mind are fairly clear. Two points seem clear at the outset: God thinks and has mastery of language. Just as we are essentially thinking things, as Descartes claimed, so God is essentially a thinking thing – a res cogitans. God has reason, and plenty of it.² This means that God thinks logically – his thoughts are governed by relations of logical validity. If so, his thoughts must have propositional content – since there is no other kind of logical thought. We must ascribe thoughts to him using 'that'-clauses: God thinks, for instance, that man is weak and easily led. God reasons according to modus ponens and other logical rules, which concern propositions. In this he resembles humans, cognitively speaking.³ God respects the laws of logic and conforms his thought to them.

But his propositional thought differs in one important way from that of humans: his thought does not generate opaque contexts, on account of his omniscience. A human can believe that Hesperus is a planet without believing that Phosphorus is a planet, even though Hesperus is identical

¹ It is often supposed that human knowledge of the mind of God is necessarily limited – that God must be mysterious to us. Yet it is also believed that we can know quite a bit about God's wishes and intentions, and his intellectual faculties. This mixture of ignorance and knowledge is not, however, unique to God, but applies to all minds, and even to the physical world. It is not that God is *uniquely* impenetrable.

 $^{^2}$ One thing God has plenty of is knowledge, on account of his omniscience. But it is a question what form this knowledge takes. Presumably he has propositional knowledge (knowledge that p), but he must also have knowledge how and knowledge of. Is his propositional knowledge a type of belief? Does he have justification for what he believes? Is it a priori or a posteriori? Does he have introspective knowledge? Is his knowledge analyzable? These are all good questions, but I won't be discussing them here, since I am concerned with God's psychology rather than his epistemology.

³ I don't mean that, like humans, he reasons *in time*, slowly or quickly, smoothly or falteringly. But he must apprehend logical relations between propositions, possibly 'at a glance'. His superiority to humans as a logical thinker does not mean that he is not himself a logical thinker. (Perhaps I should note here that I am assuming God to be an entity more person-like than, say, some sort of impersonal force – that is, I am following the precepts of the main world religions. If God is conceived impersonally, then of course we cannot ascribe the attributes of a person to him (or 'it').)

to Phosphorus, because he or she doesn't realize that the identity holds – that crucial piece of knowledge is missing. But God knows everything, necessarily so, and therefore he cannot fail to know the truth of all identity statements. So all ascriptions to God of singular thoughts will produce only transparent contexts, in which co-denoting names are intersubstitutable. God's thoughts no doubt have sense and reference, as Frege argued, but God recognizes the referential coincidence of all senses that in fact have the same reference. God knows every mode of presentation of every object, so he cannot fail to know the truth of every true identity proposition.⁴

Given that God thinks in propositions, various other things will follow, very familiar to philosophers. The thoughts of God will have logical form, possibly that specified by standard predicate logic. When God has a descriptive thought (say, 'The queen of England has been a good monarch') his thought has the logical form captured in Russell's theory of descriptions (a quantified conjunction). His general thoughts will have the structure specified in Frege's account of quantification, since this is by common consent the correct theory of generality. His adverbial thoughts will conform to Davidson's theory of adverbs – or whatever is the best theory of adverbs. The content of God's thoughts will include particular objects and not merely general concepts – granted the correctness of 'direct-reference' theories of thought. These theories are not held to be merely contingently true of humans, but to apply to all beings capable of the thoughts in question – and hence to God's thoughts. They are theories of the essence of propositions.⁵

God's putative mastery of language ('In the beginning was the Word, and the Word was with God, and the Word was God') will also imply various theses about his psychology. As we know from Chomsky and others, language is a recursive structure, based on a finite vocabulary, with finitely many grammatical rules. God's language (maybe it is

⁴ If Frege is right, God apprehends objects under modes of presentation, not 'directly', so that his thoughts are perspectival, like ours – they represent the object under a certain specific aspect. It is just that God always knows when two senses correspond to the same reference, so that he can never be surprised by a true identity statement. Hence there is no referential opacity in ascriptions of propositional attitudes to God.

⁵ It is like God's mathematical concepts: he thinks of number according to the theory developed in *Principia Mathematica* (or whatever the best theory of numbers is). The correct analysis of the concept of number applies to anyone employing that concept, human, Martian, or divine – because the analysis tells us what number *is*.

mainly a language of thought, not much used for communication) may not share the precise rules and vocabulary of human languages, but it must still exhibit syntactic and semantic structure. It must be compositional, generative, and imbued with grammatical rules. It cannot be systematically *un*grammatical! It must be based on rules that produce sense not nonsense. Thus God's language faculty has a structure very similar to the human language faculty, at least at an abstract level: a finitely based recursive system of normative rules. Much the same is true of his cognitive capacity: his thoughts too must result from rule-governed combinations of conceptual elements. We can therefore say that this aspect of God's mind has the architecture of systems with 'discrete infinity': words and concepts are discrete entities that can combine into infinitely many complex sentences or thoughts. The divine mind is 'digital' not 'analogue'.

I would say that this kind of cognitive architecture also applies to God's geometrical and social modes of cognition. In both cases we have primitive elements (shapes or individual people) that combine into novel complexes according to fixed rules. When God thinks about human beings in groups, say, his thoughts exhibit the same abstract schematism: he represents us as a social formation made up of individuals that may combine in all sorts of ways and with certain sorts of outcome. How else *could* he think about entities that exhibit the combinatorial character we find in social groups? And the same holds for his geometric representations of the world. If entities are compounded from other entities in law-governed ways, then any adequate conception of those entities will reflect their internal structure, of necessity.

I think we can also assert that God is conscious. There is something it is like to be him, even if we cannot grasp it (compare the bats). On some views, this implies that God harbours 'qualia' in his mind. On other views, every divine conscious state must exhibit intentionality, this being the 'mark of the mental' (Brentano). He must also be self-conscious, much like us. And he must *have* a self – and not just be a mere bundle of sensations or thoughts. His consciousness must be unified, centred. He must refer to himself with the first person 'I' and ascribe conscious states to the self thus referred to, incorrigibly so. These 'I'-thoughts will have the features of all such thoughts, involving immunity to error through misidentification, as well as something like David Kaplan's distinction between character and content. For these are logical features of 'I' and

apply to any user of that word.6

One respect in which the consciousness of God differs from our consciousness (and that of other animals) is that there is no mind-body problem for God. This is simply because he has neither body nor brain. Thus there is no mystery in God's nature stemming from this problem: we don't face a deep puzzle about how the consciousness of God could result from neural activity in God's brain. God's consciousness, unlike ours, does not emerge from brain activity; nor does it evolve from more primitive biological forms. How it does come about is another question, but it certainly doesn't arise from electro-chemical activity in a galaxy-sized divine brain. In this respect, then, God's consciousness is *less* mysterious than ours. It is true that some philosophers have argued that the notion of a disembodied consciousness is not logically coherent, but the idea of an embodied consciousness also presents deep mysteries. God exhibits no mysterious psychophysical link or dependence. His mind is not a mysterious emergent.⁷

God also possesses a will. He decides, has practical reason, and he deliberates.⁸ But is his will free? Everyone knows what a problem this is in the case of humans. The only thing I wish to say about the problem here is that it applies equally to God. Freedom seems to be compatible with neither determinism nor indeterminism, but these exhaust the possibilities, so the will is not free. But God's decisions are subject to the same dilemma, even if he is not constrained by the physical world:

⁶ I assume monotheism in this paper, but the same general points apply under polytheism. The Greek gods, say, will each have mastery of the word 'I', and this word will have a uniform meaning for all of them – and hence the same logical properties. The same logic applies to every thinking being.

⁷ This is not to say that there is *no* mystery about the origin of God's mind – just no mystery about how it could originate in matter (since it doesn't). It might have existed for all eternity in its present fully developed form, or it might have originated in some prior divine reality not of its present form. According to the latter hypothesis, God's mind arose from a *proto* divine substance (if that is the word) that became organized into a full-fledged divine mind. First, there was a primitive divine reality, not yet organized into an actual functioning mind; and then something happened to bring about God's mind, as it now exists.

⁸ Again, we need not suppose that God deliberates *in time*: yet he comes to conclusions, both theoretical and practical, by means of his faculty of reason. How this is possible is, admittedly, something of a mystery – is it to be conceived of as instantaneous or does the concept of time not apply to it at all? In any case, God has plans that he carries out intentionally.

if his acts of will are caused, they cannot be free; but they cannot be free if they are not caused either, for then they will be random (quantum indeterminacy at the divine level will not save God's free will). There are, of course, many attempts to get around this argument, which I cannot discuss here (I have one myself);9 but I think it is fair to report that none are free of difficulty. In any case, free or not, God has a will - he is not purely contemplative or passive. Given that God has a will, he must also have desires and wishes: not for food and sex, to be sure, but for peace, harmony, and goodness. When God acts he acts for reasons, and these reasons comprise beliefs and desires in the usual bipartite way. If God sent his son into the world in order to be our salvation, then he must have desired our salvation and believed that by sending his son he could satisfy that desire. So God has a belief-desire practical psychology: he has desires for certain ends and beliefs about the means for achieving those ends, and he forms intentions by combining his desires and beliefs. Maybe he even has degrees of desire, so that these psychological states are subject to continuous magnitudes – as when we speak of having a strong desire for immortality. Then God's mind would be discrete in some ways (words and concepts) and continuous in others (degrees of desire) – just like ours, in fact, but with a rather different desire set. Presumably God does not work with subjective probabilities in his practical reasoning, given his omniscience, but he still functions according to standard belief-desire psychology, since he acts for reasons.¹⁰

I don't think that God has an unconscious or that he dreams. He certainly does not have a Freudian unconscious (as I doubt that humans do), but he also lacks the kind of cognitive unconscious modern psychology attributes to us. There is no subconscious information-processing going on in God, so as to save on the amount of conscious space being taken up – God has no such computational limitations. In God's mind all is at the forefront of consciousness – like an enormous

⁹ See Colin McGinn, *Problems in Philosophy* (Oxford: Basil Blackwell, 1993), chapter 5. I should apologize for my lack of citation of theologians and philosophers of religion who have written on the topics discussed in this paper. The reason is simply that I have read very little of this literature and am not a specialist in the field.

¹⁰ It is an interesting question whether God has *needs* – such as the need to help humanity or the need to create a universe. I think not, because that would make him vulnerable in case his needs are not met. God cannot suffer when he doesn't get what he needs. It would be quite inapt to think that God has *cravings*.

Cartesian theater.¹¹ As to dreaming, God never sleeps, so he has no opportunity to dream. And what would he dream about – his anxieties and repressed feelings? Would he have wish-fulfilment dreams in which human beings become innocent of all sin? Nor, I conjecture, does God daydream, letting his mind wander where it will. I wonder whether he has an imagination at all, in anything like the way we do, as opposed to intellectual apprehension. Does he have mental images? In what sense modality would he have them? God's mind may be considerably more capacious than ours, but it is also in certain respects simpler.¹²

There is much discussion as to how much of human knowledge is innate. No one doubts that we learn and acquire knowledge, so that not everything is innate, even if much knowledge may be. But God never learns anything - he certainly does not get his ideas from the world outside his mind by employing his senses. He is omniscient and always has been (there was no ignorant childhood). Thus all his knowledge is innate: it all comes from within his own nature, never being derived from what enters through the senses. Empiricism is false for God's knowledge, even if it is true for a good deal of human knowledge. Descartes thought that our innate knowledge was planted in us by God, but he would presumably not say the same about God's innate knowledge - he did not plant it in himself. For where did he get the knowledge to plant? He must have had it already. So God's knowledge belongs to him natively and eternally: he innately knows everything there is to know (assuming divine foreknowledge). Mathematics, logic, metaphysics, ethics, and language - this is all innate for God. And the same must be true for history, geography, cooking and so on, given his general omniscience.

I have said nothing about God's personality. The tradition sometimes ventures an opinion on this, describing God as jealous and vengeful or kindly and forgiving. God is rightly described as a person, with the attributes that define personhood (self-awareness, identity over time, reason, and so on); but it does not follow that he has a personality, and I find myself doubting the idea. It smacks of anthropomorphism,

¹¹ In fact, the idea of a divine unconscious is demonstrably impossible, because it conflicts with God's omniscience: given that God knows everything, he knows what he has in his unconscious – but then it is not unconscious.

¹² God doesn't suffer from conflicts, quandaries, uncertainties, cognitive dissonance, paradigm shifts, mixed emotions, and self-doubt. Nor does he endure aches and pains, troubles of the flesh. God's mind is always clear and focused, perfectly rational, never divided.

does it not? Do we really want to entertain the possibility that God is short-tempered or softhearted or gloomy or cheerful or extraverted or introverted? The concept of personality seems not to fit the mind of God as we grasp it. The same might be said of some animals that have minds: you can have a mind, even quite a sophisticated one, and yet have no personality at all, in the usual sense. Do sheep have personalities, or snakes, or fish? Similarly, I don't think God has a personality, despite his manifest personhood. He has different desires from, say, the Devil, but that is not enough to ground the ordinary notion of personality – with the implication of quirks and arbitrariness of traits. That seems much too limiting, far too human. It would be odd to describe God as having a sparkling personality or as being a bit of an introvert.

Even from this quick survey, I think we can see that the project of divine psychology can yield non-trivial results. We can know quite a bit about the mind of God, even if not everything. But that limitation applies to our knowledge of the minds of terrestrial animals, including ourselves. I doubt that university departments of psychology would provide research money for a project on divine psychology, but it does seem to be a possible enterprise. It could be a branch of theology perhaps – theological psychology or psychological theology.¹⁴

II. THE GOD-WORLD PROBLEM

I now want to discuss the question of the relationship between God and the world. Let us suppose God to exist and the world to exist (both existential claims could be coherently denied). By the 'world' I just mean all of spatio-temporal reality, including the minds of animals and humans. The point I wish to make is that the God-world relationship can be usefully articulated by invoking some ideas drawn from philosophy of mind.

¹³ Typical personality traits cited by psychologists are neuroticism, extraversion, openness to experience, agreeableness, and conscientiousness. A given individual's personality corresponds to a blend of these traits, varying from one individual to the next. But none of these traits seems an apt description of God, except maybe conscientiousness. God falls at no particular point in personality space, as so defined. That is not to say that he lacks specific kinds of desire, such as the desire for good to prevail.

¹⁴ A topic I have not discussed is divine memory. Does God possess a memory? Is that where God stores his vast knowledge? Does he have short-term and long-term memory? How does divine recall work? And what are God's concepts like? Does he employ family resemblance concepts, or vague concepts, or sensory concepts? Does he have a 'conceptual scheme'?

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This will act as a prelude to discussing the question of God's intervention in the world – for that question presupposes an understanding of the metaphysical relation between the two. Again, I will perforce be sketchy.

One view would be that God and the world are totally separate substances. Call the world 'empirical substance' and call God 'divine substance': then this view would be a dualism of empirical and divine substances. Such a position is modelled on the Cartesian conception of mind and body: a pair of independent substances existing alongside one another. God could exist without the world, and perhaps the world could exist without God (say, if God decided to end his own existence and leave the world intact). The two separate substances might be taken to interact or not, depending on one's metaphysical opinions. Let us suppose that they do interact, with God intervening in the course of history. There would then be a problem about how this interaction takes place, analogous to Descartes' problem of interaction. If the divine substance is non-spatial, then the problem will coincide with Descartes' problem, since mind is a non-spatial substance for him. A proponent of this interactionist dualism might propose a celestial pineal gland (the Earth!) as the locus of interaction. But this would be no better than Descartes' own 'solution', leaving the problem exactly where it was. Thus God-world substantial dualism has a classic interaction problem. It therefore seems that God will turn out to be epiphenomenal with respect to the world – which is not a happy result theologically.¹⁵

Then there is the view that God and world coincide in some way. We might here think of Spinoza's doctrine, according to which God and the world are identical. This view is analogous to the identity theory of mind and brain: not two things but one, described in two different ways. By this means we solve the problem of interaction, since we are dealing with just one spatial substance, which obeys the usual causal rules. God can cause events in the world because he *is* the world – parts of him are causing other parts of him, in effect. The trouble with this view is its extreme reductionism, which is tantamount to eliminativism (hence the accusation of atheism against Spinoza). If God is really nothing over and above the world, then it is hard to see what is added to the world by his existence – there may as well be no God at all. The same kind of

 $^{^{15}}$ I am not saying there are no conceivable replies to these problems, just that both sorts of dualism run up against the same sorts of problem: God is to world as mind is to body – an extraneous entity with peculiar causal links.

complaint has been made against identity theories of mind and brain: why speak of mind at all, if brain is all there ultimately is? All we have is a distinction of words.

The remaining views try to avoid this Scylla and Charybdis – dualism and monism - with greater or lesser success. Thus we might try the idea that God emerges from the world, and is yet something over and above the world. This view is modelled on the 'emergentist' view of mind and brain: the mind (necessarily) emerges from the brain, but what emerges is a new level of reality, not reducible to its basis in the brain. Such a position is theologically problematic, because it is hard to see how God could emerge from the world and yet be its creator (the creation relation has been inverted). But it is also metaphysically troubling, because the notion of emergence is mysterious and seemingly miraculous. How can *X* owe its very being to *Y* (and nothing but *Y*) and yet be something over and above Y? It is also not clear how the theory solves the interaction problem, once God has been granted separate ontological status as an emergent entity. We seem to be offered some sort of dual aspect view (or property dualism), and then there is a question how the extra aspect can fit into the causal order. Can't we explain everything at the Y level in terms of the *Y* aspect, with the *X* aspect merely epiphenomenal?

Panpsychism might now be ventured: the mind is already part of the physical world in small packets, so that the emergence of mind from matter is not really radical and miraculous. Atoms have tiny bits of consciousness in them, so when they combine bigger conscious bits result. Pantheism is the analogous doctrine with regard to God: there are bits of divine dust scattered everywhere in the world, and God himself is just their universal summation. Lots of little gods get together to produce one big God, as it were. Thus the emergence of the divine from the empirical is explained – the empirical has bits of divinity in it to start with. Again, there are theological objections to this picture, with respect to creation: but we also have problems about how the combination process works, as well as the sheer implausibility of the doctrine – what exactly are these microscopic hidden gods lurking everywhere, just itching to combine into one big macroscopic God?

Lastly, we have idealism. Berkeley held that the so-called material world consists of ideas in the mind of God, so that the world is really not separate from God. There is only spiritual substance. Thus there is no Cartesian problem of interaction between substances with different essences, since there *is* no material substance. This is analogous to

holding that the brain is nothing but the mind, with mind constituting the basic nature of reality. According to idealism, God never created a material universe, though he did create a universe that exists when we do not perceive it – since ideas always exist in God's mind. All causation is really mental causation, on this view, taking place within the one infinite spiritual substance, which is God. Matter is a myth invented by misguided philosophers; what we really have are ideas subsisting in the divine mind.

None of the views cited are free of difficulty, to put it mildly, either in regard to the mind or to God. There are real problem of metaphysical integration. This means that the problem of integration is not in itself a reason to reject God – any more than the analogous problem about mind and body is a reason to reject mind. In both cases, the dualist position is the one that is most immediately attractive, but it encounters serious difficulties concerning causal interaction (among other things). The other positions are attempts to resolve the interaction problem, but they suffer their own drawbacks. This is philosophy – metaphysics – at its most difficult.

III. GOD'S AGENCY

How does all this bear on the question of divine intervention? Let me distinguish two problems: one about interaction, the other about determinism. If we presuppose a radical dualism of God and world, then we get an interaction problem, analogous to Descartes' problem. How can God make contact with the spatio-temporal world, given that he is not himself spatio-temporal? That is indeed a problem, as it was for Descartes. We either have to declare ineradicable mystery or try to dilute the dualism. But the problem is not peculiar to God's supposed intervention in the world, since it applies also to mind-body dualism. In fact, there is an analogous problem concerning our knowledge of mathematics: how can we know about numbers, given that numbers are platonic entities existing outside of space and time? These are all real philosophical problems; the God case is not unique. Theologians can take some comfort in this fact. ¹⁶

¹⁶ If we follow Hume's lead on causation, we find that *all* causation involves intractable mystery, since we have no adequate idea of power or necessary connection. So it is not just theologians who are saddled with unfathomable causation. From this point of view,

With respect to determinism, the problem is how it can be that God can intervene in the course of history, given that nature is governed by inviolable natural laws. Aren't all his decisions impotent to change the course of history, with the basic laws determining everything that happens? How can God hope to affect what happens in nature when nature operates by laws independently of his will? Again, this is a genuine philosophical puzzle, but it is worth observing that it applies to human decisions too. How can what we decide make any difference to the course of history, given that history is determined by laws of nature and initial conditions? How can there be 'downward causation' - from will to world? The human will looks to be epiphenomenal, with all the causal work being done by factors outside of its operations. How then is it possible for humans to intervene in nature? If we could just identify acts of will with underlying physical mechanisms, then we would not have a problem, because then decisions would be physical events in the basic causal order. But that seems too reductive - just as the analogous position with respect to God's role in history would be (God's will cannot just be an attribute of atoms, say electromagnetism). Thus we are sent on a search for some position that avoids the problems identified so far, with nothing we find proving satisfactory.

Notice that the problem is not confined to the psychological level. How can biological events, such as acts of reproduction, influence the course of history, given that physical determinism holds? Isn't everything fixed by the state of elementary particles already, so that we have no need of extra biological events to explain what happens? But then animal copulation would play no role in determining what happens - which sounds wrong. What we need is a way to reconcile downward causation with physical determinism (or indeterminism if nature is fundamentally indeterministic). This is a genuine philosophical question, to which various answers have been proposed; my point is just that the problem about God's intervention just appears to be a special case of this more general problem, and is therefore not in itself a reason for theological anxiety. How can animal action intervene in the causal order, if it is governed from the ground up by physics? How can divine action intervene in the causal order, if it is governed from the ground up by physics? We surely don't want to accept that God or animals need to

divine causal intervention is not much worse than gravity, which is also (as Newton admitted) 'occult'.

thwart the laws of physics in order to have an influence on what happens, but then it seems that all the causation in the universe proceeds purely from atoms and their laws. As I say, this is a real philosophical puzzle; but it is a *general* puzzle about causation and the entities that populate the universe whose antics make a difference to what happens. It is not clear that the problem of divine intervention in a law-governed world adds anything new or unique.

As to the very different idea that God can intervene in nature in such a way as to disrupt its laws, I hold to the orthodox opinion that no such thing has ever occurred. There is simply no good evidence that such a 'miracle' has ever been observed. What is commonly advanced as evidence is just so much questionable testimony, to which Hume's classic argument applies. 17 The kind of event that would constitute such a breach of natural laws would be the suspension of the law of gravity as someone is plummeting to earth, resulting in their ceasing to fall and floating in thin air. The forces of nature would need to be countermanded by God for that to happen. Even if God has such a power, conferred by his omnipotence, I don't believe he has ever exercised it; and the idea that he does it sparingly and sporadically, for especially good ends, raises the obvious question of why he doesn't do it more often. By contrast, the question of the compatibility of divine intervention and the unbroken existence of natural laws raises a genuine conceptual puzzle; but, as I have said, the puzzle is not confined to God's action in the world.

As a final remark, let me just say that a radically dualist view of the relationship between God and the universe is apt to make the problem of intervention more difficult than under other metaphysical conceptions. It is the same with Descartes' dualism: radical separation makes the mind cut off from the causal network in a way it is intuitively not cut off. We need to find a closer relationship than this if the causal picture is to work. Philosophers have toyed with notions like 'realization' as a way to characterize the relationship between the mental level and the physical level, so that the levels are close enough to make causal sense. The model here would be, say, the way an eye is realized in different anatomical

¹⁷ Namely, we always have more reason to doubt the testimony than to believe in the miracle. In order to overturn this principle in a particular case we would need a lot of very credible testimony, based on solid observation; and that we never seem to find. This Humean point does not show that miracles are impossible, which is a metaphysical claim; it merely shows that it is difficult to get good evidence for miracles, which is an epistemological claim.

organs: being an eye is not identical to any one anatomical type of eye, yet we can say that eyes are 'realized' by different anatomical types. If we take our lead from this example, then we could try saying that God is realized by the universe, without being reducible to the universe. He has no further substance over and above that of the universe, but he is not simply identical to the universe (I suppose this would qualify as a type of pantheism). It is a bit like the way a statue is realized in a particular chunk of bronze, without being strictly identical a chunk of bronze. Is I am not sure I know what this idea of realization comes to for the case of God and the universe, but it least it promises to make it feasible for God to be enmeshed in the natural causal order, without collapsing into it. It is not so much that God intervenes as supervenes, to use the jargon. On this picture, there is a mega-universe that includes both the physical universe and God, with the two locked somehow together. But trying to make sense of this is a tall order.

¹⁸ The classic argument against the identity of statue and chunk of bronze is based on Leibniz's law: the chunk existed before the statue did and persists when the statue is gone, so the two do not have all their properties in common.

SPECIAL DIVINE INSIGHT: ESCAPING THE SNOW QUEEN'S PALACE

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Abstract. Insights play a role in every field that can be called knowledge, but are of particular interest to the philosophy of religion and special divine action. Although these acts of understanding cannot be generated at will, a second person can vastly accelerate understanding by a first person. In this paper, I argue that this catalysis of insight is best attained in a situation of 'second-person relatedness', involving epistemic humility and shared awareness of shared focus. I also argue that this approach provides an appropriate interpretation of Aquinas's account of God's gift of understanding. On this basis, it is specifically the context of second-person relatedness to God, as 'I' to 'you', that is expected to have the most far-reaching impact on understanding of the world. I illustrate the conclusions by means of the story of *The Snow Queen*, by Hans Christian Andersen, drawing also some practical implications for insights in daily life.

I. THE PUZZLE OF INSIGHT

What awaited her there was serious to the degree of sorrow and beyond. There was no form nor sound. The mould under the bushes, the moss on the path, and the little brick border, were not visibly changed. But they were changed. A boundary had been crossed. She had come into a world, or into a Person, or into the presence of a Person. Something expectant, patient, inexorable, met her with no veil or protection between.¹

Research into the questions surrounding special divine action has tended to focus on miracles, but the kind of experience described above is probably more common and arguably more efficacious by the measure of changed minds and lives. Like a light switch being thrown, a door into daylight

¹ C. S. (Clive Staples) Lewis, *That Hideous Strength: A Modern Fairy-Tale for Grown-Ups* (London: Bodley Head, 1945), p. 395.

opening into a dark room, or someone who is blind receiving sight, there is a step-change, a shift to a different, larger or higher perspective. Such transformations or 'epiphany moments' are often associated today with words that denote one or other of their typical characteristics, such as the German 'aha-erlebnis' (literally, an 'aha! moment') and the 'eureka effect', after the exclamation attributed to Archimedes when he realised how to test whether a crown was made of pure gold.² First-person accounts of such experiences also refer to their suddenness, a new ease in solving a problem or positive affect, and a feeling of confidence in being right.³ A common feature of these descriptions, however, is their use of metaphors of unveiling, illumination or sight, such as 'seeing' how various facts fit together. For this reason, I refer to the phenomenon that is the focus of this paper by the term 'insight'.

In the broadest sense, insights play a role in every field that can be called knowledge, whether trivial or profound, theoretical or practical, philosophical or scientific. Breakthroughs in science that could be classified as insights include the *ouroboros* dream of August Kekulé⁴ and the 'paradigm shifts' studied in Kuhn's *Structure of Scientific Revolutions*.⁵ Insights are also frequently associated with religious experiences, as in the narrative above, and with concomitant new perspectives on the

² Pioneering work on the 'aha! moment', as an 'inner illumination', was carried out by Karl Bühler, cf. *The Mental Development of the Child, a Summary of Modern Psychological Theory*, trans. by O. A. Oeser, International Library of Psychology, Philosophy, and Scientific Method (London: Kegan Paul, Trench, Trübner, 1930), chap. 14. See also Pamela M. Auble and others, 'Effort toward Comprehension: Elaboration or "aha"?', *Memory & Cognition*, 7 (1979), 426–34. The term 'epiphany' to describe such moments is from the Greek *epiphaneia*, meaning 'manifestation' or 'striking appearance', a word made famous by the account of the wise men finding the child Jesus in the Gospel of Matthew 2:1-11. The term was adapted to a more secular context in literature principally by the work of James Joyce; see, for example, Zack Bowen, 'Joyce and the Epiphany Concept: A New Approach', *Journal of Modern Literature*, 9 (1981), 103–14.

³ Sascha Topolinski and Rolf Reber, 'Gaining Insight Into the "Aha" Experience', *Current Directions in Psychological Science*, 19 (2010), 402–5.

⁴ Kekulé claimed that he had discovered the ring shape of the benzene molecule after having a reverie or day-dream of a snake seizing its own tail (an 'ouroboros'). Although the details remain controversial, the story illustrates a more general lesson of the association of images with new insights in the development of modern chemistry. See Alan J. Rocke, *Image and Reality: Kekulé, Kopp, and the Scientific Imagination*, Synthesis (Chicago, Il; London: University of Chicago Press, 2010).

⁵ Thomas S. Kuhn, *The Structure of Scientific Revolutions* (Chicago; London: University of Chicago Press, 1962).

world that have been a focus of study since at least Wisdom's 'Parable of the Garden'. At a deeper level, descriptions of insights frequently testify to an intuition that there is something inherently divine about them. This intuition is well-founded in at least one sense, namely that if there is a personal God with the traditional attribute of divine simplicity, then cognition by God is held to resemble more closely what human persons experience as all-at-once understanding rather than discursive reasoning. For these and other reasons, insight is a particularly important topic for the philosophy of religion.

Despite its familiarity and extraordinary importance, the direct study of insight has nevertheless long presented inherent and peculiar challenges. Philosophical argumentation generally proceeds by means of discursive reasoning applied to clear and distinct representations of reality, expressed by means of language or logic. By contrast, insight has a sudden, all-at-once quality and is not the conclusion of an argument.⁹

⁶ John Wisdom, 'Gods', *Proceedings of the Aristotelian Society*, New Series, 45 (1944), 185–206.

⁷ Accounts of insight often somewhat resemble theories of knowledge in terms of divine illumination. See, for example, Robert Pasnau, 'Divine Illumination', in *The Stanford Encyclopedia of Philosophy*, ed. by Edward N. Zalta, Spring 2015, available at: http://plato.stanford.edu/archives/spr2015/entries/illumination/ [accessed 21 May 2015]. At the time of writing, it is also notable that the Stanford Encyclopedia of Philosophy has no distinct entry on 'insight' or closely related terms, a lacuna that may testify to the inherent challenge of applying the tools of analytic philosophy to this topic.

⁸ See, for example, Thomas Aquinas, *Summa theologiae (ST)* 1.14.7. Insight is closely related to understanding, and insight has been called an 'act of understanding', cf. Bernard J. F. Lonergan, *Insight: A Study of Human Understanding*, ed. by Frederick E. Crowe and Robert M. Doran, *The Collected Works of Bernard Lonergan*, 5th edition, revised and augmented (Toronto: Published by University of Toronto Press for Lonergan Research Institute of Regis College, 1988), iii, p. 69. One meaning of understanding is to 'stand under', cf. 'Under'stand, v', *OED Online* (Oxford University Press), available at: http://www.oed.com/view/Entry/212085 [accessed 21 May 2015].

⁹ For such reasons among others, it has proved impossible to program any kind of computer to generate insights, a major frustration to efforts to create artificial intelligence. For an account of the problems that insight presents to the challenge of artificial intelligence, see, for example, Stuart Shanker, *Wittgenstein's Remarks on the Foundations of AI* (London: Routledge, 1998), chap. 4. This distinction between discursive reasoning, associated with the manipulation of representations of the world, and insights, associated with new presentations of the world, parallels a widely observed asymmetry in the typical operations of the two hemispheres of the brain. Iain McGilchrist has compiled a vast body of evidence that supports the position that use of the left-hemisphere (LH) of the brain is biased toward the use of existing representations and models of the world, of the analysis of parts rather than the perception of wholes,

Instead, insight involves a presentation or a re-presentation of what is known from a 'new perspective' or 'in a new light'. A common visual example of this change of perspective is the illusion made famous by Ludwig Wittgenstein in which one and the same unchanging image, seen initially to be a duck, is suddenly seen as a rabbit (or vice versa). More obviously useful examples of insight include common processes of abstraction, for example, suddenly 'seeing' or 'understanding' an accumulating series of data points on a graph as instances of an underlying relationship following a simple geometric law. This new understanding can lead to revised representations of the world and shape new premises and discursive reasoning, but the insight itself is not the result of reasoning of this kind, and true insights may even undermine

and of linear, sequential arguments. By contrast, the use of right-hemisphere (RH) is more closely associated with *gestalt* perception, new presentations, and metaphor, by which words carry over into embodied experience. Iain McGilchrist, *The Master and His Emissary: The Divided Brain and the Making of the Western World* (New Haven; London: Yale University Press, 2009). See especially ch. 2. Insight has been associated specifically with RH activation, mainly the right anterior temporal area, specifically in the right anterior superior temporal gyrus. Where high levels of restructuring are required, there is also activity in the right prefrontal cortex. See Edward M. Bowden and Mark Jung-Beeman, 'Aha! Insight Experience Correlates with Solution Activation in the Right Hemisphere', *Psychonomic Bulletin & Review*, 10 (2003), 730–37. John Kounios and others, 'The Origins of Insight in Resting-State Brain Activity', *Neuropsychologia*, 46 (2008), 281–91. Simone Sandkühler and Joydeep Bhattacharya, 'Deconstructing Insight: EEG Correlates of Insightful Problem Solving', *PLoS ONE*, 3 (2008), e1459.

¹⁰ The notion that insight is experienced as a new presentation of the world, rather than a manipulation of pre-existing representations, is consonant with its other characteristics. For example, the word 'insight' and other visual metaphors associated with the phenomenon, like the exclamation 'I see', imply the immediate and all-at-once cognition of something new. Moreover, this 'seeing' with the mind is often closely associated with the perception of an object, with the eyes or in the imagination. It is plausible, for instance, that what provoked the famous 'Eureka!' of Archimedes was not immediate knowledge of the steps required to solve the problem, the details of which were presumably elucidated later, but 'seeing' the solution implicitly and inchoately by seeing the water rising up the side of the bath.

¹¹ Hence those studying insight have also taken a particular interest in psychology, especially *gestalt* psychology. See Ludwig Wittgenstein, *Philosophical Investigations*, trans. by G. E. M. Anscombe (New York: Macmillan, 1953), pt. II.xi.

¹² The 'problem' of induction, made famous by the epistemological framework of David Hume, *An Enquiry Concerning Human Understanding*, Oxford World's Classics (Oxford: Oxford University Press, 2007), chap. 4., is another way of expressing the discontinuity between what can be achieved by discursive reasoning and insight. The connection between induction and insight is made, for example, in Lonergan, iii, p. 313.

previous, apparently consistent arguments.¹³ Since it is impossible to model an insight by means of an argument, or to analyse its discrete steps, or to generate an insight at will, those who are interested in promoting or studying insights have to resort to heuristic guidelines without guarantee of success, like trying to conduct experiments on lightning.¹⁴

Such limitations might seem to preclude many fruitful lines of enquiry, but there are still ways to gain insight into insight, albeit usually by indirect methods.¹⁵ For example, although some insights are acquired in social isolation, the quality and rate of acquisition of insights can be increased dramatically in certain social settings. Indeed, teaching has been described as a process of catalysing insights.¹⁶ As a literary example, consider the following passage from Jane Austen's *Mansfield Park*,

Kept back as she [Fanny] was by everybody else, his [Edmund's] single support could not bring her forward; but his attentions were otherwise of the highest importance in assisting the improvement of her mind, and extending its pleasures. He knew her to be clever, to have a quick apprehension as well as good sense, and a fondness for reading, which, properly directed, must be an education in itself. Miss Lee taught her French, and heard her read the daily portion of history; but he recommended the books which charmed her leisure hours, he encouraged her taste, and corrected her judgment: he made reading useful by talking to her of what she read, and heightened its attraction by judicious praise. In return for such services she loved him better than anybody in the world except William: her heart was divided between the two.¹⁷

¹³ Galileo's challenge to geocentrism was arguably a case of a true insight raising problems lacking immediate solution; cf. Paul Feyerabend, *Against Method*, Updated ed. / new introduction by Ian Hacking (London: Verso, 2010).

¹⁴ Rule-of-thumb recommendations include attending to connections, coincidences and curiosities, investigating contradictions, and 'creating breakthrough solutions through the force of desperation', according to Gary Klein, *Everything That Follows Is Different: The Disruptive Power of Insight* (New York: PublicAffairs,U.S., 2013).

 $^{^{15}}$ I use the term 'indirect' on the basis that insights tend to be studied by means of before and after comparisons, rather than a direct study of the moment itself.

¹⁶ 'Teaching is a vast acceleration of the process of learning. It throws out the clues, the pointed hints, that lead to insights; it cajoles attention to remove the distracting images that obstruct them; it puts the further questions that reveal the need of further insights to complement and modify and transform the acquired stores ... 'Lonergan, iii, p. 315.

¹⁷ Jane Austen, *Mansfield Park*, ed. by James Kinsley, Oxford World's Classics (Oxford; New York: Oxford University Press, 2003), p. 18.

The use of phrases like 'recommending books' and 'correcting judgment' in this text indicate at least some of the ways in which one person may help to catalyse the insights of another. As a human person who already 'sees' the world in a certain way, the teacher can provide hints, draw attention to key facts, remove distractions, put questions and praise progress towards the goal that the student cannot perceive in advance. Hence a second person can vastly accelerate understanding by a first person.

What, then, are the dispositions of the first person that favour the reception of such insights? The question is of decisive importance to the successful communication of insights from a second human being, and is therefore central to teaching. The question also has the implications, however, for modelling how insights might be communicated from a divine person. As noted previously, accounts of divine revelation and accounts of insight often follow similar patterns, such as their suddenness, all-at-once quality, and a sense of transformation in the way that one perceives the world. Moreover, traditional theism attributes to God the desire that the human person should become God-like.¹⁸ On this basis, God presumably desires to impart divine understanding, but if this cannot be imposed, even by God, then the dispositions of a first person to receive such understanding freely will be decisive for a fruitful outcome.19 Hence the study of the communication of insights between human persons has a direct relevance to special divine action, at least as it is experienced in a common and efficacious mode. I begin, therefore, by examining the communication of insight by human persons.

II. EPISTEMIC PRIDE, HUMILITY AND LOVE

As a way to clarify the dispositions of a first person that favour the catalysis of insights communicated by a second person, it is helpful to begin by examining the more tractable question of what dispositions tend to block such insights. One obvious answer is that a first person must not already attribute to himself adequate understanding of some

¹⁸ See, for example, 1 John 3:2; 2 Peter 1:4.

¹⁹ The principle that grace, and the concomitant divine gifts such as understanding, can be refused by human choice is an official Catholic teaching (cf. Council of Trent, Decree on Justification, Canon IV) that is also widely held, though not exclusively held, in many non-Catholic circles.

matter, an attribution that would preclude openness to new insights. On this basis, a first inhibition of insight can be defined as follows:

P1: Ascribing to oneself an understanding that one does not possess.

Although this state might seem transparently foolish to those who do possess the understanding in question, it should be noted that its absence may not be apparent to the person who is this condition. Just as insight cannot be derived, neither can the absence of insight be derived, especially if one already has an internally consistent representation of the world. Moreover, the sense of certainty associated with such representations is often associated with stubbornness. This observation is consistent, as it happens, with a model that treats the right-hemisphere (RH) of the brain as the principal locus of the neural conditions and concomitants of insight, and the left-hemisphere (LH) as the principal locus for representations. Persons making exclusive use of the LH are more likely to insist on some deduction from their representations of the world being correct, even when these results are shown to be wrong,²⁰ although it should be noted that there is a need for caution in interpreting these findings.²¹

A second disposition that would tend to block insights from another would be the self-ascription of the capacity to acquire understanding by one's own reasoning, contrary to one of the core characteristics of an insight. On this basis, a second inhibition of insight can be defined as:

P2: Thinking that one can acquire for oneself some understanding that is received from another.

An objection might be made to this definition, namely that people do in fact acquire understanding of all kinds of matters by working alone. Nevertheless, such capacities would not be possible without a great deal of prior intellectual formation by others, given the vast amount of

²⁰ Michael S. Gazzaniga, *The Integrated Mind* (New York; London: Plenum, 1978), pp. 148–9. Use of the LH is associated with 'confabulation'; cf. Jaak Panksepp, 'At the Interface of the Affective, Behavioral, and Cognitive Neurosciences: Decoding the Emotional Feelings of the Brain', *Brain and Cognition*, Affective Neuroscience, 52 (2003), 4–14 (p. 10). By contrast, use of the RH seems to makes it easier for a person to hold a range of ambiguous possibilities in suspension, which may open a conceptual space for new insights; cf. McGilchrist, pp. 137–141.

²¹ Cf. M. R. Bennett and P. M. S. Hacker, *Philosophical Foundations of Neuroscience* (Malden, MA; Oxford: Blackwell, 2003), pp. 388–393.

work needed by parents, caregivers and teachers. Moreover, as noted previously, even the insight of a solitary person cannot be willed or acquired through the application of discursive reasoning alone, having instead the character of an unexpected gift, even when this exchange is between what is grasped by diverse faculties of cognition.²² Hence a disposition that inhibits the reception of insights on the basis that one can acquire insights for oneself by one's own choice and reasoning would seem to be extremely debilitating.

At this point, these insight-inhibiting dispositions suggest a pattern that is familiar in virtue ethics, insofar as they follow the basic form of the first two of the four species of pride identified by Gregory the Great and listed by Thomas Aquinas in his *Summa theologiae* (*ST*) 2-2.162.4.²³ Given that the first two insight-inhibiting dispositions can be mapped to the first two species of pride, this pattern suggests that it is also worth examining how the remaining species of pride might correspond to additional insight-inhibiting dispositions. On this basis, the third such disposition would be:

P3: Thinking that some understanding to be received from another is due to one's own merits.

A person with this disposition would be aware that insights are to be received from another, but is mistaken about the nature of the relationship with the other person. The mistake is to see this relationship in contractual terms, as if one is owed insights on the basis of what one already possesses or what one can exchange in return. One problem with this attitude, however, is that insights are not commensurate, so it is unclear what would merit a new insight. Moreover, as noted previously, an insight has the nature of an unexpected gift (whether the giver can be identified explicitly or not), for which, for example, one may have to wait patiently without guarantee of success. As a practical example of this disposition in operation, one might imagine the case of an arrogant student who thinks that because he has paid the teacher, or because he

²² Given the tendency of LH-dominated thinking to confabulate (see note 20), it is arguable that something like epistemic humility is needed to accept insights from the appropriate faculty of an individual person, in a manner that has some parallel to the way in which such humility is needed for the communication of insights between persons.

²³ I am adapting here an analysis of the four species of pride carried out in Andrew Pinsent, 'Humility', in *Being Good: Christian Virtues for Everyday Life*, ed. by Michael W. Austin and Douglas Geivett (Grand Rapids, Michigan: Eerdmans, 2012), pp. 250–255.

thinks that he already knows roughly what the teacher ought to be doing in order to communicate understanding, proves impossible to teach.

The fourth kind of pride has been made famous by one of the parables of Jesus Christ, *The Pharisee and the Tax Collector*. A Pharisee, praying in the temple, thanks God for his unmerited gift of virtue, but he also thanks God that he, the Pharisee, is not like other men. He is particularly grateful that he is not like the tax collector who is standing at a distance, not daring to raise his head, and simply begging God for mercy. This Pharisee manifests the fourth species of pride defined by Aquinas, the wording of which can be adjusted slightly in a manner appropriate to insight as follows:

P4: Thinking that some unmerited understanding that one has received from another is greater insofar as others do not have it.

On the face of it, once someone has attained some understanding it may seem a matter of indifference whether others have it or not. Hence it may not be clear why P4 would block insights, or whether it is entirely reprehensible anyway, insofar as many would agree that there is some proper satisfaction in being the first to understand some difficult matter. Nevertheless, insights are more enjoyable if shared, and hence it seems a misunderstanding of the nature of insight to find satisfaction in the continuing ignorance of others. Moreover, as insights are cumulative, a state in which others are left ignorant is also self-inhibiting as regards the future enhancement of one's own understanding.

Besides these dispositions, it is plausible that one can also inhibit insights by damaging or diverting the faculty of understanding in various ways. As regards matters pertaining to moral choice, Aquinas cites intellectual 'blindness' and dullness of mind as vices that inhibit understanding, principally by reason of diversion to unworthy matters (ST 2-2.15.3). Moreover, as noted previously, social neuroscience has suggested that there are certain neural concomitants, damage to which may make it more difficult to receive insights. Nevertheless, the four dispositions above seem to cover the full range of possibilities for the inhibition of an insight in matters pertaining to moral choice and to a relationship with another from whom one receives insights in the manner of an unmerited gift. Given that their pattern matches that of the genus of pride, one might call these dispositions *epistemic pride*,

²⁴ Luke 18:9-14.

summarised as:

A disposition to attempt to gain understanding inordinately, namely by manipulation of previously-adopted representations of the world and the concomitant exclusion of new presentations received in the manner of a gift.

This definition appears adequate to encompass the four species of epistemic pride, given that P1 and P2 involve manipulation of pre-existing representations of the world, and P3 and P4 involve the exclusion of new presentations of the world received in the manner of an unmerited gift, a gift that properly understood is a joy to share. The term 'concomitant' is included because these two sets of two dispositions are also mutually interrelated: the manipulation of previously-adopted representations of the world will tend to exclude openness to new presentations; while an exclusion of new presentations will also constrain understanding to work with the tools of previously-adopted representations.

What then is opposite of epistemic pride? Obviously, its name is *epistemic humility*, but the meaning of humility in general has long presented a challenge to virtue ethics.²⁵ Epistemic humility may therefore be defined most simply in terms of holding back the species of epistemic pride:

A disposition to hold back from attempts to gain understanding inordinately, namely by manipulation of previously-adopted representations of the world and the concomitant exclusion of new presentations received in the manner of a gift.

Nevertheless, for this definition to be adequate it is also important to check not merely what is known to block the communication of understanding, but also how such communication is effected, since the removal of known impediments does not necessarily mean that communication is then possible. How then does a person receive understanding from another in the manner of a gift?

A brief reflection shows that the communication of insight cannot be like receiving an object from someone or sharing facts expressed by a proposition. A fact expressed by a propositional sentence can

²⁵ As is well known, Aristotle found no place for humility in the *Nicomachean Ethics*, and the disposition is mentioned only once in Plato's *Laws*, where it is described in the context of friendship with God. According to Plato, loss of humility leads to loss of divine friendship, following which a person quickly leads his city (a city that can also stand for the human soul) to ruin (*Laws* 4.716a-b). See Pinsent, 'Humility'.

seemingly be dissociated from any particular person, to the extent that the records of such facts can be left quietly undisturbed in libraries for centuries. By contrast, understanding is irreducible to facts and also pertains to a person, as in the cases 'I understand', 'you understand' or 'she understands'. Although understanding can be discussed objectively, as in this paper, it retains this irreducibly personal aspect, even if this aspect is only implicit. How then does understanding bridge the gap between a second person, as in 'You understand', and a first person, as in 'I understand'?

As noted previously in regard to the passage from *Mansfield Park*, Jane Austen draws attention to the way in which Edmund communicates understanding by selecting materials, correcting judgments and so on, and these are clearly ways in which insights may be catalysed. Moreover, the sense that Edmund has a greater understanding than hers may encourage Fannie to persevere, insofar as she may then have the confidence that there are new insights to be grasped. Nevertheless, Austen draws attention not only to Edmund's teaching skills but also to the love that informs the relationship, 'She (Fannie) loved him (Edmund) better than anybody in the world except William: her heart was divided between the two.' This use of terms of affection, combined with the description of Edmund's manner of teaching, hints that interpersonal relatedness plays an important role.²⁶ What kind of relatedness then is conducive to the communication of understanding, and how is such communication actualised?

The situation that Austen describes, involving mutual personal presence, is one that has attracted much interest in recent decades, and many studies have emphasised that much of what is communicated is not easily reducible to propositions. Consider, for example, the action of pointing something out in a situation of mutual personal presence. Even this simple action, without words, communicates understanding by abstracting an object from the background of the visual field and indicating that the object is worthy of attention. Moreover, this action is accompanied by at least a momentary shared awareness of shared attention with the other person, often also with a shared 'stance'.²⁷

²⁶ I use the term 'relatedness' rather than 'relation' or 'relationship' as the latter words convey an intimacy or familiarity that may not be present in all pertinent cases. I am grateful to Peter Hobson for making this point to me.

²⁷ By 'stance' I mean what Eleonore Stump has described as a 'conative attitude prompted by the mind's understanding'; cf. Eleonore Stump, 'The Non-Aristotelian

Although seemingly commonplace, pointing has been described as one of the keys by which an infant begins to unlock the meaning of the world,²⁸ such actions being instances of a broader range of phenomena called 'joint attention' or 'second-person relatedness'.²⁹ At a more complex level, the extended dialogue of a teacher and student in a situation of second-person relatedness will often involve the sharing of a complex pattern of stances towards diverse matters, not only by explicit speech (such as pointing out useful books), but also by prosody, non-verbal communication and a variety of other means.³⁰ Such exchanges may help trigger insights, rather as the revelation of fragments of a picture from a new and hitherto unknown perspective may suddenly be interpolated into a whole image. Such a communication of insight might be called *second-person understanding*, in the sense that it is catalysed specifically in the context of joint attention with a second person.

Given the success of teaching at accelerating insights, there is an inherent plausibility in such a model. Nevertheless, the notion that there is genuine second-person understanding, dependent on 'I'-'you' relatedness, might seem challenging to test in exchanges between typical adults, given the number of other means of communication and possible causes of insights. What can be done, however, is to look at situations in which second-person relatedness is atypical or inhibited, such as autistic spectrum disorder (ASD), and to see if such conditions are correlated with atypical or inhibited understanding. Under a variety of terms, with

Character of Aquinas's Ethics: Aquinas on the Passions', Faith and Philosophy, 28 (2011), 29–43 (p. 41).

²⁸ Clara Claiborne Park, *The Siege: The First Eight Years of an Autistic Child (With an Epilogue, Fifteen Years After)* (Boston, London: Little, Brown and Company, 1982), p. 6.

²⁹ Joint Attention: Communication and Other Minds: Issues in Philosophy and Psychology, ed. by Naomi Eilan and others (Oxford: Clarendon Press, 2005). I explore the close connection, to the point of interchangeability, between 'joint attention' and 'second-person relatedness' in Andrew Pinsent, *The Second-Person Perspective in Aquinas's Ethics: Virtues and Gifts* (New York; Abingdon, UK: Routledge, 2012), pp. 47–49.

³⁰ There is a vast literature on these matters, the general emphasis of which is the need to think about language not simply in terms of objective symbol use and organization, but as a communicative interaction between persons. See, for example, John T. Nusbaum, 'Language and Communication', in *The Oxford Handbook of Social Neuroscience*, ed. by Jean Decety and John T. Cacioppo, 1st edn (Oxford University Press, USA, 2011), pp. 668–79.

many studies going back to Kanner's original description of autism,³¹ research suggests that there is indeed a correlation. For example, those with ASD often focus on local features instead of global patterns,³² suggesting a difficulty in turning many 'trees' into a single 'forest' within which the trees stand.³³ Another commonly reported difficulty is being overwhelmed in social situations or crowded places, consonant with an inability to group and set aside details.³⁴ Other difficulties include a failure to consolidate learning over time and poor predictive abilities, such as a failure to anticipate picking-up by parents and the timing of air puffs to eyes, 35 as well as difficulties in grasping the intentions conveyed by social cues.³⁶ All these symptoms can be interpreted as challenges in understanding, insofar as they involve difficulties in relating parts to wholes, or grasping the underlying regularities of the world, or in comprehending the intentions of others. On the other hand, by way of compensation, those with ASD may display superior performance on local tasks, including reduced contextual modulation or interference.³⁷ These many findings suggest that an inability to engage in joint attention also inhibits one of the most common ways in which human persons acquire insights, and perhaps also the dispositions to acquire insights. Hence across a wide variety of phenomena, one of the common characteristics of ASD is underdeveloped understanding.

³¹ Leo Kanner, 'Autistic Disturbances of Affective Contact', *Nerv. Child*, 2 (1943), 217–50.

³² See, for example, Uta Frith and Francesca Happé, 'Autism: Beyond "theory of Mind", *Cognition*, 50 (1994), 115–32; Simon Baron-Cohen, 'The Extreme Male Brain Theory of Autism', *Trends in Cognitive Sciences*, 6 (2002), 248–54; Francesca Happé and Uta Frith, 'The Weak Coherence Account: Detail-Focused Cognitive Style in Autism Spectrum Disorders', *Journal of Autism and Developmental Disorders*, 36 (2006), 5–25.

³³ Ning Qian and Richard M. Lipkin, 'A Learning-Style Theory for Understanding Autistic Behaviors', *Frontiers in Human Neuroscience*, 5 (2011). See also Temple Grandin, *Thinking in Pictures: And Other Reports from My Life with Autism*, 2nd ed. (London: Bloomsbury, 2006).

³⁴ John Elder Robison, Be Different: Adventures of a Free-Range Aspergian with Practical Advice for Aspergians, Misfits, Families & Teachers (New York: Crown Archetype, 2011).

³⁵ Kanner, 'Autistic Disturbances of Affective Contact'; Lonnie L. Sears, Peter R. Finn and Joseph E. Steinmetz, 'Abnormal Classical Eye-Blink Conditioning in Autism', *Journal of Autism and Developmental Disorders*, 24 (1994), 737–51.

³⁶ Courtenay Frazier Norbury, Helen Griffiths and Kate Nation, 'Sound before Meaning: Word Learning in Autistic Disorders', *Neuropsychologia*, 48 (2010), 4012–19 (p. 4013).

³⁷ See again, for example, Frith and Happé; Baron-Cohen; Happé and Frith.

This connection between a lack of second-person relatedness and understanding suggests also the need to augment the initial definition of epistemic humility above. As noted previously, epistemic pride impedes openness to insights from another person. At a deeper level, however, the lesson from ASD is that it is not only epistemic pride, as 'pride' is commonly understood, that blocks insights but also a lack of second-person relatedness to others. In other words, it is not only the rejection of insights, but indifference to the person that matters. Strictly speaking, in matters of moral choice these two conditions are correlated, since pride also inhibits second-person relatedness. As cases of ASD show, however, it is also possible to have a lack of second-person relatedness without what one would normally classify as 'pride'. Given its importance, it therefore seems worthwhile to write second-person relatedness explicitly into an augmented definition of epistemic humility as follows:

A disposition to hold fast to second-person relatedness with some giver of understanding, holding back from attempts to gain understanding inordinately, namely by manipulation of previously-adopted representations of the world and the concomitant exclusion of new presentations received in the manner of a gift.

With this definition, it is made clear that the epistemic humility that is conducive to the communication of insights exists in the context of second-person relatedness, and is a disposition not only to prevent the blocking of insights from another, but also to maintain the relation with the other. Moreover, there is another way of describing this relation. Although second-person relatedness can be momentary and is improperly described as 'love', one can describe it as having the form of the beginning of love defined as friendship, insofar as it involves a momentary sense of union combined with a shared stance, a momentary participation in the good perceived by another.³⁸ One can therefore describe this relatedness as having the disposition, if not the fruition of love. Hence the interrelated dispositions of epistemic humility and love facilitate the reception of understanding from a second person.

³⁸ I have drawn this account from the description of the twofold desires involved in love, i.e. the good of the beloved and unity with the beloved, outlined in Eric J. Silverman, *The Prudence of Love: How Possessing the Virtue of Love Benefits the Lover* (Lanham, MD: Lexington Books, 2010), p. 59.

III. DIVINE SECOND-PERSON UNDERSTANDING

Up to this point, the link between second-person relatedness and insight has been examined in the case of the second person as a human being. As noted in the introduction, however, insight has long been associated with the notion of divine illumination. Given that second-person relatedness between human persons is one way to catalyse new insights, might this be a metaphor for how an interaction with God could catalyse a new insight, as in the opening text? Are those dispositions that are conducive to receiving insights from a human person also conducive to receiving insights from God?

Within the context of classical philosophy, the notion of a relationship between God and human beings that could be described as 'secondpersonal' is uncommon. Although Aristotle refers to God in the third person, he does not address God as a second person and even denies that it is possible to be friends with God.³⁹ Nevertheless, the account drawn from natural philosophy is not the whole story of purported human interactions with God. A central theme in the history of the Jewish people and in Christianity is the notion of a covenant with God. The use of terms pertaining to marriage as metaphors for these covenants, as well as adultery for breaking them, underlines that they are to be understood in second-personal terms. 40 Moreover, the grammar of Augustine in the Confessions, who writes of God in intimate terms of love as 'I' to 'you', manifests a profound experience of second-person relatedness with God. 41 Although this distinction was not put on a systematic basis until the thirteenth century, the relationship that Augustine articulates is that of a new life that is called 'supernatural' or a life of grace. This life of grace is one of second-person relatedness to God, an aspect that is absent

³⁹ Nicomachean Ethics (EN) 8.7.1158b36-1159a3

⁴⁰ See, for example: Isaiah 54:5; Jeremiah 3:20; Ezekiel 16:15–19; and especially the book of Hosea, in which the adultery of the prophet's wife, Gomer, signifies the sin of the children of Israel (Hosea 2:2–5; 3:1–5; 9:1) in breaking their covenant with God; in the New Testament see, for example, James 4:4–5. Note that many cultural and religious practices in these traditions also serve to encourage, express or defend the notion of second-person relatedness with God in the manner of a covenant. For example, the notion of a covenant is central to much liturgy and sacrifice, and one can also point to the extensive use of narratives in sacred texts, the unique literary genre that communicates a sense of knowing a person, as well as the emphasis on the face in Christian art, following the Incarnation.

⁴¹ See, for example, Augustine, Confessions 10.27.38.

from the Aristotelian *life of nature*, and which is spiritually autistic from a perspective of grace.⁴²

Within the context of this second-person life of grace, a human person is also described as being enlightened by God in various ways. According to Thomas Aquinas, who developed an extremely detailed systematic account of this new life, understanding (intellectus) has a twofold aspect. On one hand, there is the intellectual virtue of understanding, which Aquinas equates with the corresponding virtue described in the Nicomachean Ethics.⁴³ On the other hand, there is a second and homonymous understanding that is a divine gift, in the context of a life of grace in which humility and caritas (divine love or friendship with God) are integral dispositions.⁴⁴ Since all such gifts of the Holy Spirit, as Aquinas describes them, dispose a person to be moved by God in the manner of joint attention, one can consider this gift to pertain to an understanding that a person gains specifically in the context of second-person relatedness with God. 45 Aquinas uses the metaphor of light to describe the operations of both the virtue and gift, but observes that the light of the gift penetrates to what is needed for supernatural beatitude with God, extending further than the natural light of understanding.⁴⁶ He also illustrates the gift of understanding in implicitly second-personal terms, as when he describes the work of the Holy Spirit as teaching a person all things that are necessary for salvation and cites Jesus Christ enlightening the minds of his disciples about the meaning of the scriptures as they walk side by side together on the road

⁴² The phrase 'spiritual autism' should, of course, be read as a metaphor, just as 'spiritual blindness' has long been a metaphor in theological discourse, without implying that the corporeally blind are spiritually inhibited. As I have argued in detail in Pinsent, *The Second Person Perspective in Aquinas's Ethics*, especially chapter 2, the vast systematic description of this life of grace developed by Thomas Aquinas is not only organised around divine friendship but has, as its root metaphor, the notion of being moved by God in a second-person way, comparable to shared awareness of shared focus with a human person. So one of the most influential and most detailed articulations of the meaning of the life of grace has as its core principle the notion of second-person relatedness with God, a condition in which the innate 'spiritual autism' of the post-lapsarian human condition is dispelled.

⁴³ ST 1-2.57.2.

⁴⁴ The gift of understanding, in contrast to the homonymous virtue of understanding, is described in *ST* 2-2.8. According to Aquinas, all the infused virtues and gifts have the form of divine love (*caritas*) or friendship; cf. *ST* 2-2.23.8.

⁴⁵ See Pinsent, *The Second Person Perspective in Aquinas's Ethics*, chap. 2.

⁴⁶ ST 2-2.8.1 c.; cf. 2-2.8.5 ad 1.

to Emmaus.⁴⁷ This account seems to dovetail well with the narrative with which this paper began, namely the story of someone suddenly seeing the world from a new perspective, not changed visibly, but grasped with a new understanding in presence of a divine person.

So theological accounts of human flourishing include a role for what one might call divine second-person understanding. The theological framework for understanding this understanding, however, suggests that it is not merely revelation of a religious idea, or conviction that there is a God, or even some communication with God that is reducible to propositions (like the Ten Commandments) that will be most significant for changes to understanding. The account above suggests that the crucial factor will be a sense of purported second-person relatedness to God, as 'I' to 'you', that is expected to have the most far-reaching impact on a person's understanding of the world. But what is the evidence? Testimonies of such insights are not to be dismissed but are of limited value to those who do not share them, and it is not possible to discern changes in a person's dispositions directly. One can, however, follow the same approach that is taken in the discernment of ordinary virtues, namely extended experience of personal behaviour over time. How then do persons, individually or collectively, understand the world differently as a result of purported divine second-person understanding?

Such an examination would be a massive undertaking to conduct in detail, but by way of an indication of this change, consider the following passage from the Book of Job, chapter 38:

Where were you when I laid the foundations of the earth? Tell me, if you have understanding. Who determined its measurements? Surely you know! Or who stretched the line upon it? To what were its foundations fastened? Or who laid its cornerstone, when the morning stars sang together, and all the sons of God shouted for joy?⁴⁸

In this passage, God communicates with Job, but principally to underline how Job does not understand the cosmos. Moreover, there is a sense that Job, representing humanity, is cut off from understanding God's interactions with other beings, including the sons of God, the drops of dew (v. 28), the belt of Orion (v. 31), and young lions (v. 38), to whom God relates in a remarkably intimate way.

⁴⁷ ST 2-2.8.4; 2-2.8.2.

⁴⁸ Job 38:4-7. I have used the New King James translation.

Consider, by contrast, the following passage taken from one of the earliest Christian documents outside the New Testament. This text is the work of someone whose whole life revolves around the perception of a new covenant with God revealed in the Incarnation, a life in which human beings have themselves received the grace of adoption as children of God, with the gift of the Holy Spirit:

The heavens, revolving under his government, are subject to him in peace. Day and night run the course appointed by him, in no wise hindering each other. The sun and moon, with the companies of the stars, roll on in harmony according to his command, within their prescribed limits, and without any deviation. The fruitful earth, according to his will, brings forth food in abundance, at the proper seasons, for man and beast and all the living beings upon it, never hesitating, nor changing any of the ordinances which he has fixed.⁴⁹

What is striking in this second passage is the calm confidence of the writer, who perceives order and harmony from the largest to the smallest beings, under the authority of God who has become known. The contrast of these two texts is important because they represent a transformation in perceived second-person relatedness to God between a state in which human beings communicate with a remote God, who yet remains veiled, to one in which it is believed possible to see the face of God. With this transformation, the cosmos is not perceived as an accidental assemblage of events, or the operation of some vast, impersonal mechanism, or the work of an unknowable or only partly known divinity (or divinities). On the contrary, this second-person relatedness to God is accompanied by a new understanding of the cosmos as harmonious, law-like, and potentially knowable.⁵⁰ Whatever the veracity of the theological

⁴⁹ The translation is from James Donaldson and Alexander Roberts, eds., *The Apostolic Fathers with Justin Martyr and Irenaeus*, vol. I, Ante-Nicene Christian Library: Translations of the Writings of the Fathers down to A.D. 325 (Edinburgh: T&T Clark, 1867).

⁵⁰ There is some cultural evidence that the loss of a sense of such relatedness is accompanied by a degradation of a sense of order in the cosmos. John Wisdom's 'Parable of the Garden' (in 'Gods', *Proceedings of the Aristotelian Society*, New Series, 45 (1944), 185–206) can be taken as touching on this theme in a hypothetical way, insofar as two individuals see the same clearing as manifesting order or disorder respectively depending on their stance with respect to the existence of a gardener, but in a practical way one may discern this change in art. Consider, for example, the following six paintings in temporal sequence: Van Eyck, *Ghent Altarpiece* or *The Adoration of the Mystic Lamb* (1432); Joachim Patinir, *The Penitence of St Jerome* (c. 1518); Pieter Bruegel the Elder,

claims, one can plausibly attribute a new cultural confidence to this change of perspective, a confidence to uncover this cosmic order with an expectation of success.

IV. ESCAPING THE SNOW QUEEN'S PALACE

In this paper, I have argued that second-person relatedness, in the manner of 'I' to 'you', can catalyse a vast acceleration in the quality and number of insights. The communication of such insights depends on the initiative of the second person, but also on certain dispositions of the first person to receive them in the manner of a gift. In particular, there is a need for epistemic humility and a disposition to be moved by another in the manner of joint attention, a manner that takes the form of the beginning of love, the fruition of which is friendship. Within a theological framework, this second-person understanding is also an appropriate metaphor for how God imparts understanding to human persons. Indeed, according to Aquinas, this mode of special divine action can be read as the usual way in which God extends human knowledge in the life of grace, not principally by infusing new facts, but by new understanding.

This analysis might seem esoteric, but the key ideas are illustrated by a remarkably simple but powerful children's story. In *The Snow Queen*, by Hans Christian Andersen, a little boy named Kai has caught evil splinters in his eyes and his heart, the presence of which renders goodness and beauty invisible to him and makes his heart cold. Kai can admire almost nothing any more except the geometric beauty of snowflakes, each of

The Harvesters (1565); Constable, The Hay Wain (1821); Van Gogh, Wheatfield with Crows (1890) and Pollock, Enchanted Forest (1947). Van Eyck's work is perhaps the most theologically perfect symbolic painting of the kingdom of heaven that art has attempted, and what is striking is how the focus on the perfection of the divine life of grace, centred on the divine liturgy, is accompanied by the perfection of nature as the backdrop. In the transition from Van Eyck to Patinir's work, however, there is a diminishment of the life of grace in comparison to the life of nature alone, a theme that is then dominant in the landscape painting of Constable. Then, however, the sense of the perception of nature as an ordered whole seems to break down in the final work of Van Gogh, in which the road goes nowhere, the vertical dimension shrinks, and the creatures in the image become indistinct. Finally, in the work of Pollock, there are no discernable features left. Without making a judgment about the comparative artistic value of these works, what is striking is the way in which the loss of second-person relatedness to God is accompanied ultimately by the most radical transformation in the depiction of nature from harmonious beauty to complete disorder.

which, he claims, is quite perfect and 'much nicer than real flowers'.⁵¹ He soon meets the Snow Queen, whose kiss is colder than ice and who causes him to forget his childhood friend Gerda, his grandmother, and his home. Kai boasts to the Snow Queen how:

 \dots he knew his multiplication tables, could figure in fractions, and knew the area in square miles of every country in Europe, and what its population was.⁵²

In other words, Kai boasts of his mastery of rationalistic and especially quantitative knowledge. As Kai is making this boast, however, the Snow Queen carries him away to her empty, vast and cold palace, at the centre of which is a frozen lake that the Snow Queen describes as the 'mirror of reason'. She declares that this is the finest and only mirror in the world. Little Kai, whose heart has almost turned into a lump of ice, sits on the lake arranging and rearranging pieces of ice into patterns, calling this the 'Game of Reason'. He is trying to put together the pieces of ice into a word ('Eternity') that he cannot remember. Only when the little girl, Gerda, finally makes her way into the palace, shedding tears over him, does Kai's heart melt and the impediment of his sight is removed.

The warmth penetrated to his heart and melted both the ice and the glass splinter in it. He looked at her and she sang the psalm they had once sung together ... Kai burst into tears and wept so much that the grains of glass in his eyes were washed away. Now he remembered her and shouted joyfully, 'Gerda! Sweet Gerda, where have you been so long? And where have I been?' ... It was so blessed, so happy a moment that even the pieces of ice felt it and started to dance; and when they grew tired they lay down and formed exactly that word for which the Snow Queen had promised Kai the whole world and a new pair of skates ... ⁵³

With this recognition of Gerda and the formation of the word 'Eternity', Kai is free to walk out of the palace. Finally, they return to Kai's grandmother in the warm sunshine, who is reading from her Bible, 'Whoever shall not receive the Kingdom of Heaven as a little child shall not enter therein.'⁵⁴

⁵¹ H. C. (Hans Christian) Andersen, *The Complete Fairy Tales and Stories*, trans. by Erik Christian Haugaard (London: Victor Gollancz, 1974), p. 238.

⁵² Andersen, p. 240.

⁵³ Andersen, p. 260.

⁵⁴ Andersen, p. 262. The Scripture is from Mark 10:15 or Luke 18:17, with a close parallel in Matthew 18:3.

Whatever other interpretations can be given, this story of the Snow Queen is a remarkable parable of the inhibition of insight examined previously. Kai has become trapped in an ice cold, rationalistic representation of the world ('the mirror of reason'), trying to manipulate fragments of this representation into a pattern that will transcend these limitations. In this state, he is focusing so hard on trying to solve the puzzle that he sees little else besides these fragments. Hence although Kai thinks he is being clever, he is cut off from other people and closed to new insights. This state is epistemic pride, with the cold symbolising the isolation and hardening of the heart that is concomitant with pride. Only when Gerda's tears melt his heart is he able to see her, and share understanding with her, upon which the puzzle solves itself. In other words, those whose hearts are no longer cold can be moved by another in the manner of joint attention or second-person relatedness. With this relatedness, the form of which is love, the concomitant epistemic humility enables Kai to receive insights that would otherwise be closed to him. With this new understanding, he walks free from the Snow Queen's palace.

What are the practical consequences? The notion that contemporary intellectual life and culture are suffering from a comparative paucity of new insights has been the concern of some influential studies in recent years. 55 What the present paper underlines is that new insights are not going to arise simply by more carefully honed analyses within existing intellectual frameworks. Such attempts resemble those of the boy Kai, trapped in the Snow Queen's palace and endlessly re-arranging blocks of ice. Instead, given the central role of second-person relatedness to the communication of insights, one can at least try to arrange conditions that are conducive to accepting new insights in the manner of a gift from others. A straightforward practical step can be to get out more, to mix with colleagues in radically different fields, and to listen respectfully and learn from those with different perspectives and expertise. 56 Amid the deadly earnestness of the modern academy, there is a great need

⁵⁵ See, for example, Lee Smolin, *The Trouble with Physics: The Rise of String Theory, The Fall of a Science, and What Comes Next* (New York: Houghton Mifflin Harcourt, 2006). See also McGilchrist.

⁵⁶ Cf. Alex Pentland, *Social Physics: How Social Networks Can Make Us Smarter*, Reissue edition (New York, NY: Penguin Books, 2015), pp. 26–27, 'The most consistently creative and insightful people are explorers. They spend an enormous amount of time seeking out new people and different ideas, without necessarily trying very hard to find

to re-discover the value of intellectual play, especially in dialogue with others, to break the ice of frozen representations that forms so quickly over one's cognition of the world. A theological perspective also suggests the following counterintuitive course of action. If there is a God who desires to communicate understanding with us, then such insights are going to arise principally in the context of practices that foster an 'I' – 'you' relationship with God. In other words, one needs to pray.⁵⁷

BIBLIOGRAPHY

- Andersen, H. C. (Hans Christian), *The Complete Fairy Tales and Stories*, trans. by Erik Christian Haugaard (London: Victor Gollancz, 1974)
- Auble, Pamela M., Jeffery J. Franks, and Salvatore A. Soraci, 'Effort toward Comprehension: Elaboration or "aha"?', *Memory & Cognition*, 7 (1979), 426–34
- Baron-Cohen, Simon, 'The Extreme Male Brain Theory of Autism', *Trends in Cognitive Sciences*, 6 (2002), 248–54
- Bennett, M. R., and P. M. S. Hacker, *Philosophical Foundations of Neuroscience* (Malden, MA; Oxford: Blackwell, 2003)
- Bowden, Edward M., and Mark Jung-Beeman, 'Aha! Insight Experience Correlates with Solution Activation in the Right Hemisphere', *Psychonomic Bulletin & Review*, 10 (2003), 730–37
- Bowen, Zack, 'Joyce and the Epiphany Concept: A New Approach', *Journal of Modern Literature*, 9 (1981), 103–14
- Bühler, Karl, *The Mental Development of the Child, a Summary of Modern Psychological Theory*, trans. by O. A. Oeser, International Library of Psychology, Philosophy, and Scientific Method (London: Kegan Paul, Trench, Trübner, 1930)
- Eilan, Naomi, Christoph Hoerl, Teresa McCormack, and Johannes Roessler, eds., *Joint Attention: Communication and Other Minds: Issues in Philosophy and Psychology* (Oxford: Clarendon Press, 2005)
- Feyerabend, Paul, *Against Method*, Updated ed. / new introduction by Ian Hacking (London: Verso, 2010)

the "best" people or the "best" ideas. Instead, they seek out people with *different* views and *different* ideas.'

⁵⁷ I am grateful to the Analytic Theology project at the University of Innsbruck, as well as the intellectual humility project led by Daniel Jayes O'Brien at Oxford Brookes University, both sponsored by the John Templeton Foundation, for the opportunity to present and receive feedback for some of the ideas presented in this paper.

- Frith, Uta, and Francesca Happé, 'Autism: Beyond "theory of Mind", *Cognition*, 50 (1994), 115–32
- Gazzaniga, Michael S., *The Integrated Mind* (New York; London: Plenum, 1978) Grandin, Temple, *Thinking in Pictures: And Other Reports from My Life with Autism*, 2nd ed. (London: Bloomsbury, 2006)
- Happé, Francesca, and Uta Frith, 'The Weak Coherence Account: Detail-Focused Cognitive Style in Autism Spectrum Disorders', *Journal of Autism* and Developmental Disorders, 36 (2006), 5–25
- Hume, David, *An Enquiry Concerning Human Understanding*, Oxford World's Classics (Oxford: Oxford University Press, 2007)
- Kanner, Leo, 'Autistic Disturbances of Affective Contact', *Nerv. Child*, 2 (1943), 217–50
- Klein, Gary, Everything That Follows Is Different: The Disruptive Power of Insight (New York: PublicAffairs, U.S., 2013)
- Kounios, John, Jessica I. Fleck, Deborah L. Green, Lisa Payne, Jennifer L. Stevenson, Edward M. Bowden, and others, 'The Origins of Insight in Resting-State Brain Activity', *Neuropsychologia*, 46 (2008), 281–91
- Kuhn, Thomas S., *The Structure of Scientific Revolutions* (Chicago; London: University of Chicago Press, 1962)
- Lewis, C. S. (Clive Staples), *That Hideous Strength: A Modern Fairy-Tale for Grown-Ups* (London: Bodley Head, 1945)
- Lonergan, Bernard J. F., *Insight: A Study of Human Understanding*, ed. by Frederick E. Crowe and Robert M. Doran, The Collected Works of Bernard Lonergan, 5th edition, revised and augmented (Toronto: Published by University of Toronto Press for Lonergan Research Institute of Regis College, 1988), iii
- McGilchrist, Iain, *The Master and His Emissary: The Divided Brain and the Making of the Western World* (New Haven; London: Yale University Press, 2009)
- Norbury, Courtenay Frazier, Helen Griffiths, and Kate Nation, 'Sound before Meaning: Word Learning in Autistic Disorders', *Neuropsychologia*, 48 (2010), 4012–19
- Nusbaum, John T., 'Language and Communication', in *The Oxford Handbook of Social Neuroscience*, ed. by Jean Decety and John T. Cacioppo, 1st edn (Oxford University Press, USA, 2011), pp. 668–79
- Panksepp, Jaak, 'At the Interface of the Affective, Behavioral, and Cognitive Neurosciences: Decoding the Emotional Feelings of the Brain', *Brain and Cognition*, Affective Neuroscience, 52 (2003), 4–14
- Park, Clara Claiborne, The Siege: The First Eight Years of an Autistic Child (With an Epilogue, Fifteen Years After) (Boston, London: Little, Brown and Company, 1982)

- Pasnau, Robert, 'Divine Illumination', in *The Stanford Encyclopedia of Philosophy*, ed. by Edward N. Zalta, Spring 2015, available at: http://plato.stanford.edu/archives/spr2015/entries/illumination/ [accessed 21 May 2015]
- Pentland, Alex, Social Physics: How Social Networks Can Make Us Smarter, Reissue edition (New York, NY: Penguin Books, 2015)
- Pinsent, Andrew, 'Humility', in *Being Good: Christian Virtues for Everyday Life*, ed. by Michael W. Austin and Douglas Geivett (Eerdmans, 2012), pp. 242-264
- Pinsent, Andrew, *The Second-Person Perspective in Aquinas's Ethics: Virtues and Gifts* (New York; Abingdon, UK: Routledge, 2012)
- Qian, Ning, and Richard M. Lipkin, 'A Learning-Style Theory for Understanding Autistic Behaviors', *Frontiers in Human Neuroscience*, 5 (2011), 5:77 (2011). doi: 10.3389/fnhum.2011.00077
- Robison, John Elder, Be Different: Adventures of a Free-Range Aspergian with Practical Advice for Aspergians, Misfits, Families & Teachers (New York: Crown Archetype, 2011)
- Rocke, Alan J., *Image and Reality: Kekulé, Kopp, and the Scientific Imagination*, Synthesis (Chicago, Il; London: University of Chicago Press, 2010)
- Sandkühler, Simone, and Joydeep Bhattacharya, 'Deconstructing Insight: EEG Correlates of Insightful Problem Solving', *PLoS ONE*, 3 (2008), e1459
- Sears, Lonnie L., Peter R. Finn, and Joseph E. Steinmetz, 'Abnormal Classical Eye-Blink Conditioning in Autism', *Journal of Autism and Developmental Disorders*, 24 (1994), 737–51
- Shanker, Stuart, Wittgenstein's Remarks on the Foundations of AI (London: Routledge, 1998)
- Silverman, Eric J., *The Prudence of Love: How Possessing the Virtue of Love Benefits the Lover* (Lanham, MD: Lexington Books, 2010)
- Smolin, Lee, *The Trouble with Physics: The Rise of String Theory, The Fall of a Science, and What Comes Next* (New York: Houghton Mifflin Harcourt, 2006)
- Stump, Eleonore, 'The Non-Aristotelian Character of Aquinas's Ethics: Aquinas on the Passions', *Faith and Philosophy*, 28 (2011), 29–43
- Topolinski, Sascha, and Rolf Reber, 'Gaining Insight Into the "Aha" Experience', *Current Directions in Psychological Science*, 19 (2010), 402–5
- 'Under'stand, v', OED Online (Oxford University Press), available at: http://www.oed.com/view/Entry/212085> [accessed 21 May 2015]
- Wisdom, John, 'Gods', *Proceedings of the Aristotelian Society*, New Series, 45 (1944), 185–206
- Wittgenstein, Ludwig, *Philosophical Investigations*, trans. by G. E. M. Anscombe (New York: Macmillan, 1953)

ATHEISM AND AGATHEISM IN THE GLOBAL ETHICAL DISCOURSE: REPLY TO MILLICAN AND THORNHILL-MILLER

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Abstract. Peter Millican and Branden Thornhill-Miller have recently argued that contradictions between different religious belief systems, in conjunction with the host of defeaters based on empirical research concerning alleged sources of evidence for 'perceived supernatural agency', render all 'first-order', that is actual, religious traditions positively irrational, and a source of discord on a global scale. However, since the authors recognise that the 'secularisation thesis' appears to be incorrect, and that empirical research provides evidence that religious belief also has beneficial individual and social effects, they put forward a hypothesis of a 'second-order religious belief', with Universalist overtones and thus free of intergroup conflict, and free of irrationality, since supported (solely) by the Fine-Tuning Argument. While granting most of their arguments based on empirical research and embracing the new paradigm of the atheism/religion debate implicit in their paper, I contend that Millican's and Thornhill-Miller's proposal is unlikely to appeal to religious believers, because it misconstrues the nature and grounds of religious belief. I suggest that their hypothesis may be refined by taking into account a view of axiologically grounded religious belief that I refer to as 'agatheism', since it identifies God or the Ultimate Reality with the ultimate *good* (to agathon). I submit that agatheistic religious belief which is explicitly or implicitly presupposed in the first-order religious traditions as their doxastic core can be shown to be rational, and allows us to frame the relations between fundamental beliefs of adherents of various religions and worldviews in a non-conflictual way, conducive of their constructive participation in the global ethical discourse.

For science can only ascertain what is, but not what should be, and outside of its domain value judgments of all kinds remain necessary. Religion, on the other hand, deals only with evaluations of human thought and action [...] If one conceives of religion and science according to these definitions then a conflict between them appears impossible. (Albert Einstein)¹

¹ Albert Einstein, "Science and Religion", in *Out of My Later Years* (New York: Philosophical Library/Open Road, 2011 (first published in 1950)), pp. 37-38.

Darwin didn't preach Darwinism. His theory does not dictate any specific form of behaviour. Nature is not interested in individuals. It has no moral content at all. But to be a human being is to have certain moral ideals, in which case we must resist certain natural processes in a way that lions and tigers can't. And therefore what can be called ideology can be made independent of scientific findings. Goals are not provided by science. (Isaiah Berlin)²

I. SEARCHING FOR A NEW PARADIGM OF THE ATHEISM/RELIGION DEBATE

In this time, when the tide of us-versus-them mentality is once again on the rise across the globe, it is refreshing to come across a careful study of the epistemology of religious belief marked by intellectual empathy and the spirit of dialogue.3 Co-authored by Peter Millican, an analytic philosopher and a leading Hume scholar, representing "a sceptical and naturalistic attitude to religion", and by his Oxford colleague, Branden Thornhill-Miller, a psychologist "sympathetic to religious claims and informed by contemporary empirical research", the work is itself "a product of a dialogue between two contrasting points of view", conducted with the aim to "encourage more progress in interreligious dialogue and in the naturalism/ supernaturalism debate" (p. 2). While not being in full agreement as to whether and how "to accommodate our natural religious tendencies within our intellectual lives", both authors agree that "there is plenty of scope for reasonable debate here, and the verdict is less clear cut than is commonly supposed by enthusiasts on either side" (p. 5). As such the discussion provides a new model of how philosophy of religion may be practiced, and is an anti-thesis of the usual highly-charged polemics between 'new atheists' and 'full-time apologists', shooting at each other in the preaching-to-thechoir manner and with predictable results.

True to the spirit of their own call to dialogue and constructive debate, while outlining "some of the possibilities and rational limits of supernatural religious belief" and concluding that "the contradictions between different religious belief systems, in conjunction with new understandings of the cognitive forces that shape their common features, persuasively challenge

² Isaiah Berlin in a 1974 BBC interview with John Merson; cf. The Isaiah Berlin Virtual Library: http://berlin.wolf.ox.ac.uk/lists/interviews/> [accessed 1/10/2015].

³ Branden Thornhill-Miller and Peter Millican, "The Common-Core/Diversity Dilemma: Revisions of Humean Thought, New Empirical Research, and the Limits of Rational Religious Belief", *European Journal for Philosophy of Religion*, Vol. 7, no. 1 (2015), 1-49. Subsequent references to this work are included parenthetically in text.

the rationality of most kinds of supernatural belief" (p. 1),4 the authors bother to put themselves in the shoes of the traditional religious believers in order to articulate what might be the epistemically best option available to those who find themselves unable "to 'bite the bullet' of cool, parsimonious reason and learn to live with a godless world" (p. 46). The outcome of this exercise in intellectual empathy is a hypothetical religious stance which Thornhill-Miller and Millican call 'second-order religion' or 'second-order supernaturalism, leaving the term 'first-order religion' to designate the actual historical religions. The second-order religion is supposed to be a kind of 'thin' theism or deism (perhaps too thin, as I will argue, to deserve to be called 'religion') supported solely by the Fine-Tuning Argument for the existence of God which builds on the recent "apparent discovery of certain 'anthropic coincidences' in the laws of physics" (p. 4), without which the existence of life in general, and of creatures like humans in particular, would be impossible. No other theistic argument deserves, in their opinion, such credit,⁵ and in the face of numerous defeaters grounded in "empirical research concerning intercessory prayer, religious experience, near-death experience, and various cognitive biases, such as agency detection, theory of mind, egocentric and confirmation bias", in addition to the aforementioned "mutual contradictions of first-order supernaturalism" (p. 1), no first-order religion can be supported by a rational argument, and therefore - as is implied throughout the paper - commitment to the truth-claims of some particular religious tradition is positively irrational.⁶

At this stage a reader might ask herself, how does this line of argument differ from other all-out philosophical criticisms of religious belief? Arguably there are at least two aspects to Thornhill-Miller's and Millican's approach to the subject matter which deserve attention as containing the germs of two interesting projects that might contribute to rejuvenation of the philosophical atheism/religion debate, potentially turning it into something more meaningful and fruitful than it usually is. Firstly, Thornhill-Miller and Millican explore not just the question of "the rational limits" of religious belief, but also of the "possibilities" of rational religious

⁴ In all cases, including in quotations, when emphasis is added by the use of italics, the italics are mine, unless specified otherwise.

⁵ Cf. footnote 143 on p. 47.

⁶ The position adopted by the authors of the paper regarding the rationality of commitment to particular religious creeds makes it clear that the declaration about Branden Thornhill-Miller's "sympathetic attitude" towards religious claims is not meant to imply that he is a classical theist, but rather someone attuned to religious Universalism, in which case his own religious views may be consistent with the epistemology of religious belief advocated in this paper.

belief, and their attempt at delineating the sphere of what they consider to be a clearly irrational epistemic stance, from the sphere where "it is not obviously unreasonable" (p. 47) to be religiously committed, is clearly genuine. Their restrictive approach to the justificatory grounds of religious belief may disappoint some defenders of the rationality of religious belief, but the vision of advocates of various metaphysical outlooks engaging in intellectually honest and genuinely philosophical – rather than merely rhetorical – debate, involving readiness to admit that there are objective limits to the strengths of the arguments supporting *one's own* position, may provide a model of a constructive atheism/religion debate.

There is, however, a second reason to look upon Thornhill-Miller's and Millican's project as innovative. It appears that the main rationale behind their going to such lengths to formulate their hypothesis of second-order religion, although none of the authors fully identifies with the metaphysical stance it entails, is that they find it less "dogmatic" and more "tolerant" than the first-order religions, "offering a more cooperation- and humility-enhancing understanding of religious diversity in a tense and precarious globalised age" (pp. 1-2). This explicit concern with the far-reaching existential consequences of fundamental beliefs, and the awareness how much may be at stake in the dialogue between adherents of various worldviews and religions, as well as the appeal to intellectual humility, make one think that here at last is a publication that might open a new chapter in the philosophical debate about doxastic pluralism, that is not primarily apologetic in nature, but focused on the relevance of pluralism for the global ethical discourse about the challenges facing humanity in the global age.

It is this latter, more universal concern about the possible contribution of the philosophy of religion to the global ethical discourse about the conditions of peaceful and solidary coexistence of people representing various metaphysical viewpoints, that prompts me to write this 'reply'. Consequently, this paper is conceived as a critical but ultimately constructive reflection on how Thornhill-Miller's and Millican's hypothesis might be refined to be made relevant in a way they themselves might wish it to be, since arguably in its initial formulation it is unlikely to appeal to broader spectrum of adherents of the first-order religions. Accordingly, in addition to pointing out to what I consider weak spots of Thornhill-Miller's and Millican's project, I will outline an alternative epistemological option of conceiving the nature and grounds of religious belief in a way that would accommodate their twin concern about the rationality of religious belief – especially vis-à-vis religious diversity, empirical psychological research concerning religious experience, and the non-availability of conclusive

evidence of 'perceived supernatural agency' – and with the challenge of religious diversity, while being a great deal less revisionist than their second-order religion and showing that abandoning fundamental beliefs that are central to one's first-order religious tradition is not a prerequisite of holding a rational religious belief under the condition of religious pluralism.

This, as I will argue, can be achieved by attending to an axiologically grounded religious belief that I refer to as 'agatheism' or 'religion of the *good'* ('to agathon' in Greek), since it identifies the Ultimate Reality religiously conceived with the ultimate good which is postulated as a transcendental condition of our axiological consciousness through which we perceive and evaluate the goods at which our actions are aimed and towards which our hopes are directed.⁷ Agatheism conceives the Absolute as *Agatheos*⁸ by attributing to it first and foremost the characteristic of perfect goodness

⁷ Speaking about the 'ultimate good' being postulated as a transcendental condition of our axiological consciousness I do not wish to imply that the epistemology of religious belief which I presuppose is identical with that of Kant, and that agatheism rests on the Kantian postulates of practical reason. Agatheism does not presuppose Kantian transcendental idealism, as it is supposed to be compatible with variety of metaphysical outlooks. More importantly, speaking about agatheism being grounded in axiology, I do not imply that it is Kant's 'moral argument' that provides the rational ground for agatheism. Unlike Kant, I do not presuppose that we need to postulate God's existence in order to make sense of morality. On the contrary, I assume that there are a number of satisfactory ways to make sense of our moral obligations towards other sentient beings, without recourse to God. Agatheism answers a different set of questions than questions about the foundation of morality, namely questions about the ultimate meaning of our finite existence as perceived through the lenses of our axiological consciousness which directs our thoughts and hopes towards some ultimate good which does not seem to be realisable in the physical universe. Thus the fundamental intuition behind agatheism has more in common with Plato, than with Kant. For this reason, in this paper I avoid the use of terms like 'moral' and 'ethical', because the term 'agathological' - which is a subterm of 'axiological' - points more accurately in the direction of the concerns from which agatheistic religious belief arises, and diverts attention from misleading associations with the Kantian 'moral argument' for the existence of God.

⁸ The adjective 'agathos' is used to refer to God in the synoptic gospels in what may be considered to be a significant context. Encountering a 'rich man' who kneels before him and asks: "Good Teacher, what must I do to inherit eternal life?", Jesus objects to being called good, explaining that "No one is good but God alone" (oudeis agathos ei me heis ho theos) – in Mark 10:18 and Luke 18:19 the wording is identical. Also, the ancient Greeks used the phrase 'agathos theos' to refer to divinity. In one noteworthy example, in the second book of the Republic, when addressing the question whether it is appropriate to ascribe to god or gods responsibility for evil in the world, Plato argues that "god is, of course, good in reality and should be spoken of as such" (agathos ho ge theos toi onti te kai lekteon houtos – 379a9-b1), and that being good, god is unable to do harm or to be the cause of evil.

(but not necessarily all the other attributes of God of the Western classical theism, since 'agatheism' it is a 'thinner' concept than 'theism', capturing the agathological core of a broad range of religious concepts of the Absolute). Most importantly, agatheism ascribes to the Ultimate Reality⁹ the function of being the ultimate ground and ultimate end (telos) of all that is good, thus making sense of the teleological and value-laden nature of our selfconsciousness, of our thinking about our existence as of self-conscious, rational and free persons whose actions are explained by reference to value-laden reasons, not merely to efficient physical causes. Thus agatheistic religious belief is grounded primarily in the considerations of the 'facts' about our own value-laden self-consciousness, and only secondarily in the considerations of the facts about the physical universe. As such, it locates itself in the proximity of the line of thinking about the Absolute represented by Plato, Augustine, Kant and Newman, but some of its distinctive features are shaped by the new awareness of the significance of pluralism of religious beliefs and value systems as a major challenge to a peaceful and solidary human coexistence in the global age.

Arguably, agatheistic religious belief so conceived is explicitly or implicitly presupposed in most first-order religious traditions as their doxastic core. As I will argue, such belief can be shown to be at least "not obviously unreasonable", while it can in turn ground other, more specific, beliefs of a given religious tradition, making its belief system – if internally coherent – rationally grounded. The fact of diversity of religious belief systems will be explained by postulating that religion is a space of the exercise of *agathological imagination*, i.e., this dimension of the faculty of practical reason which is intentionally directed towards the ultimate good (of no choice of ours) and guides our mental activity leading to value judgments by imagining and comparing alternatives as more or less optimal, relative to our sense of the good as a transcendental limetic concept). Various religious belief systems

⁹ Throughout the paper, I will treat the terms 'the Ultimate Reality' and 'the Absolute' as synonyms capturing in the most inclusive way the meaning of the Divine or highest reality that is the central focus of all religious traditions. Although the term 'God', reserved to capture the theistic conceptions of the Absolute, will also be used frequently, it is important to bear in mind that the conclusions of this paper are meant to be applicable as broadly as possible, to include all major religious traditions.

¹⁰ I take the concept of the 'good' to be a transcendental concept in the Kantian sense as a form of our thought prior to experience of things which we perceive as having a property of goodness, and thus a concept that is primarily related to rational subject of perception, rather than intrinsically related to being. Following G. E. Moore, as well as the Medieval theorists of transcendentals, I take it to be a primitive, simple, first-known, and self-evident concept that cannot be analysed by taking recourse to a still higher genus.

are thus taken to be the expressions of various visions of what their adherents consider to be the optimal ways of conceiving human potentialities vis-à-vis the Ultimate Reality as the ultimate good towards which their existence is directed. To put it differently, on an agatheistic account of religion, various religious belief systems are products of human agathological imagination, which guided by the fundamental religious belief identifying the Absolute with the ultimate good, searches for the optimal conceptualisation of the nature of the Absolute and its relation to the world and humanity, attempting to approximate the human view of the matter to the 'God's eye view'. As such, agathological imagination, as an imaginative dimension of reason, when active in the realm of religious belief, follows the logic of perfect being philosophy, especially the principle Deus semper melior - 'God is always better' [than we can imagine], imagining what kind of God or the Ultimate Reality would be greater, in the sense of 'more good', and what kind of relation between such God and the world would be consistent with the nature of God so conceived. What can make such a mode of deliberation something more than a purely fideistic exercise in utopian thinking, is linking it to the question of the teleological character of our axiological consciousness that is always directed towards some 'good', towards 'what ought to be', towards something that always transcends the facts about the physical universe ('what is'), and therefore cannot be explained by these facts alone, because it is not possible to derive values solely from the facts about the physical universe. Thus in order to make sense of the value-laden way we perceive reality as the world-for-us, and to give our existence some ultimate meaning, it may be necessary to postulate there being some ultimate good which is the ultimate source and the ultimate end of all that is good, and explains the teleological good-orientedness of our consciousness.

Needless to say, there will be various non-religious ways to conceive such 'ultimate good', thus making sense of our axiological consciousness without postulating the existence of the Ultimate Reality religiously understood (perhaps along the lines of non-religious Platonism that is presupposed

At the same time I take the concept of the 'ultimate good' to be a 'limetic concept' (from Latin *limes* - limit, frontier) by metaphorising the concept of a *limes* of a mathematical function as indicating a point towards which something tends in an asymptotic manner without ever reaching it. The concept of 'God' as 'Agatheos' is also a limetic concept. I stipulate that both in the case of the concept of the 'ultimate good' and the concept of 'Agatheos', the user of the concept presupposes that the reality to which the concept refers is only pointed to as the ultimate horizon that is of its nature unreachable for a human subject, although present as the background against which we perceive values that make their claim on us and are yet to be realised, as horizon is always 'present' when we perceive distant points on a trail that are yet to be reached.

by some theoretical positions in the philosophy of mathematics, as well as in moral philosophy). Moreover, there is always a possibility of affirming the impossibility of 'making sense' of our value-laden perception of reality, opting, for example, for absurdism à la Camus. No doubt, various options may be articulated in an internally coherent way, and may be shown to be coherent with the facts about the physical universe established by science. The choice of an option how to make sense of our axiological consciousness will amount to a choice of a worldview. But since none of these options can be established conclusively as rationally superior, and yet considering various options in matters of such importance and taking a stance may be a psychological necessity, as well as a condition of living an 'examined life', choosing a religious option that identifies the ultimate good with the Absolute religiously conceived, may be as rational a choice as any. In any case agathological imagination will play a decisive role in choosing among the options, as well as among various religious conceptions of Agatheos as the source of ultimate meaning of human existence. Thus what we are left with is a range of 'agathological landscapes', conceived throughout human history by geniuses of agathological imagination, from philosophers and religious thinkers to poets and composers - agathological landscapes which we assess and choose between not for their aesthetic qualities, but for their goodness, goodness-for-us (agatheia).

In this paper I will argue that to the extent to which various first-order religious traditions have as its core agatheistic belief conceived in the way just outlined, they are in no way bound to be a breeding ground for irrationality or intergroup conflict. For this reason, agatheism may serve as a functional equivalent of Thornhill-Miller's and Millican's second-order religion, retaining its advantages, while avoiding its controversial aspects which may limit its appeal to adherents of first-order religious traditions. Unlike second-order religion, agatheism possesses conceptual resources to address the existential concerns that motivate and explain religious commitment – concerns pertaining to the realm of subjects, not of objects, the realm of the first-person, not the third-person perspective, the realm of 'sense-making' and 'understanding' by reference to reasons and goals, not of proof and scientific explanation by reference to efficient causes. Moreover, agatheism does not depend on the evidence of 'perceived supernatural agency', neither is it based solely or chiefly on the Fine-Tuning Argument (although teleology is central to its logic), therefore its rationality is not conditional on the results of the empirical research of physicists or neuroscientists. For this reason, agatheistic belief, unlike Thornhill-Miller's and Millican's second-order belief, can be unconditional, rather than provisional, which in

the case of a religious belief may turn out to be a psychological impossibility, since religious belief may require unconditional commitment.

Agatheism is grounded primarily in axiology, in the realm of values, not in the realm of facts about the physical universe, and therefore it cannot be conclusively confirmed or disconfirmed by scientific findings. Needless to say, in order to uphold its claim to rationality, religious belief as any belief worthy of respect has to be aligned with a worldview that is consistent with undisputed scientific findings, hence the importance of the philosophical work at the science/religion nexus, which, however, may only demonstrate the coherence of a religious worldview, not its veridicality, since of its nature no comprehensive worldview – whether religious or naturalistic – can be conclusively demonstrated to be true.

It is precisely this consideration, that religious belief grows out, as it were, of the ground of human values, of human concerns with 'what ought to be' or 'what might be', rather than solely with 'what is', which may provide a bridge between adherents of various worldviews, including atheists and theists, situating them epistemically on par. They are on par with regard to the rationality of their worldviews to the extent all worldviews contain a central component that has an axiological and teleological nature, and as such gives rise to questions regarding subjectively relevant meaning and conduct of human life which cannot be settled by natural science. However, such questions also cannot be left unanswered by adopting rigorously rational and consequently sceptical or agnostic attitude. As David Hume has conceded, to go on with our lives, and to make sense of our lives, we may have no option but to accept that the paradigm of objective rationality presupposed in formal sciences and natural sciences is not a universally applicable guide to human thought and conduct, and that in the sphere of practical rationality we are bound at least to some degree to rely on our natural instincts and imagination. As Thornhill-Miller and Millican point out, Hume referred to such grounds of our beliefs and actions as "irrational" (p. 5), but he might have been wrong on this point, considering what contemporary proponents of externalist theories of knowledge and cognitive scientists have to say about the functioning of our cognitive faculties and about the degree to which our cognitive processes remain unconscious.11 It may turn out that what Hume refers to as 'instinct' or

¹¹ This is not to say that Hume was not a farseeing thinker who more than anybody before him was aware to what degree the functioning of our cognitive faculties is nontransparent to reason. What he seemed to fail to realise was – to borrow Kant's phraseology – that the denial of knowledge in some areas of human intellectual pursuit makes space not just for potential intrusion of irrationality, but also for 'rational faith'

'imagination', treating them as irrational, are in fact facets of the proper functioning of our complex cognitive faculties that ultimately aim at truth and thus are not irrational, despite the fact that we are not able to establish in an internalist fashion whether and to what degree the beliefs produced in such a way are warranted. Needless to say, we may need to admit that some such beliefs belong to the category of *doxa*, rather than *episteme*, to use Plato's distinction, accepting that *episteme* is just not available in the realm of thought that is existentially relevant.

This admission that in the existentially relevant areas of the exercise of human reason adherents of various worldviews are epistemically on par should facilitate constructive philosophical engagement of atheists and theists conducted in the spirit of intellectual humility and rational selfcriticism. While not being able to yield 'knowledge' in accordance with the methodological criterions appropriate for studying physical objects and exploring an objective point of view of a given matter, agathological intuition and agathological imagination as capacities of human reason may be considered respectable sources of inter-subjectively communicable and justifiable beliefs expressing a subjective point of view of the matter. As such, they may be conducive to contributing to the global 'ethical discourse' which – in the Habermasian sense of the term – focuses on the questions of the good life of individuals and groups cohabiting the same social space in the global age while having different life histories, traditions, and value systems, and being in need of finding a modus vivendi that would promote human flourishing of each and all individuals.

Presupposing such a 'dialogical' perspective, which Thornhill-Miller and Millican themselves encourage, I will grant them most of their empirically grounded arguments designed to challenge the evidential basis of the first-order religions, while pointing to the axiological basis of religious belief which helps to shift the atheism/religion debate to the terrain where the partners of the dialogue can see themselves as epistemically *on par*. Thus I will concur that the *kind* of evidence Thornhill-Miller and Millican are looking for in 'empirical research' and searching for proofs of 'perceived supernatural agency' may indeed be unavailable. But at the same time I will suggest that availability of evidence so understood is not presupposed by religious believers, because what is decisive from their subjective point of view is a kind of moral certainty, or – better to say – *agathological certainty*,

understood not in religious terms, but as a commitment to a principle of hope that teleology which characterises our axiological consciousness is a reliable guide for our sense-making activity without which human agency would be unintelligible, as already Plato has noticed.

which – unlike empirical certainty concerning our knowledge of the facts about the physical universe – is grounded (and hence *not* groundless) in the realm of values.

Like moral beliefs, religious beliefs are formed in connection with thinking about human good, and in this sphere nothing more than agathological certainty, plus coherence of one's worldview, may be expected and demanded. Agathological certainty as a state of mind has a certain phenomenal quality which is a source of subjective reassurance, and can be captured by the adjective 'agathonic', created by conjunction of 'agathon' and 'the tonic' - a musical term referring to the central tone of a scale that is perceived subjectively by a listener as the point of 'departure' and 'arrival' of a tonal musical narrative, and thus as a kind of telos and the point of psychological rest. Thus the word 'agathonic', metaphorising the musical 'tonic', takes on a meaning of 'rest of the mind in the good', or 'rest of the mind in the confidence of reaching the good, realising the good, or being directed towards the good.'12 Certainty specific to religious beliefs, like certainty specific to moral beliefs, may be perceived subjectively and shared inter-subjectively, but cannot be turned into an objective certainty, and therefore the search for such certainty – whether through the Fine-Tuning Argument or by reference to evidence of 'perceived supernatural agency' – is bound to be futile.

II. SECOND-ORDER RELIGION: DISPUTING THE NATURE AND GROUNDS OF RELIGIOUS BELIEF

As indicated in its title, Thornhill-Miller's and Millican's paper is above all devoted to outlining "the limits of rational religious belief", focusing on "perceived supernatural agency" as "the predominant *evidential* influence on religious belief" (p. 2). As the discussion about the unavailability of the appropriate evidence proceeds, it becomes clear that it will be necessary to raise the question of the *nature* of religious belief that depends on the nature of the subject matter of belief, keeping in mind what Aristotle has observed in his *Nicomachean Ethics*: "It is the mark of an educated man to look for precision in each class of things just so far as the nature of the

¹² This agathonic sense of 'rest of the mind in the good' that accompanies our mental states of certainty in the sphere of moral and agathological beliefs is analogical to the sense of 'rest of the mind in truth', which accompanies our states of certainty in the realm of beliefs about existentially irrelevant facts of the matter, but unlike in the case of certainty about factual beliefs and also aesthetic beliefs, certainty about moral and agathological beliefs carries with it a sense of fulfilled obligation and is specific to this category of beliefs.

subject admits; it is evidently equally foolish to accept probable reasoning from a mathematician and to demand from a rhetorician scientific proofs."¹³ In a similar fashion one may argue that it may turn out to be unreasonable to demand irrefutable proofs and conclusive evidence in the realm of religious belief.

2.1. Grounds of religious belief: A priori considerations

To begin with, one can argue *a priori* against the availability of proofs or conclusive arguments regarding God's existence, since the very concept of such proof or *conclusive* argument appears to be incoherent, as by definition God transcends human concepts, hence what *is* being grasped in human concepts which are applied to God cannot be God as God really is. Therefore theistic arguments may at most serve as 'pointers' (like the finger pointing at the moon in the oriental metaphor discussed by Thornhill-Miller and Millican, to which we will later return), or 'paths' (perhaps like Aquinas' *viae*) that may direct human thought *towards* God, without 'reaching' God, because the concept of God itself – involving such qualifications as 'perfect' or 'infinite' – stipulates that God as God really is, is out of reach of the human mind. Only Divine mind can grasp God, thus arguing for the existence of the referent of a human concept of God, one cannot *conclusively* establish the existence of God.

Even more obviously, *conclusive* public *empirical* evidence of Divine agency is impossible, because there is no way one could deduce from finite effects the existence of an infinite Divine cause, while the conclusive evidence of the agency of *finite* 'supernatural' agents, even if available, would be useless from a theistic point of view, because from the existence of finite agents – whatever their nature – one cannot deduce conclusively the existence of a theistic God. Thus the kinds of evidence that are discussed by Thornhill-Miller and Millican, such as "reported miracles, religious experiences, and other instances of perceived supernatural agency" (p. 2) are bound to constitute unsuccessful evidence, unless considered in connection with the pre-existing theistic belief, in which case it will be thought of as an 'evidence' in an entirely different sense, namely not as an evidence of God's existence or ability to act in the physical universe, but as a source of reassurance in a belief – e.g., in God's providential care – already firmly held by a believer on a different ground.¹⁴

¹³ The Complete Works of Aristotle: The Revised Oxford Translation, ed. by Jonathan Barnes, 2 vols. (Princeton, NJ: Princeton University Press, 1984), Book I, 1094.b24.

¹⁴ Since Thornhill-Miller and Millican devote much space to the discussion of the evidential value of reported miracles, it is important to keep in mind that extraordinary

Does it mean that the entire philosophical enterprise known under the heading of 'arguments for the existence of God' rests on a mistake, and atheists waste their time attempting to refute them? It certainly does seem so, if terms like 'proof' or 'conclusive argument' are used in this context, and are intended to mean something akin to how such terms are understood in 'hard sciences', where a proof or argument can be said to be conclusive when every person who is able to understand it will recognise it as such. However, it is likely that the pre-modern authors who - like Aquinas - are taken to be constructing arguments for the existence of God, do in fact seek to show coherence of the worldview of religious believers, that is to show that their religious beliefs do not contradict other well-established beliefs about the world and the place of humanity in it, which a reasonable person might be expected to hold. Such interpretation would be consistent with what seems to be implied in the phrase fides querens intellectum, which has been used by medieval philosophers to refer to this kind of employment of reason in the realm of religious thought. What we are having here is thus two very different kinds of reasoning about God: one which the critics of theistic arguments (and some of their apologetically inclined opponents) have in mind, and the other presupposed by the likes of Aquinas and employed implicitly by religious believers. The first one is a reasoning which starts with the facts about the world as explanandum and ends with God as explanans, without presupposing in the point of departure any particular concept of God. As I have just pointed out, such argument can never be successful, because the facts about the universe are always such that it will suffice to posit a *finite* cause to explain them, therefore what will be posited as explanans, will always be less than God.

The second way of understanding what 'theistic arguments' are really about is that they aim at showing how beliefs about God – whose concept is *presupposed*, not argued for – can cohere with beliefs about the world. When forming the concept of God or the Ultimate Reality as perfect, infinite, etc., humans could not have relied solely on the reasoning that is aimed at explaining facts about the universe, but instead they had to rely primarily on

events described in the ancient texts referred to as 'miracles' in modern times could *not* be conceived as playing the role of an epistemic evidence that Hume and Thornhill-Miller and Millican are disputing, because such events would be perceived against the background of an entirely different view of nature (with the existence of God or gods taken for granted, with no distinction between the 'natural' and 'supernatural' realm, and thus with the antecedent probability close to 1 that a miracle may happen), therefore it may be an anachronism to ascribe to the biblical authors or other ancient authors an intention of pointing to 'miracles' as *proving* or providing evidence for the existence of God or gods.

the reasoning aimed at explaining 'facts' about the way we think about the world and ourselves – as valuable, as bearer of values – and only secondarily on the reasoning aimed at explaining facts about the universe (secondarily, but necessarily, because without reference to the world we cannot form any concepts and think about anything, least about God). That this is what Aquinas is in fact doing in his Quinque Viae seems evident from the way he injects at the crucial stage of each 'journey' from the world to God, just before reaching the conclusion, a formula: "and this is what we call God", 15 thus referring to a set of beliefs about the nature of God that is tacitly *presupposed* and must have an independent ground, because nothing in the preceding steps of each of his 'arguments' grounds a full-blown concept of a theistic God. Perhaps, in order to avoid confusion, and not to tempt atheistic critics to waste their time on showing that the 'theistic arguments' are inconclusive, it might be helpful to reformulate them all, so that they would begin with Aquinas' formula: 'Since this is what we call God ...', then moving to the facts about the world and arguing that God so conceived *may* play the role of the Unmoved Mover, the First Cause, the Designer of the universe, etc., and concluding that therefore the facts about the world do not contradict the possibility of the existence of God so conceived. Indeed, they show that the belief in God so conceived has certain explanatory potential, which explains why the human mind has a tendency to 'travel' these 'five paths' from the world to God so conceived, although such 'journey' is possible only because the concept of God is there in the mind of the 'traveller' at the beginning of the 'journey'.

From the above discussion of the necessary inconclusiveness of theistic arguments and of the impossibility of successful empirical evidence of perceived Divine agency, there follows a number of consequences relevant to the assessment of Thornhill-Miller's and Millican's project. Firstly, in order not to be groundless and therefore irrational or non-rational in some fideistic fashion (which we do *not* advocate in this paper), religious belief has to have some ground, but neither theistic arguments, nor any public, empirical evidence one can think of, may ground a belief in God or the Ultimate Reality religiously conceived and involving qualifications such as 'perfect', 'infinite', etc.¹⁶

¹⁵ See Thomas Aquinas, *Summa Theologiae*, Fathers of the English Dominican Province, trans., ed., and corrected by faculty and staff of the Aquinas Institute (Lander, Wyo.: The Aquinas Institute, 2012), Part I, q. 2, art. 3.

¹⁶ The tradition of scepticism about human ability to ascribe theistic attributes to the Absolute on the basis of our knowledge of the facts about the physical universe (rather than our awareness of our fundamental orientation towards the good) has a line of prominent exponents, from Plato, through Augustine, up to John Henry Newman

Secondly, the Fine-Tuning Argument cannot provide sufficient justification for religious belief any more than any other theistic argument. Whatever the verdict of future physics may turn out to be regarding the apparent 'anthropic coincidences', the Fine-Tuning Argument cannot ground belief in a theistic God, because an atheist will always have an option of positing that something else than God, that is, something *less* than God, may serve as *explanans* of the observed order of the universe. The most such an argument may establish is a belief in *some* Designer of the order of the universe, but not the creator in the sense of the *ultimate* source of all being and value, a perfectly good and holy God worthy of worship, ¹⁷ who can serve as the ultimate anchor of human hope. ¹⁸

Therefore, thirdly, the only way to ground specifically theistic or agatheistic religious belief, a belief in God or the Ultimate Reality endowed with moral or – better to say – agathological attributes, ¹⁹ is by reasoning from human axiological consciousness to God as the ultimate good, towards which human axiological consciousness is ultimately directed.

However, fourthly, once a belief in God as the ultimate good is so grounded, there is a possibility of a 'justificatory descent', so that, for example, belief in God being the ultimate source of all that exists, or belief in God 'revealing' himself to (some) rational creatures, may now be grounded in the foundational belief in God being perfectly good and being the

who famously stated: "Were it not for this voice, speaking so clearly in my conscience and my heart, I should be an atheist, or a pantheist, or a polytheist when I looked into the world." (J. H. Newman, *Apologia Pro Vita Sua* (London: Longmans, Green, and Co., 1908), p. 241.)

¹⁷ Actually, the Demiurge of Plato's *Timaeus* that may serve as an example of such a postulated *explanans* of the order of the physical universe is considered to be a malevolent, rather than benevolent being. Similarly, Hindu cosmologies do not ascribe to the gods responsible for 'shaping' of the material world the attributes of the Ultimate Reality.

¹⁸ Interestingly, Thornhill-Miller and Millican are aware of this inability of the Fine-Tuning Argument to point towards *morally perfect* designer of the universe (cf. footnote 144 on p. 47), yet they stop short of recognising that this limitation is in fact fatal to their project, given that they identified it as the *only* rational basis of their second-order religion.

¹⁹ Speaking about 'moral' attributes of God may be problematic, given that the term 'moral' is usually associated with 'moral obligations', while attributing to God any 'obligations' which God would need to fulfil to be 'moral' may be incoherent. We usually apply the term 'moral' to God when speaking about God's attributes which are related to creatures, namely about the ways God may be good-for-us. Thus it seems that in this context the use of the term 'agathological' is preferable to 'moral', because the former does not carry with it the sense of 'moral obligation'.

ultimate good, which makes it reasonable to believe that God so conceived might be expected to be in such and such relation to the world and humanity. Thus the doxastic structure of an agatheistic religious belief system that is grounded in axiology can be metaphorically envisaged as a ladder, but with descending, not ascending order of justificatory dependence, and the ladder hangs, as it were, from the 'ceiling' of the belief in God being perfectly good and being the ultimate good. On this picture, religious beliefs of increasing particularity will draw their justification from the higher-level beliefs, being perceived as more or less rational against the background of antecedent probability of something being the case, given that we have accepted the higher-level belief as true. Thus we may speak about antecedent probability of Divine self-revelation or religious experience, relative to the higher-level belief in perfect goodness of God, which will play the role of the justificatory basis of particular beliefs grounded in one's religious experience or in one's encounter with what one considers to be a case of Divine revelation. The key point is that such beliefs without the basis in antecedent probability of the relevant higher-level beliefs could not be justified solely by reference to the experience that grounds it. Hence, particular religious experience may constitute a ground of beliefs formed on its basis, but both subjective certainty regarding the veridicality of the beliefs grounded in such experience and inter-subjective justification of such beliefs are dependent on the antecedent probability of the higher-level beliefs, and without holding these higher-level beliefs a religious experience could not be even recognised as such by the subject of the experience. What will be important to bear in mind accepting such a vision of the epistemology of religious belief, with the principle of justificatory descent as its centrepiece, is that if the entire agatheistic doxastic practice depends for its justification on the belief in God being perfectly good and being the ultimate good, then any religious belief that will stand in clear contradiction to these assumptions regarding the nature of God – and to any consequences that may be drawn from this foundational agatheistic belief – will rightly be considered as positively irrational.²⁰

²⁰ In this vein, I have argued elsewhere that a belief in 'Divine favouritism', whether it comes to an exclusivist view of the truth about the Ultimate Reality being available to adherents of only one religious tradition, or to an interventionist vision of God changing the natural course of events to assist some creatures more than others in their realisation of their creaturely potential, is inconsistent with the logic of perfect being philosophy that underlies the exercise of agathological imagination, and makes a religious belief system that includes such beliefs internally incoherent. (Cf. Janusz Salamon, "Theodicy of Justice as Fairness and Sceptical Pluralism", in S.T. Kolodziejczyk and Janusz Salamon (eds.), *Knowledge, Action, Pluralism* (Frankfurt am Main: Peter Lang Press, 2013), pp. 249-280.)

Fifthly, as is entailed in what was said above, acknowledgment that no experience or event in the physical universe may serve as conclusive evidence of the existence of God, or of perceived Divine agency, does not imply a denial that religious experience - understood in terms of various modes of awareness of the Divine presence - does play a central role in religious life understood as a spiritual journey towards God which consists in realisation of values that have its source and fullness in God. In such a connection, instances when a religious believer forms a belief that she has experienced God as being present to her do *not* play a role of 'evidence' of God's existence that would give rise to a belief in God's existence that was not there. Instead, such experiences typically occur in the context of a process of spiritual development or metanoetic transformation (the Greek noun 'metanoia' signifying a change of mind – in the biblical vocabulary acquires more specific meaning of 'conversion' as turning towards God). In such a context, religious experiences have spiritual progress rather than epistemic certainty for their purpose, therefore they presuppose and probe faith and trust in God, rather than allowing one to turn God into an object of experience which might be 'objectified' or 'pinned down' to ensure a degree of epistemic certainty on the part of the subject of experience. If any conclusion regarding the evidential value of religious experience can be drawn from philosophical analysis of the mystical literature, it is that the 'object' of religious experience tends to evaporate, as it were, when approached as an object, in an objectifying way, rather than as what it is supposed to be, namely a subject par excellence: a supremely free Absolute Mind, transcending infinitely the limitations of human mind. Even in the case of the human inter-personal encounters, it is not possible to fully objectify the subjectivity of the other, and speaking about religious experience we are faced with epistemological riddles similar to those associated with 'experiencing other person', except that when the 'object' of the experience is supposed to be the subjectivity of God, the challenge is infinitely magnified by what we stipulate about the nature of God.

Accordingly, in most religious traditions – even when the Ultimate Reality is not conceived as a person – mystical encounter with the Ultimate Reality is usually conceived in terms of free gift of self-disclosure on the part of God, not something that can be 'achieved' by human effort, and this is not contradicted by the existence of mystical 'traditions'. Such traditions do not presuppose some kind of 'objective availability' of God to be experienced under clearly specified conditions, and do not teach how to 'achieve' the experience of God by following some esoteric manual, but instead advise the adept how to remove the obstacles to encounter with God – obstacles consisting in inappropriate 'objectifying' and 'possessive' attitude towards

God. Thus, while being in principle sympathetic to Thornhill-Miller's and Millican's proposal "to embrace the universality of these [religious] experiences, interpreting them as pointing toward the divine in a way that is accessible to those of all faiths" (p. 19), I would need to point out the *a priori* and *a posteriori* considerations which must qualify this "universality" as implying possibility of 'authentic' religious experience taking place in the context of "all faiths", but not some kind of 'general accessibility'.

Taking it all into account, one can conceive of religious experience in a way that is consistent with the agatheistic concept of God or the Ultimate Reality as the ultimate good, namely as an intellectual perception, by a subject that conceives of God or the Ultimate Reality as supremely good, of the presence of a reality apprehended by the subject as exceedingly good and identified by the subject as God or the Ultimate Reality. There is no place here to engage in a discussion about the causal part of the story of the subject of religious experience forming such a belief, but it goes without saying that such experience cannot serve as a public and conclusive evidence of God's existence or agency. However, from the point of view of the subject of such experience, a belief formed on its basis may be rational to the extent it is supported by the higher-order belief in God as the ultimate good that might be expected to make his presence felt to a believer who "seeks his face", to use a biblical expression (Psalm 24). As in the case of every experience, its subject forms on its basis beliefs characterised by subjective certainty, but in the case of religious experience it will be the kind of agathological certainty defined above, underpinned by agathonic feeling of 'rest in the good', which reassures the subject in his confidence in the authenticity of an experience precisely because of its positive content. As is clear from countless reports of such experiences, the 'object' of such experience presents itself to the subject as exceedingly *good*, but to make any sense of such 'experience', one has to presuppose that the subject has a particular concept of God or the Ultimate Reality before having an experience of its presence. This principle applies to any experiential data that may be taken to be a manifestation of God's existence or action in the world, which reinforces our conclusion that theistic religious belief cannot be based solely on a theistic argument that starts with the facts about the physical universe, as does the Fine-Tuning Argument on which Thornhill-Miller and Millican want to base their second-order religious belief.

2.2. Grounds of religious belief: A posteriori considerations

So far we dwelt chiefly on the *a priori* considerations, related to the nature of God as stipulated by religious believers, relevant to the assessment of

Thornhill-Miller's and Millican's critique of the rationality of first-order religious belief that presupposes that the classic theistic arguments on one hand, and religious experience and miracles on the other, exhaust the list of possible sources of rationality of religious belief. However, there is another set of considerations, this time *a posteriori*, related to the nature of religious belief as fulfilling certain functions in the life of a typical religious believer, and thus explaining why such a believer holds any religious beliefs at all, whether rational or not. These considerations will be relevant especially to the assessment of the positive aspect of Thornhill-Miller's and Millican's project, namely their hypothetical second-order religion. Both sets of considerations will be decisive for putting forward agatheism as a functional equivalent of second-order religion, suggesting that agatheism scores better on all counts.

My critique of Thornhill-Miller's and Millican's hypothesis boils down to a worry that their concern with the emancipation of religious believers from irrationality leads them to adopt a paradigm of objective rationality appropriate for natural sciences that considers only the factors that are objectively verifiable, while ignoring or explaining away what following Thomas Nagel we might call 'the subjective point of view of a subject matter'. As a result they end up throwing the proverbial baby out with a bathwater and hypothesise a form of religious belief that arguably lacks what is religious in religion.

What is at stake here is not some purely academic definitional disagreement (what we are supposed to mean by 'religion'), but something absolutely central to Thornhill-Miller's and Millican's project, given that they start with admission that the 'secularization hypothesis' appears to be wrong ("as religious influence reasserts itself around the world"), then delve into psychological research, which supposedly "discovers why supernatural thinking is so intuitive and so hard to eliminate even when the effort is made" (p. 44), and finally proceed to propose a more rational replacement to the actual forms of religious belief to which people adhere to. Thus in the heart of this enterprise lies the question: what makes people adhere to religious beliefs in the first place, despite their growing awareness that natural sciences explain the facts about the physical universe without reference to supernatural powers?

Unsurprisingly, psychological research, which Thornhill-Miller and Millican bring to bear on their discussion of the above question, effectively explains away what religious scholars and believers themselves might consider to be specifically religious elements in religion, by reducing the reasons why people become or stay religious to "various practical benefits

of religion to the individual – social support, sense of meaning and security, comfort in times of grief, prayer-placebo". Taking into account that such "benefits" of religious belief might perhaps "equally well be delivered by non-supernatural means (e.g. non-religious group membership and forms of meditation, psychotherapy, etc.)", Thornhill-Miller and Millican are nevertheless inclined to think that "the very naturalness of religion gives some reason to doubt its easy replaceability, historically immersed as we are in well-established religious traditions whose rituals have evolved to fit human needs" (p. 45). It is the way they define these "human needs", the satisfaction of which is supposed to explain the existence of religion, that is perhaps the most disputable aspect of their work, while being of crucial importance, because it shapes their view of the character and nature of religious belief, which in turn colours their second-order religion. It is my contention that Thornhill-Miller and Millican overlook or downplay the importance of a number of fundamental aspects of religious belief, such as (a) its soteriological/eschatological perspective presupposing some formulation of "what can I hope", to use Kant's phrase; (b) its metanoetic/ transformational function presupposing some paradigm of spirituality which goes beyond the search for "sense of security" and "comfort in times of grief"; and (c) its relational/inter-subjective character associated with religious attitude of worship and love, and presupposing freedom of assent. By ignoring these central dimensions of religion, they make both their discussion of the limits of rational religious belief and the plausibility of their second-order religion hypothesis open to dispute.

Before discussing the importance of the fundamental aspects of religious belief enumerated above to the assessment of second-order religious belief, and of agatheistic belief as its possible contender, let me draw attention to a startling fact that to the extent second-order religion is based solely on the Fine-Tuning Argument and detached from first-order religious traditions, it is hard to see how it could deliver even these narrowly defined "practical benefits", like "social support, sense of meaning and security, comfort in times of grief, prayer-placebo", which our authors identify as the probable motivation that explains religious commitment. Thus there seems to be an internal tension between what the authors themselves identify as the human needs that religion is supposed to satisfy and their articulation of their second-order religion which they put forward as a satisfactory replacement of the existing religions, while it is clear that these needs cannot be met by second-order religion so conceived (and things will get worse when we will agree that religious belief typically satisfies also other important "human needs" which Thornhill-Miller and Millican do not take into account).

The reasons why second-order religion cannot satisfy such existential needs have to do with the inability of the Fine-Tuning Argument to establish a belief in God or the Ultimate Reality that might satisfy them. The authors do not make it clear what particular religious beliefs the Fine-Tuning Argument is supposed to justify, but it is clear what kind of beliefs cannot be justified by it. The older versions of the Teleological Argument were supposed to lend its support to belief in the existence of a Designer accounting for the total order of the universe, therefore arguing from the effect to the cause, one might have been able to 'learn' a lot about the Designer of the universe as the cause of its order. But precisely for this reason, it was possible to question the Teleological Argument by pointing to the elements of apparent disorder in the universe (as did Hume), or to the inability of the human mind to grasp the architecture of the universe in its totality in such a way as to be able to affirm the order that would call for explanation by reference to a rational Designer (as did Kant). Moreover, both Hume and Kant have argued that even if it would be possible to affirm the order of the universe that would point to a Designer, it would be problematic to ascribe to that Designer the typical theistic attributes, and perfection in general. The universe is not perfect, so its Designer does not have to be perfect, and the existence of evil makes it less than obvious that the Designer of the world in which we live must be perfectly good. The Fine-Tuning Argument differs from the earlier versions of the Teleological Argument in that it specifies in a more precise and scientifically verifiable way the elements of the order that call for explanation (namely certain 'anthropic coincidences' in the laws of physics without which higher life forms could not develop), however it retains the other limitations of the Teleological Argument which prevents one from concluding that the Designer responsible for setting the physical constants needs to be the perfect and omnibenevolent God of theism.

Quite apart from the unsuitability of the Fine-Tuning Argument as a candidate for the sole foundation of a religious belief system having to do with its provisional nature (since future physics can always explain this or that physical constant undermining 'supernatural' significance of *all* other 'anthropic coincidences'), the argument does not show that the Designer of the universe may be concerned *specifically with the human species*. For this reason Thornhill-Miller's and Millican's following interpretation of what the Fine-Tuning Argument implies – an interpretation on which the entire argument of the paper appears to rest – seems problematic in more than one way. They write: "If the universe has in fact been finely tuned to be especially conducive to the evolution of higher life forms *with moral and*

religious sensitivities, then it is only to be expected that such life forms will proliferate across the multitude of galaxies we observe, and that religion will evolve in many different ways, yielding a wide variety of specific religious systems" (p. 4). Firstly, the above sentence appears to imply that the authors take it for granted that fine-tuning entails that what explains the fine-tuning, explains also the evolution of the species, but this is surely reading into finetuning more than the apparent discovery of the physical constants which are 'life-friendly' justifies. But let's presume that it is reasonable to make the connection between fine-tuning and the evolution of the species, perhaps by suggesting that once we have granted that the postulated Designer of the universe is in some sense rational, we may reason that it would be pointless to fine-tune the universe to make it hospitable for life, without setting the conditions for evolution of the higher forms of life. It will still be far from obvious, why the Designer in question would aim at the evolution of the life forms with "moral and religious sensitivities". Most importantly, even if one would grant Thornhill-Miller and Millican that the Fine-Tuning Argument establishes rationality of belief in the Designer's special concern for the development of rational creatures like human beings, nothing would follow when it comes to the question whether the Designer of the finely-tuned universe is concerned about Jones' or Smith's existence. Thornhill-Miller's and Millican's comment about proliferation of higher life forms across the universe, their evolution "in many different ways", and development of a wide variety of religious systems suggests strongly that they presuppose that the Designer set certain initial conditions that make the evolutionary processes leading to the development of higher life forms possible, but the entire process is random, therefore there is no point in talking about the Designer being 'providentially' concerned with this or that form of the higher life form (like humanity), not mentioning Jones or Smith.

How against this background one is to understand the suggestion that part of the design manifested in fine-tuning is to make *all* these higher life forms evolving in many different ways end up with "moral and religious sensitivities" is a mind-boggling question. One is tempted to suspect that what is happening here is Thornhill-Miller and Millican realising that it is hard to make the logical connection between the existence of the Designer of the finely-tuned universe and the existence of "religious sensitivities" in humans, and salvaging the situation by bringing through the back door the more expansive old version of Teleological Argument, in which the Designer is supposed to explain *all* important features of the universe.

One's suspicions that this is indeed the case grows when towards the end of the paper, at the culminating point of their presentation of the

virtues of second-order religion, Thornhill-Miller and Millican appeal to 'religious instincts' (presumably synonymous with 'religious sensitivities' just mentioned), and apparently intend to make much out of this purported instinctual religious faculty, while it is not clear how this faculty fits in a coherent way a broader picture of the epistemology of religious belief which the authors seem to presuppose throughout the paper. As if realising how limited in content second-order religious belief based solely on the Fine-Tuning Argument is likely to be, and therefore it needs to be somehow supplanted, they propose "to abandon the competing dogmatisms of first-order supernaturalism and instead fall back onto an undogmatic version of its second-order cousin, finding intimations of divinity in the general structures of the world and in our own religious instincts, while remaining fully committed to the enterprise of natural science" (p. 46).

Now, there are at least two ways how 'religious instinct' may be understood in the context of Thornhill-Miller's and Millican's project, both of which are problematic. A rigorous interpretation of 'religious instinct' is likely to be theologically impotent, while an unrigorous interpretation is likely to cause a theological flood which our authors may wish to resist. Thus, either 'religious instinct' is conceived here in the way that finds support in the Fine-Turning Argument itself, in which case it cannot imply more than instinctual tendency to recognise the existence of the Designer about whom there is no reason to believe anything else than that 'he' set the physical constants in a way that is conducive to the development of higher-life forms, in which case it is hard to see what kind of "intimations of divinity" might be found by appeal to such instinctual faculty. Or else 'religious instinct' can mean as much as is implied in Calvin's concept of sensus divinitatis employed by Alvin Plantinga in his influential externalist and anti-evidentialist Reformed epistemology. Sensus divinitatis, a kind of sixth sense, 'religious sense', is indeed a form of 'religious instinct' and is understood to be a part of the design of our cognitive faculties by God the Creator, and is universal, and thus in a certain sense 'natural', independent of tradition-specific religious revelation, hence it might play the role of 'religious instinct' that Thornhill-Miller and Millican postulate. But the way sensus divinitatis is understood in Reformed epistemology shows that 'religious instinct' does not have to be conceived in a minimalist way that could be justified by the Fine-Tuning Argument. On the contrary, this instinctual faculty is taken to be a belief forming mechanism which – using Plantinga's terminology – when functioning properly and in an appropriate environment confers warrant on all sorts of particular religious beliefs

giving them a status of warranted beliefs.²¹ Needless to say, adherents of wide variety of theistic religious traditions might in a similar way claim warrant by thinking about their religious beliefs as being formed by this instinctual belief forming mechanism, in which case we are back with plurality of full-blown first-order traditions, the rationality of which Thornhill-Miller and Millican deny.

No less controversial is the suggestion that we may find "intimations of divinity in the general structures of the world", given that on its own, the Fine-Tuning Argument does not prove that the Designer of the finely-tuned universe must be conceived as 'divine', and stipulating the concept of 'divinity' in a way that would allow for such a move would have to be justified on a ground independent of the Fine-Tuning Argument.

By now it should be clear how much depends on which of two ways of approaching the issue of fine-tuning – rigorous or unrigorous – will Thornhill-Miller and Millican adopt. They may choose to construe the Fine-Tuning Argument in a rigorous manner, but then it will entail at most the existence of a Designer who ordered the universe in a way that is conducive to the existence of life in it (needless to say, 'he' does not have to be the universe's creator, and even less so a creator *ex nihilo*). Such a conclusion might perhaps be a source of confidence in the general teleology of the physical universe and thus may reassure those who find it difficult to accept that the universe is an outcome of some unintended nexus of physical causes. However, there is little reason why it should be taken to justify a confidence in the Designer intentionally bringing about the existence of creatures with "religious sensitivities", and no reason to believe in the Designer's providence in safeguarding the well-being of any particular life forms, or individuals.

The alternative approach to fine-tuning may be to argue that fine-tuning justifies going back to the full-blown Teleological Argument which treats God – whose concept is drawn from a different source than the Teleological Argument itself – as *explanans* of all sorts of phenomena which appear to have teleological characteristics, including the existence of "moral and religious sensitivities" and everything that the existence of such sensitivities might imply. Such an option is available, but only to those who wish to accept the epistemology of religious belief I have recommended above, involving the principle of justificatory descent, since now someone who already has a concept of a theistic or agatheistic God grounded in axiology, confronted with the alleged 'anthropic coincidences' will be able to form a belief that the conclusions of the Fine-Tuning Argument, when read against the

²¹ Cf. Alvin Plantinga, Warranted Christian Belief (Oxford: Oxford University Press, 2000), pp. 148ff.

background of the higher-order theistic beliefs make sense, because their antecedent probability relative to the higher-order beliefs makes them, as well as the conclusions of the more expansive version of the Teleological Argument, reasonable. That would be an example of unrigorous approach to fine-tuning, which leads to drawing conclusions which are *not* entailed in the Fine-Tuning Argument standing on its own.

It seems that Thornhill-Miller and Millican intend to approach finetuning in the rigorous way, but realising that their second-order religious belief is empty of content, or nearly so, they find themselves under pressure to base their second-order religion on the old-style expansive Teleological Argument, rather than on the modern Fine-Tuning Argument rigorously interpreted. However, Thornhill-Miller and Millican have good reasons to resist this kind of unrigorous approach to teleology, because it is precisely this line of reasoning which in response to the question: 'what was God's telos in creating the universe and human beings', generates the entire firstorder theistic religious traditions (relying in the process on agathological imagination). After all, once we have granted that the Designer of the universe transcends nature, and the Designer is responsible for all important features of the universe, why not presuppose that the ultimate telos of the creation transcends nature? If God the Designer is responsible for the existence of "higher life forms with moral and religious sensitivities", which direct their thoughts and hopes towards God or the Ultimate Reality that transcends nature, what is unusual in presupposing not just a particular teleological vision of history involving the 'communication' of God with his creatures, but also a particular eschatology, a vision of the end-state, that transcends nature? One might presume that faced with the question: what is the telos of the existence of these "higher life forms with moral and religious sensitivities", Thornhill-Miller and Millican might wish to answer as Aristotle would: flourishing life within the bounds of nature. But in such a case, why would the Designer of the universe bother to endow such creatures with "religious sensitivity" that tends to direct their thoughts and hopes beyond the bounds of the natural and beyond death?

Thus, if one adopts an unrigorous approach to fine-tuning allowing ourselves to discern teleology in various spheres of reality (rather than limiting oneself to the list of 'anthropic coincidences'), one risks opening the doors to a theological flood that results in a multiplicity of first-order religious traditions that may actually be conceived as alternative detailed responses to the question about the ultimate *telos* of all that exists, and this is an outcome that Thornhill-Miller and Millican want us to avoid. And yet, were they to stick to the rigorous interpretation of fine-tuning, they would be unable to

explain how a religious belief based solely on the Fine-Tuning Argument may be a source of the alleged "practical benefits" of religious belief to the individual, such as "social support, sense of meaning and security, comfort in times of grief, prayer-placebo" (p. 45). If there is no reason to believe that the Designer of the finely-tuned universe ought to stretch out 'his' providential care over humanity at large and even less so over individual human beings, how might accepting (provisionally) the hypothesis that fine-tuning points to some Designer responsible for setting certain physical constants cause one feel "comforted in times of grief" or have a "sense of security"? And what reason might the Fine-Tuning Argument give one to think that it might make sense to pray to such a Designer of the finely-tuned universe? As to possible "social support" as a "practical benefit" of religious belief, it is hard to think what might bind together adherents of such second-order religion to create a religious community that might provide its members with "social support" that could not be easily replaced by social support of non-religious kind. One may safely presume that the "social support" found by religious believers in the context of their religious communities has some specifically religious component, such as companionship on the path of religious growth defined against the background of some shared spiritual and soteriological vision.

It is a pity that the phrase "sense of meaning" that appears on Thornhill-Miller's and Millican's list of the alleged "benefits" of religious belief has been left by the authors without any comment that might give us a clue what it is supposed to imply. On the agatheistic picture of religious belief, satisfying our human need for making sense of our first-person, irreducibly subjective point of view on existentially relevant aspects of the world is – next to the need of making sense of our axiological consciousness – one of the main motives which give rise to religious belief. However, if Thornhill-Miller and Millican would stick to the rigorous interpretation of fine-tuning, it is hard to see how their second-order religious belief might be an abundant source of existentially relevant "meaning".

Perhaps the first sphere of meaning which comes to mind in connection with religion is giving each *individual* existence an ultimate meaning despite vast majority of lives lived in the course of human history having all appearances of abject failure, of good being defeated, of hope being denied. For this reason, all post-Axial religious traditions, even the ones which lack a God-figure, presuppose some possibility of ultimate fulfilment of human potential by way of transcending the limitations and contingency of our present condition. Whether conceptualised in terms of salvation, redemption, liberation, or in some other way, this soteriological

and eschatological promise is usually associated with the possibility of achievement of some kind of unity with the Ultimate Reality. Now, it is hard to see what second-order religion might have to offer by way of offsetting the disappointment most people experience at the gulf between 'what is' and 'what ought to be' or 'what might be', given Thornhill-Miller's and Millican's radically apophatic, almost agnostic, portrayal of the "luminous, second-order ultimate reality of some kind that yet lies beyond the comprehension of all our individual efforts to point to it" (p. 49). Surely, learning that the universe is purposely finely tuned to make the existence of higher life forms possible does not – on its own – sound like sufficiently good news for the inhabitants of the planet, the majority of whom had no chance to reach maturity, and of those who had, only few had a chance to lead a life to which the term *eudaimonia* conceived in an Aristotelian fashion could be applied with any degree of plausibility, in which case they might perhaps have good reason to perceive their life as meaningful enough and not to hope for more.

All in all, a second-order religious belief based solely on the Fine-Tuning Argument – which might justify its claim to objective, scientific rationality – can hardly be a *religious* belief, rather than a purely metaphysical or cosmological belief that does *not* involve religious attitudes of worship and orientation of one's existence towards God or the Ultimate Reality as its ultimate *telos*. Such second-order religion cannot provide an appropriate context for "intimations of divinity" (unless we conceive 'religious instinct' or 'religious sensitivity' in an expansive way unwarranted by the Fine-Tuning Argument). For this reason, it also cannot serve as a source of existentially relevant "sense of meaning", neither can it deliver any other "practical benefits", such as "comfort in times of grief".

III. THE EXISTENTIAL IRRELEVANCE OF SECOND-ORDER RELIGION

At this stage one might pause and ask oneself: how Branden Thornhill-Miller and Peter Millican might have arrived at such an extraordinary conception of second-order religious belief? My first reaction to their hypothesis was that of an awe how close it is to Hume's spirit. I thought that Hume would approve of all the conclusions of the paper, including the rejection of his own maxim on miracles. But then I have changed my mind and concluded that since Hume has admitted that he does not expect the majority of people to abandon their religious beliefs and practices, and since he accepted that 'human nature' itself leaves us no choice but to rely on instinct and imagination as providing context for or complementing the exercise of pure reason, would he choose to join Thornhill-Miller and Millican in their effort

to articulate a sensible epistemology of religious belief, he would most likely give up any hope that religious belief may ever be justified in a rational way, and would not try to base it on the Fine-Tuning Argument or any other argument or empirical evidence. Instead, recognising that the secularisation thesis might be false, Hume would probably presuppose the existence of something like 'religious instinct', and then would simply allow religious believers to follow their religious instinct without expecting them to be able to rationally justify their particular religious beliefs (perhaps adding, as he should, that a religious believer, like every other reasonable person, is under rational obligation of ensuring coherence of his religious beliefs with his other well-established beliefs about the world). In other words, if Hume would have to grant that religious belief is in some sense natural, he would conceive of the epistemology of religious belief along fideistic lines, perhaps accepting Plantinga's externalist epistemology of religious belief, which under the condition of religious diversity may be considered to be a form of epistemologically sophisticated fideism. Allowing for that, Hume would probably see no reason why religious believers would have to stick to rigorously apophatic or agnostic approach to the Ultimate Reality, if religious instincts lead them to attribute to it certain particular characteristics, or to believe in a particular vision of relation between the Ultimate Reality to the world and humanity. After all, Hume will not expect any of these beliefs be justified in any other way than by reference to the religious instinct. Hume might also be aware that 'religious instinct' and 'religious imagination' play a pragmatic role in the religious sphere, analogical to that played by instinct and imagination in our interaction with the world and other people, so that relying on them and thus being religious is likely to involve not just 'believing in something' (holding certain beliefs), but 'doing something', 'adopting certain attitude towards God' ('believing God' vs. 'believing in God'), also 'undergoing something' (undergoing spiritual/metanoetic transformation), and 'hoping for something'. And to be able to do all that, believers have to hold some particular religious beliefs, perhaps many of them.

Thus, at the end Thornhill-Miller's and Millican's idea of second-order religious belief may not appear to be as Humean as one might expect it to be. If anything, it reminds one of Aristotle's vision of the Unmoved Mover putting the universe in motion. Aristotle may be able to say about his Absolute (as a 'thought thinking itself') more than Thornhill-Miller and Millican about their Designer of the finely-tuned universe, but this is so because part of what he says about the Unmoved Mover is based on a perfect being philosophy type of reasoning, not on abductive reasoning or inference to the best explanation which starts with the facts about the

physical universe and postulates the existence of the Unmoved Mover. Aristotle's vision of the Absolute is a product of his agatological imagination. He thinks that an Absolute is a thought thinking itself, not interested in the universe, because his agatological imagination tells him that this is the optimal mode of existence.

Thornhill-Miller's and Millican's view of the "luminous second-order ultimate reality" shares some of the rational purity of Aristotle's vision, which does not require 'faith', but allows for full 'objectification' of our knowledge of the Absolute. Since the Aristotelian Absolute is not 'interested' in the world, possible insights in 'his' subjectivity or "intimations" of such an Absolute would be existentially irrelevant. An Aristotelian-style Absolute or a Designer of the finely-tuned universe cannot do more than explain the general teleology of the universe. It cannot be turned into existentially relevant God, because one important thing that Aristotle has shown by postulating the existence of the Unmoved Mover is that a 'non-religious' Absolute, lacking moral or agathological attributes, may fulfil the role of the *explanans* of the alleged teleology of the universe.

However, an existentially irrelevant Absolute is unlikely to be of interest for religious believers, because they are not primarily interested in finding the answer to the question: 'how did it all come about', but to the question: 'where is it all heading', and how the telos of the universe is related to the telos of their own individual existence. It is clearly a mistake to think that religion serves the purely epistemic needs of the people, satisfying their curiosity about the way the world came into being or who is responsible for the way the world operates. Arguably, even in the distant past when people ascribed to supernatural agency responsibility for the order of the seasons, the rising and setting of the Sun, for the rain and the drought, they were not interested in these phenomena in the existentially detached way a modern scientist might be, but they were interested in them as life-giving forces, whose very existence made them believe that someone cares about them or disapproves of their actions, and therefore their own existence may have some deeper meaning and some *telos*, other than survival for one more day. Only in this way one can explain why the growing awareness of the ability of science to account for the facts which in the past might have been 'explained' by reference to supernatural agency does not diminish in a dramatic way the tendency of people to believe in a theistic God or the Ultimate Reality conceived in some other way.

Ostensibly a 'religious mind' is not primarily interested in the explanation of natural phenomena by the reference to efficient causes, but is interested in an existentially relevant understanding – by reference to final causes – of

the teleological nature of our axiological consciousness: our perceiving of the world in a non-detached way, as a value-laden world-for-us, as valuable when, and only when, viewed from particular subjective viewpoint of selfconscious subjects. To put it in a more Shakespearean manner, a religious mind perceives the world as a stage on which the drama of one's existence takes place. But the meaning of one's existence cannot be extracted from explanations of the origin or the workings of the 'stage' in terms of efficient causality, unless they also happen to entail answers regarding the telos and thus ultimate meaning of the 'play' of human existence, as is the case in the religious stories of creation. But science can say nothing definite about the telos and thus ultimate meaning of my existence, because this can be defined only by reference to some values, some 'good' towards which my existence is directed, and natural science cannot 'explain' values, because final causes do not belong to its domain. Thus a religious mind is neutral as to the explanation of the facts about the physical universe ('the stage'), hence Thornhill-Miller and Millican can stay reassured about the ability of adherents of first-order religions to "remaining fully committed to the enterprise of natural science" (p. 46). But a religious mind cannot remain fully detached from its existential concerns, limiting itself to Aristotelian contemplation of the "luminous, second-order ultimate reality of some kind that yet lies beyond the comprehension of all our individual efforts to point to it" (p. 49). Therefore, unless we want to engage in an implausible argument which starts with an admission that religion may after all be 'natural', because it does not seem to go away, and end with a recommendation that it should be replaced with a second-order religion which lacks nearly all the relevant characteristics of first-order religions to which billions of people adhere to, we have to accept that religious belief has to, above all, shed light on the question of the ultimate meaning of human existence, and this by reference to human values, not merely facts about the physical universe. For this reason, religious belief cannot lack soteriological/eschatological, metanoetic/ transformational, relational/inter-subjective, and other existentially relevant aspects, or else it is unlikely to appeal to adherents of first-order religions.

We have already raised the issue of the inability of second-order religion based solely on the Fine-Tuning Argument to be a source of meaning when it comes to human soteriological and eschatological concerns about our finiteness and mortality. Another specifically religious concern – one that bothered Kant – has to do with our awareness of our moral weakness and our limited moral perfectibility, combined with apparently 'natural' teleological inclination to be compelled by an ideal and to seek the ultimate good, while acting on this inclination is in most cases doomed to failure. Therefore

providing a context for spiritual growth or metanoetic transformation -'transformation from self-centredness to other-centredness', to use John Hick's cross-cultural formulation – is perhaps the one aspect of religious belief that is universal across all religious traditions. Nota bene, this transformational aspect is in most cases closely related to the soteriological/ eschatological one, since metanoia, conversion or achieving freedom from 'craving' or attachment, is usually considered to be the condition of salvation/ liberation. In both cases, religious traditions provide some vision of the ultimate goal or at least a 'path' and direction in which one needs to proceed to actualise one's potential for inner transformation. For this reason spiritual paradigms or role models serving as guides on the path of transformation also typically constitute an essential part of religious traditions. While in some religious traditions (e.g., in certain Protestant denominations), belief itself may be all-important (although the affirmation of belief may at the same time be treated as a kind of 'conversion'), in most traditions, paradigmatically in most strands of Buddhism, all aspects of religion play an auxiliary role in the spiritual transformation.

This brings us to the famous Buddhist metaphor of a finger pointing at the moon, taken from *Surangama Sutra*, influential especially in the Chinese Chan Buddhism, which Thornhill-Miller and Millican utilise to conceptualise their view of the relationship between religious beliefs constituting particular religious traditions and the 'second order Ultimate Reality'. Their discussion of their Maxim of the Moon – poetic and rhetorically forceful – fills the final pages of the essay, and brings their argument to a close, summing up well both the critical and constructive components of their project. Everything we have said so far about second-order religion finds its confirmation in Thornhill-Miller's and Millican's interpretation of this metaphor.

They start with rightly pointing out that the metaphor "cautions us against the blinding force of human cognitive bias by suggesting that all our pursuits of knowledge – including all our religions – are like 'fingers pointing at the moon,' while all too often "we mistake our own finger for the moon and allow it to eclipse our view" (p. 49). However, what follows is a reading that expresses better Thornhill-Miller's and Millican's than Buddhist understanding as to what this metaphor is meant to imply as an instruction for an adept of Buddhism. Our authors interpret the metaphor as above all recommending radical apophaticism or agnosticism with regard to what can be understood and communicated about the ultimate reality by means of human religious concepts which give rise to diverse religious traditions. Making a link between the metaphor and their own project of

removing irrational elements from religious belief systems, they write: "once we have rationally removed all the overlapping fingers associated with our different religions, there may be no distinguishing traits left to view" (p. 49). And yet, for some reason – perhaps once more becoming aware that their second-order religious belief might turn out to be empty of content and thus an improbable candidate for replacement to first-order religious beliefs – Thornhill-Miller and Millican attempt to qualify this apophaticism, suggesting that first-order religions "may also be thought to offer a reflection of second-order mysteries and wonders that yet still lie beyond our grasp" (p. 49). Whatever the meaning intended in this intricate phrase, given what has been said in the above two quotations, it is hard to see how Thornhill-Miller and Millican can explain the way in which first-order religions might be a reflection of the Ultimate Reality.

Still, their hesitation regarding the extent of their apophaticism or agnosticism regarding the Ultimate Reality was well founded, because an all-out agnosticism implied in their own formulas would be out of place even in the context of Buddhism. Ascribing apophatic tendencies to Buddhism is, of course, uncontroversial, given that according to canonical sources Buddha consequently refused to comment about the nature of the Ultimate Reality (even though his Mahayana followers ended up developing a sophisticated trikaya metaphysics). What is controversial in Thornhill-Miller's and Millican's reading of this metaphor is not so much what *is* in the text, but what is missing from it. What is the *main* point of the metaphor? What lesson is a Buddhist expected to draw from it? The conclusion presupposed in Thornhill-Miller's and Millican's 'Maxim of the Moon', that he should refrain from holding any particular religious beliefs specific to any particular religious tradition? Really? And only that? Surely not. After all, the metaphor is employed by Buddhists who always do belong to particular religious traditions and hold variety of religious beliefs which guide them in their spiritual practice aimed at metanoetic transformation and liberation. The main message of this metaphor is not negative (proscribing particular religious beliefs), but positive (prescribing spiritual practice, rather than just thinking and talking about the Ultimate Reality). The message of the metaphor is thus: do not just read, think and talk about the Buddha and Buddha-nature, because that will be like focusing your attention on the finger pointing to the moon. Instead, follow the path of spiritual discipline which will lead you to actually becoming Buddha, 'realising' the Ultimate Reality, which will be an equivalent of actually seeing the moon, rather than a finger. But such message presupposes quite particular religious beliefs: that the moon is actually there, and that it can be seen at the culminating

point of a spiritual journey of metanoetic transformation, undertaken by an adept within the context of particular tradition defined by particular belief systems, sets of practices, institutions, etc., etc..

Thus, at the end, what is missing in Thornhill-Miller's and Millican's interpretation of the Buddhist metaphor of the finger pointing at the moon is precisely the same thing that is missing from their second-order religion, and which is there in Buddhism and other first-order religious traditions, namely soteriological/eschatological aspect (e.g., belief in the possibility of achieving Nirvana), metanoetic/transformational aspect (affirmation of centrality of certain spiritual practices aimed at liberation), and relational/inter-subjective aspects (this will depend on the conception of the Ultimate Reality, but even in Buddhism which does not presuppose an existence of a Deity, practitioners adopt certain enduring relational attitude annunciated in the Buddhist initiation: "I take refuge in Buddha; I take refuge in Dharma; I take refuge in Sangha").

All these fundamental aspects of religious belief will have particular doxastic expressions, but the message of the metaphor of the finger and the moon remains universally valid: religious beliefs are only sign-posts on a spiritual path leading towards the union with the Ultimate Reality towards which the sign-posts only point, hence holding religious beliefs is just a point of departure of a spiritual journey, and does not exhaust the meaning of being religious. For this reason, attempting to establish the epistemic rationality of religious belief on a model of objective, scientific rationality, even for the price of emptying religious belief of its specifically religious content, would be like reading the metaphor of the finger and the moon in the following way. Since diverse religious beliefs are just different fingers pointing at the moon, typically eclipsing it, rather than disclosing it, a rational religious belief should consist in refraining from these particular first-order beliefs, and accepting that "there may be another vision of the moon, as a luminous, second-order ultimate reality of some kind that yet lies beyond the comprehension of all our individual efforts to point to it". And the only reason for adopting such a novel apophatic or agnostic attitude is that the postulated Designer of our allegedly finely-tuned universe may turn out to be a good candidate for the Ultimate Reality ('the moon'), although we will probably never know it, because there is no reason to think that there is a way to get to actually 'see' the moon, given that all alleged evidence of 'perceived supernatural agency' and all theistic arguments are inconclusive, while the Fine-Tuning Argument does not provide a basis for belief in an Ultimate Reality religiously conceived. And besides, why accept that there is a moon to be seen in the first place? After all, once we have

accepted that the fingers of first-order religious traditions do *not* show the moon, but rather eclipse it, why to think that there is a moon? Perhaps the fingers do not refer to anything outside themselves, other than to the human needs which – in some Freudian fashion – gave rise to them (i.e., religious beliefs and traditions) as their efficient causes? Thus at the end, even the claim that the 'fingers' of first-order religious traditions 'eclipse' the Ultimate Reality turns out to be hard to defend.

To sum up, it seems that the only element of a rational second-order belief based on the Fine-Tuning Argument that is beyond criticism is the 'bare' Designer of the finely-tuned universe that looks more like Aristotle's Unmoved Mover after an apophatic diet, than a theistic God or the Ultimate Reality of oriental religions that religious believers have in mind affirming their religious commitment. Therefore, in order to have some positive content, a Universalist religious belief of the type Thornhill-Miller and Millican seem to have in mind, needs to be grounded in something more than the Fine-Tuning Argument, and this 'something' may be our axiological consciousness.

IV. RATIONALITY OF FIRST-ORDER RELIGIOUS BELIEF AND AGATHEISTIC PLURALISM

Branden Thornhill-Miller's and Peter Millican's hypothesis of second-order religious belief is motivated by twin concerns about alleged irrationality of first-order religious beliefs, and about their purported divisive and conflictual nature. Hence, in the remaining part of the paper, I will indicate briefly how an agatheist may go about addressing their concerns, while at the same time creating favourable conditions for constructive global ethical dialogue of adherents of various worldviews and religions. Much of what I have to say has already been implied in my critical remarks about Thornhill-Miller's and Millican's project.

4.1. The nature and diversity of first-order agatheistic religious belief

My reply to Thornhill-Miller's and Millican's concern about irrationality of a commitment to a first-order religious tradition boils down to a suggestion that to the extent agatheistic religious belief is presupposed in it as its doxastic core, its belief system, if internally coherent, may be shown to be rational, despite there being a plurality of such belief systems.

Returning to our picture of a doxastic ladder, with descending justificatory dependence, the nature of agatheistic religious belief may be argued to be such that it is reasonable to assume that more than one 'ladder' of a *rational*

religious belief system may be 'hanged' at the 'ceiling' of the fundamental agatheistic belief. In other words, the fundamental agatheistic belief may constitute the epistemic foundation of a number of different religious belief systems.

In order to make sense of such a picture of the epistemology of religious belief, one has to begin by considering the following proposition. Of its nature, a religious belief system specific to a given religious tradition cannot be a product of some 'complete revelation' as if the 'ladder' of its complete doxastic system has been lowered down from heaven without creative contribution on the part of its adherents, neither can it be the sole product of abductive reasoning, starting from the facts about the physical universe and ending up with a complete system of beliefs about the Ultimate Reality, for the same reasons, discussed earlier, for which the Fine-Tuning Argument cannot provide a sufficient basis for a full-fledged religious belief system. Therefore, I submit, there is no better way to conceive of various religious belief systems than as products of the 'meeting of minds': human and Divine. Given the disparity between Divine mind and human mind stipulated in the religious conceptions of the Absolute, and the linguistic nature and historicity of human reason, even if the possibility of the Absolute self-disclosing itself to rational creatures in Nature, Scripture, History and religious experience is taken for granted, in order to make sense of the generation of the entire religious belief systems we need to presuppose that it is the human subjects, through their employment of agathological imagination as a rational faculty proper to all human beings, guided by the logic of perfect being philosophy, who form their beliefs about the Absolute in accordance with their sense of what is fitting to believe about the Absolute. The employment of agathological imagination in the formation of religious beliefs is indispensible, because religious beliefs are neither taken by the belief-holders to be beliefs about physical objects, nor are they beliefs about abstracts objects, nor beliefs about purely intentional objects like a work of art, but instead belong to a domain that is sui generis, and is such that in its exploration imagination must precede rational analysis. It is due to the involvement of imagination in the religious belief formation that religious language is ultimately irreducibly metaphorical, analogical and symbolic, and thus unavoidably anthropomorphic and always in need of purification by a combination of eminence and remotion (Aguinas's via eminentiae and via remotionis), that is by acknowledgement that the terms we use pertain to God always in a higher manner than we can actually conceive of, and by the removal of creaturely imperfections from our descriptions of the Absolute. Needless to say, this distinctive nature of religious belief, and the

corresponding distinctive character of religious language, combined with the unavoidably perspectival, sociohistorical situatedness of believers as associated with particular times, places, cultures and languages, are bound to generate a *diversity* of religious concepts and beliefs.

Whatever the context in which particular religious beliefs are formed in various times and places - be it individual religious experiences or the activity of great religious figures as geniuses of agathological imagination there is no other way such beliefs might be widely accepted than by being 'recognised' as representing the optimal way of conceiving the nature of the Absolute and its relation to the world and humanity, where the 'optimal way' indicates an attempt at 'reading God's mind' or approximating 'God's eye view' of the matter. But the ability to 'recognise' a particular proposition about God or the Ultimate Reality as 'true' and thus worthy of assent, or a particular interpretation of a fragment of the sacred scriptures as 'correct' and thus worthy of belief, or for that matter, the ability to 'recognise' the Divine presence in one's own religious experience or in the activity of a great religious figure, presupposes having an a priori concept of God or the Ultimate Reality as the ultimate good. Without being, prior to experience, in possession of such a concept, we would not be able to make an agathological judgment, whether what we are dealing with is 'good enough' to be associated with God, otherwise we would have no basis for differentiation between God and something towards which an attitude that accords God would be inappropriate. It is, thus, my contention that all particular beliefs about the relation of God or the Ultimate Reality to the world, humanity, and to the belief-holder, are being formed and shaped by agathological imagination, and are being done so continuously, since our concept of the Ultimate Reality is necessarily an open, 'limetic', and hence also 'contested' concept, which can never be 'exhausted' by the human mind. This 'inexhaustibility' of the concept of God – corresponding to the inexhaustibility of the reality of God, well captured by the term 'Divine plenitude' - is yet another factor that explains the diversity of religious beliefs, as well as the evolving nature of religious beliefs in the course of history. In other words, the very nature of the Ultimate Reality as the 'object' of religious belief, coupled with the nature of human subjects of religious belief - as endowed with limited, linguistic, historical reason - makes us expect what we actually see: the diversity and evolving nature of religious belief systems. The importance of the sociohistorical situatedness of human subjects who shape their religious beliefs by exercising their agathological imagination cannot be overemphasised in this context, because religious beliefs are rarely beliefs of the kind Aristotle formed about his Absolute, as

a 'thought thinking itself'. Instead, religious beliefs are typically beliefs about 'God-for-us', beliefs situating God vis-à-vis the believers *in their particular context*. Hence, the form most religious beliefs are likely to take will reflect the particular existential conditions of those who formed them, in a way that does not stand in contradiction with each believer's conviction that his belief is an optimal expression of truth about God *available to him*, because a believer has no other option, but to rely on his *present* agathological intuitions regarding the nature of God and God's relation to the world and humanity.

Nowhere is the impact of ever-changing existential conditions of beliefholders on the content of religious beliefs better documented than in the sacred scriptures of various religious traditions, which bear witness to the evolving nature of religious belief systems. For example, a parochial view of God as a tribal Israelite Divinity, to be found in some sections of the Pentateuch, from whom action in the spirit of favouritism is to be expected, even if that would entail allegedly approving a slaughter of the inhabitants of the entire Canaanite towns (cf. Deuteronomy 7.1-2; 20.16-18), could not be more different than the already universalist monotheistic vision of Deutero-Isaiah, who proclaims that the entire world is the dominion of Yahweh, drawing this conclusion from the belief that God is the sole creator of the universe ("It is I who made the earth and created mankind on it" - Isaiah 45:12). If one wishes to take these two visions of God as instances of the self-revelation of God to the people of Israel, surely one has to acknowledge that it would be hard to conceive of the possibility of God 'revealing himself' to the Israelites as a God of the entire universe at a much earlier stage of their history, before they had an opportunity to come, as exiles, into an intense contact with the cosmopolitan world of the Neo-Babylonian Empire, and with the universalist mindset of Cyrus the Great, both of which may be said to shape the agathological imagination of Deutero-Isaiah in a way analogical to that which made the universalist turn of the Jewish followers of Jesus of Nazareth, like the apostles Paul and Peter, possible.

A similar conceptual evolution is even more evident in the *Vedas*, the oldest of which apparently presuppose a polytheistic view of the religion of nature, hence the contrast with the vision of the Ultimate Reality found in the later Upanishads, informed by the mystical traditions of the Indian sub-continent, could not be more dramatic.

Needless to say, in such cases the sacred scriptures may be interpreted in a coherent way by reading the earlier texts through the lenses of the later developed views of the Absolute, which at the moment of the reading of the scriptures are taken by the adherents of the given tradition to approximate in an optimal way the ultimate truth about the Absolute. If we add to this picture the revolutionary aspects of the Buddha's religious and social teaching, that includes challenging social inequalities sanctioned by the Vedic tradition – something that the Prophet Muhammad also did in the Arab context - it is hard not to be struck by the progressive nature of the evolution of religious belief systems. Again, such evolution can be best accounted for by reference to the agathological imagination of religious geniuses, whom their encounter with the Absolute leads to re-imagining not just the relation between the Ultimate Reality and our human world, but also the human reality as seen from 'God's eye viewpoint', in its tension between 'what is' and 'what ought to be' or 'what might be'. This process of agathological reimagining, leading to the revision of certain beliefs and practices of a given tradition, is thus motivated by the attempt at approximating more fully to 'God's eye view' the human way of perceiving the potentialities for good inherent in the human reality, and to the extent this process can be thought to lead adherents of a particular religious tradition to grasping more fully the meaning of the good that is realised completely in God or the Ultimate Reality, adhering to such religious tradition is consistent with adhering to the fundamental agatheistic belief, despite there being a plurality of such evolving religious traditions.

It is important to notice that it is not just by revising the canonical elements of the religious belief systems adhered to at an earlier stage - in response to new agathological insights that make certain religious beliefs and practices appear outdated to the belief-holders – that religious traditions are formed and re-formed. At least equally significant is the employment of agathological imagination in interpreting the canonical beliefs, texts, narratives and symbols in various times and places, without revising them in a dramatic fashion that might undermine the confidence of the believers in the integrity of their religious tradition and its identity over time. Here the scope for diversity is again considerable, although such diversity may be easily overlooked, precisely because this time one does not deal with fundamental change of the canonical elements of a religious belief system - exemplified by Buddhism emerging from Hinduism or Christianity emerging from Judaism – but instead with *internal* diversity within one religious tradition, as is the case with differences between various Buddhist, Hindu, Muslim, Jewish and Christian 'denominations', interpreting differently the canonical beliefs, and moreover is the case with differences between individual adherents of the same denomination, because the agathological imagination, like Aristotle's phronesis, is ultimately an individual faculty, although its deliverances can be inter-subjectively communicated and debated.

This kind of 'horizontal' doxastic diversity within religious traditions, which appears to be less dramatic, but is no less important from the epistemological point of view, than the diversity of religious traditions, is complemented by a 'vertical' interpretative diversity resulting from evolution of interpretation of the canonical beliefs over time. One notable example of vertical doxastic diversity would be that of the interpretation of the canonical biblical belief about God being just vis-a-vis his human creatures. Such belief is supposed to shed light on the appropriate form of human relations as just or unjust, as seen from a 'God's eye viewpoint'. And yet, even without providing extensive arguments of a historical nature mentioning the history of slavery and of the resistance to democracy should suffice - it is not difficult to establish the claim that religions, including the Abrahamic religions, have an (un)impressive record of opposition to recognition of equal worth of every human person, and to social changes associated with the promotion of greater social equality. However, it is clear that each time humanity's horizon of agathological imagination has been expanding, leading to a recognition - to a greater degree - of the fundamental equality of human beings, the interpretations of the canonical religious texts and beliefs kept changing, as an expression of acknowledgement that the goodness and justice of God has at an earlier point in time been less adequately conceived.

These changes in the understanding of the agathological attributes ascribed to the Absolute in various religious traditions take place within a hermeneutic circle, where new insights into the nature of human goodness affect the way we conceive of Divine goodness, and vice versa. In a sense, as the believers grow, expanding the horizon of their agathological imagination, so does their God, and in turn the 'growing' God challenges the agathological intuitions of those of his believers who did not yet 'update' their agathological beliefs in line with the new insights of the agathological geniuses - saints, prophets and sages - of their tradition. Such dialectical progress can be made sense of by reference to the intuition that is present in one way or the other in the majority of religious traditions, and in the Judeo-Christian context is expressed in the belief that human beings are created by God in the 'image' and 'likeness' of God (cf. Genesis 1:26-27; 5:1-3; 9:6). The imago Dei axiom allows one to argue that even though God's absolute nature - which calls for the application of the analogy of proportionality in making any assertions about God on the basis of the qualities shared by human beings with God – seriously limits our ability to 'see God's face' in the mirror of our humanity, still at least as much of the trace of the Divine in humanity is discernible, namely human openness to

the realisation of the original potential for imitating God in his goodness (which is also consistent with the agatheistic identification of God with the ultimate good). This line of thought reinforces the conclusion that religious believers are always caught in a hermeneutical circle and cannot transcend their human condition to actually achieve a 'view from nowhere' or the 'God's eye view', and base their religious belief system solely on a 'theology from above' strictly understood, if this term would be taken to refer to a set of propositions about the way God relates to his creatures that would have an ahistorically fixed meaning and so would be unable to be affected by the evolution of our agathological intuitions.

By now, one thing should be clear: to paraphrase Rousseau, taking God as God might be, and humans as they are, one should expect to see what we actually see: pluralism of evolving religious belief systems. To the extent God as *Agatheos* – the Ultimate Reality religiously conceived and identified with the Ultimate Good – is thought to infinitely transcend the limited cognitive and imaginative capacities of the human mind that is embodied and thus sociohistorically situated, the pluralism of religious beliefs is a natural outcome of human efforts to articulate human understanding of God, and this holds whether one chooses to see the history of religion in terms of 'man in search of God' or 'God in search of man'.

Thus, although so far we have discussed only the intensional rather than extensional side of the problem of religious belief, that is its possible meanings, rather than the existence of its referent, the reason why the above discussion of the *nature* of agatheistic religious belief was necessary is that if first-order religious belief is to be epistemically justifiable in a non-fideistic way, it is unavoidably going to be this kind of belief that is part of one among many evolving religious belief systems justified in a similar way.

4.2. The nature and epistemic justification of first-order agatheistic religious belief

From what has been said so far about what can and what can not constitute the possible epistemic ground of the first-order religious belief system, it follows that it is a mistake to assume that each *particular* religious belief that constitutes a part of a religious belief system should be justified *separately* by reference to some 'conclusive evidence' of empirical nature. Instead, I submit that the epistemic justification of religious belief should be conceived along the lines of the metaphor of a doxastic ladder hanging at the ceiling of the fundamental agatheistic belief in the Ultimate Reality as the ultimate good. All particular beliefs of a given religious belief system are justified against the background of their antecedent probability relative

to what the fundamental agatheistic belief may be thought to entail, that is they are justified to the extent they are part of an internally coherent belief system which coheres with the fundamental agatheistic belief. In practice, particular religious beliefs are added to the system by great religious figures as geniuses of agathological imagination who have new insights regarding what God or the Ultimate Reality being the ultimate good might imply, and who also typically are taken to have some kind of religious experience understood as an instance of an 'encounter' with the Divine. But these new beliefs have its *primary* justificatory ground not in the experiences themselves, since such ground would be insufficient for justification, but in the fundamental agatheistic belief. Therefore, what an epistemologist of religious belief has to concentrate on in the first place is the possibility of epistemic justification of the fundamental agatheistic belief itself, which in turn grounds all other first-order religious beliefs that may also be epistemically supported by religious experience to the extent religious experience is itself made antecedently probable by the fundamental agatheistic belief, and is consistent with it.

Accordingly, the main claim of this section of the paper is that agatheistic religious belief can be shown to be rational by recourse to a combination of two lines of argument: the first one which postulates the existence of *Agatheos* as the ultimate good to which our axiological consciousness points, and the second one which is supplementary, and points to the experiential factors, namely the agathonic feeling accompanying agatheistic religious attitude *and* religious experiences of the Divine presence.

Thus, the main argument in favour of rationality of agatheistic religious belief starts with identifying the fundamental 'fact' about our axiological consciousness, our directedness towards the good, as "that for which everything is done", identified already by Plato (Gorgias 468b; cf. also Symposium 205e-6a, Republic 505d-e, Philebus 65a). Aristotle's concept of intrinsic good as desired for itself and occupying the supreme position in the hierarchy of human ends, something we would choose and pursue whether or not it helps to bring about further goods (cf. Nicomachean Ethics I.2 1094a19, I.6 1096b18-19, I.7 1097b2-5), although taking on a different meaning due to a different metaphysical context, confirms Plato's insight about the irreducibly value-laden nature of our attitude towards reality. While Aristotle's account of a flourishing life includes a vision of a purely contemplative existence, it is clear that far more realistic and existentially relevant is his vision of an active life, deeply engaged with the world, in which the desire to know is always inseparably linked with seeking some good, according to the axiom: to know a good, is to desire it.

A crucial step in our argument is to reject the possibility of a satisfactory scientific explanation of this axiological dimension of our consciousness that would make it unproblematic, leaving no questions unanswered. And this is the right moment to draw the attention to the opening quotations from Albert Einstein and Isaiah Berlin. I deliberately chose two authors who did not consider themselves theists, yet - while being exemplary rationalists refused to identify themselves as critics of religion as such or as atheists, 22 as did Hilary Putnam who voiced similar opinions on the subject while remaining a non-theist and characterising the God of his own Jewish religious practice as a "human construct" created "in response to demands that we do not create". 23 Identifying oneself as a theist or not is beside the point in the above quotations which point to the normative aspect of the 'human world', of the world of conscious subjective experience, that is not reducible to the facts about the physical universe, and as such cannot be explained exhaustively by science, while presenting itself to us as a central human concern that is hard to dismiss without making sense of it or giving it some meaning that would be relevant to our first-person perspective on the world and our own being in the world. It seems that it is this characteristic tendency of human beings as 'sense-making' or 'meaning-giving' animals that makes our minds restless and does not allow us to give up the search for the *ultimate* meaning even in the areas where there is perhaps no scientific knowledge to be had, and therefore also no possibility of reliance on the scientific method, and no possibility of conflict with science, as Einstein, Berlin, and Hume - with his formula that one cannot derive 'ought' from 'is' - seem to agree, even though some contemporary naturalists may wish to believe that science can determine human values and human ends.

The reason why science cannot either confirm or disconfirm religious belief is that religious belief – even if 'acquired' in the context of a religious community and drawing on the resources of a religious tradition – is *about* the aspect of reality that is essentially subjective, expressing our particular, first-person, specifically human perspective on the world. Religious belief pertains primarily to the realm of values, the realm of the ultimate good, not to the realm of facts about the physical universe, whose phenomena are explained by science giving account of the causal laws that explain them. But the axiological dimension of the human consciousness presents itself to us

²² Asked about it, Isaiah Berlin explained: "dry atheists seem to me blind and deaf to some forms of profound human experience." (Cf. Isaiah Berlin and Ramin Jahanbegloo, *Conversations with Isaiah Berlin* (New York: Charles Scribner's Sons, 1991), p. 110.)

²³ Hilary Putnam, *Jewish Philosophy as a Guide to Life: Rosenzweig, Buber, Levinas, Wittgenstein* (Bloomington: Indiana University Press, 2008), p. 6.

as irreducibly teleological, not efficient-causal, therefore there is nothing for science to explain in the realm to which religious beliefs – and all agathological beliefs, whether held by a religious believer or by an atheist - pertain. For this reason, to attempt to take out religious belief from its subjective, firstperson context, in order to make it appear more rational than it actually is, is like taking a fish out of the water to make it easier to observe. From the fact that it may be possible to think of a religious belief that would have a stronger claim to rationality than the kind of religious belief that is actually held by a typical religious believer, it does not follow that we have a good reason to replace the former with the latter, as Thornhill-Miller and Millican propose. At the end it may turn out that these two different kinds of beliefs simply do not capture the same dimension of 'reality' in question, as the 'more rational' beliefs about the acoustic and mathematical aspects of the Art of the Fugue cannot replace the 'less rational' beliefs about the music formed in the mind of the listener of Bach's masterpiece. The objective and subjective point of view of the matter are not reducible to each other. Something of this duality seems to be present in Thornhill-Miller's and Millican's approach to religious belief, as if the chief reason why they choose to focus on fine-tuning is that they want to put the spotlight on that dimension of religious belief which is most easily objectifiable and thus conducive of rational justification according to the paradigm of objective scientific rationality, and this despite the fact that it turns out to be the least relevant aspect of religious belief from the believer's point of view, who, as it were, is interested in the 'music' (the subjective aspect), not in its physical medium (the objectifiable aspect) of the phenomenon under consideration. Religious belief is 'at home' in the domain of subjectivity (or better to say, inter-subjectivity), and both the professional critics and professional defenders of religion who for the sake of their theistic or atheistic 'apologetics' bring to the fore the aspects of religious belief that are most 'objectifiable', miss the point of what religion is really about, and fight their battles somewhere on the outskirts of the 'garden of faith' which seems to be flourishing as well as ever, taking on new colours as generations of believers pass.

However, by affirming that science cannot confirm or disconfirm religious belief, or that science is of no help when it comes to making sense of our axiological consciousness, I do not mean to imply that our directedness towards the good, which makes us endlessly seek some good, and leaves us always dissatisfied, looking forward towards the realisation of some higher good not yet realised, could not be made sense of without reference to the ultimate good *religiously conceived*. On the contrary, every question that leads some people in the direction of a religious answer can be answered in

a non-religious way. Moreover, there is always an absurdist option available consisting in acceptance that the myth of Sisyphus expresses well the truth about the human condition, thus endorsing a 'tragic' vision that there simply exists an ill-fit between our way of perceiving the world – resulting perhaps from our evolutionary development - and what reality can actually offer. The absurdist answer recognises the fact of our axiological open-endedness, and our directedness towards the horizon of the ultimate good, while denying that there exists anything real and realisable that corresponds to our concept of the ultimate good. An absurdist - in a style of Camus - does not have to deny that many 'parts' of our human world, including morality, may be meaningful, but concludes that there is nothing contradictory in 'parts' being meaningful, while the 'whole' lacking ultimate meaning. Presumably, a typical non-religious and non-absurdist response to the issue of 'the ultimate good' is likely to take a form of some variation on the Aristotelian theme of 'human flourishing' that is in principle possible in the present human condition. But a religious mind finds all the non-religious options, including the Aristotelian one, unsatisfactory as ways of making sense of the riddle of our axiological consciousness, and conceptualises in religious terms the ultimate good as the telos of human life, most likely portraying the human condition in a way akin to Augustine's intuition expressed at the very beginning of his Confessions that portrays God as a kind of powerful 'magnet' of the ultimate good that draws the creatures to himself as the source and the end of all that is good: "for Thou hast formed us for Thyself, and our hearts are restless till they find rest in Thee."24

But how to describe this choice between various available 'options' in epistemic terms? Given that variety of worldviews may be coherent with the undisputable findings of science, and given that each of them may be internally coherent, it seems there can be no other *ultimate* basis of this fateful choice between various comprehensive worldviews – differing primarily in the way they define the ultimate good and the ultimate meaning of human existence – than the agathological imagination that leads various people to choose various 'agathological landscapes' as agathologically optimal, or to put it differently, as conceptualising in the optimal way the potentialities for good inherent in the human reality. One might ask, how does such a choice differ from a fideistic 'leap of faith' into epistemic darkness in which there is no knowledge to be had? There are a number of differences. Firstly, the choice is of such a nature that it is unavoidable: every human being that leads a life that is to some degree an examined life, has a comprehensive

²⁴ St. Augustine, *Confessions*, trans. by Henry Chadwick (Oxford: Oxford University Press, 1998), p. 24.

worldview which includes such elements as an understanding of the ultimate good and the ultimate meaning of one's existence, which cannot be settled in an objective scientific manner. Secondly, the choice is not really arbitrary, because it is a choice between various conceptions of the ultimate good, and it is in all probability a choice that is made in manner that could be best analysed in externalist terms, that is as only to a limited degree voluntary and conscious. Thirdly, the choice itself, and the life in accordance with that choice, is accompanied by this experiential element that we called the 'agathonic feeling' that serves as a kind of agathological conscience, which at the same time can be taken to be the only epistemic compass available in the realm of the good. 'Agathonic feeling' accompanies 'agathological choices' of every subject, whatever his worldview, but in the context of 'religious life', especially if it takes a form of intense spiritual practice leading to a progress on the path of metanoetic transformation, there will be many occasions to be aware of this 'inner testimony' manifesting itself in variety of subtle ways, indicating the position of the 'traveller' vis-à-vis the 'destination' of the 'journey', that is the Ultimate Reality identified with the ultimate good. Fourthly, and lastly, it is not the case that the agathological beliefs, whether leading to a religious or non-religious worldview, are immune to rational criticism, in the way the religious beliefs of a fideist might be, since it is presumed that in order to deserve to be called rational, religious beliefs have to constitute a part of a belief system that is internally coherent and coherent with the undisputed findings of science.²⁵

There is one more fundamental reason which can be clearly discerned in the religious literature as a sort of 'explanation' of the inclination of religious mind to prefer a religious conceptualisation of the ultimate good, rather than a non-religious one, but this 'reason' is not independent of the exercise of agathological imagination, but only reveals its inner logic, that is the logic of perfect being philosophy. It is the intuitive inclination to perceive the present human condition and the present circumstances of human existence as sub-optimal, unsatisfactory and disappointing. This inclination and its opposite capture well the fundamental difference between Plato's and

²⁵ It seems that the dynamics of this choice between various visions of the ultimate good, and the corresponding choice between various comprehensive worldviews, is somewhat akin to what Wittgenstein might have in mind when applying his idea of 'form of life' and the corresponding 'language game' to the case of religious belief. He also thought that the choice is being made between the *entire* 'doxastic ladders' or conceptual frameworks, rather than by considering the rationality of particular religious beliefs (e.g., belief in the Last Judgment). (Cf. Ludwig Wittgenstein, *Lectures and Conversations on Aesthetics, Psychology, Religious Belief*, ed. by Cyril Barrett (Oxford: Blackwell, 1966), pp. 53ff.)

Aristotle's visions of reality and their visions of a good life, which arguably influenced most of the metaphysical and axiological alternatives articulated by Western philosophy. Again, this difference can be accounted for by the differences in the way Plato's and Aristotle's agathological imagination has functioned, and there is little one could do by way of rational argument to settle the matter which of those two approaches is more 'rational'. This much is clear, a religious mind perceives as rationally unacceptable the discrepancy between teleology of our axiological consciousness presenting itself to us as categorical and therefore difficult to explain away by reference to social factors – and the practical impossibility of realisation of the good to which our axiological consciousness points as the *telos* of our existence. The impression that teleology identified in our mental life makes on a religious believer is being reinforced by the impression of teleology discerned in the workings of the universe ('the starry sky above me and the moral law within me'), so that when a naturalist suggests that the workings of the universe can at the end be explained entirely in efficient-causal way, a religious believer faces a choice between a causally closed view of reality accounted for by references to efficient causes and an essentially teleological view of reality. But being aware that science can never conclusively confirm the veridicality of the former view, a religious believer opts for the latter, since his agathological imagination leads him to embrace the latter option as agathologically preferable.

At the end, the choices between various conceptions of the ultimate good take a form of a postulate of practical reason which is an object of rational belief, but the reasons for the belief are of practical nature, that is pertaining to our acts of will and our actions. As such, they cannot be settled by science, because they pertain to the question about 'what ought to be' or 'what might be', not 'what is'. More generally, nothing more can be done to establish the rationality of agathological beliefs, whether held by theists or atheists, than – following Plato, Aristotle, Augustine, Aquinas and Kant – to point to the concept of the ultimate good as the transcendental condition of our axiological consciousness, and to see agathological beliefs as objects of Kantian 'rational faith' or, better, of rational hope. Thus, agatheism, while not being a form of fideism, is a form of 'sperantism' (from Latin *sperare* – to hope) – and so is every other comprehensive worldview, whether religious or naturalistic, because every worldview includes agathological beliefs that are objects of *rational hope*.

As to the evidential value of religious experience, conceived as an experience of the Divine presence, religious experience does play an important *supporting* role in establishing the rationality of agatheistic

first-order religious belief, but it cannot be treated as an independent ground, because it is itself grounded in the agatheistic religious belief. Mystical literature testifies that mystics experiencing the presence of God or the Ultimate Reality, form at least three types of belief: (a) the reality that is experienced is supremely real, (b) the object of experience is exceedingly good, and (c) the object of experience appears to transcend entirely the mundane reality in which the subject is immersed. In order to be able to identify the 'object' of an experience as God or the Ultimate Reality, rather than as something else, the mystic has to possess an agatheistic concept of the Ultimate Reality prior to experience. In a different place I argued at length – pace Alston - that plurality of mystical traditions does not contradict the possibility of authenticity or veridicality of such experiences occurring in the context of a variety of religious traditions.²⁶ I argued in favour of the coherence of a view I called 'mystical inclusivism' which (1) allows for the possibility of veridical experience of God or the Ultimate Reality in a variety of religious traditions, but (2) avoids the radical revisionist postulates of Hickian pluralism, akin to the revisionism advocated by Thornhill-Miller and Millican, and (3) it leaves open the question whether the creed of any specific tradition is a better approximation to the truth about the Ultimate Reality than the creeds of other traditions, thus creating a space for a kind of pan-inclusivism as a form of religious inclusivism which acknowledges that everyone else is also an inclusivist. Such pan-inclusivism is fully coherent with the epistemology of agatheistic religious belief presupposed in this paper that accommodates religious diversity without advocating abandoning first-order religious belief.

CONCLUSION

The possibility of a rational agatheistic religious belief solves Thornhill-Miller's and Millican's Common-Core/Diversity Dilemma: "That in so far as religious phenomena (e.g. miracle reports, religious experiences, or other apparent perceptions of supernatural agency) point towards specific aspects of particular religions their diversity and mutual opposition undermines their evidential force; while in so far as such phenomena involve a 'common core' of similarity, they point towards a proximate common cause for these phenomena that is natural rather than supernatural." On the agatheistic picture, the above dilemma rests on a problematic view of the nature and epistemic grounds of religious belief which I have tried to

²⁶ Cf. Janusz Salamon, "Light Out Of Plenitude: Towards Epistemology of Mystical Inclusivism", *European Journal for Philosophy of Religion*, 2 (2010), pp. 141-175.

disclose. Firstly, the 'religious phenomena' to which our authors point to do *not* constitute the main epistemic ground of first-order religious belief. Indeed, they cannot constitute such ground without being dependent on the fundamental agatheistic religious belief that identifies the Ultimate Reality with the ultimate good and which itself is *not* grounded in any such 'religious phenomena'.

Secondly, to the extent such phenomena are at all called upon by religious believers in the capacity of 'evidence' for the existence of the 'object' of religious belief – and they rarely are – they do not and can not "point towards specific aspects of particular religions", if by this we mean establishing the truth of particular religious beliefs about the Absolute and its relation to the world, since no empirical data can confirm religious beliefs about the Absolute held by adherents of any religions. Any such empirical data, in order to be interpreted as evidence of anything related to the Absolute, presupposes the possession by the subject of an *a priori* concept of the Absolute which cannot itself be derived entirely from empirical data. In practice, such 'religious phenomena' play a different role than Thornhill-Miller and Millican ascribe to it, namely as a source of motivation, encouragement and reassurance on a path of spiritual development leading to metanoetic transformation, but this role presupposes a pre-existent religious belief, rather than grounding it. So conceived, religious experiences or other such 'religious phenomena' cannot be 'opposed' to each other, and nothing of epistemic significance follows from their diversity.

Thirdly, the presupposition of the 'common core' in diverse religious traditions offers no problem, if the fundamental agatheistic religious belief constitutes such a 'common core' as it arguably does in reality. 'Religious phenomena' of the kind Thornhill-Miller and Millican refer to do not and can not constitute a 'core' of any religious tradition, therefore similarities or dissimilarities between such 'religious phenomena' are of secondary relevance for the epistemology of religious belief. As to agatheistic religious belief as the 'common core' of diverse religious belief systems, such belief cannot be explained away by reference to any 'natural cause', proximate or otherwise. And as to the possibility of explaining away all religious experiences by reference to proximate causes, William Alston argued convincingly in his Perceiving God that an ability to identify a proximate cause of a religious experience does not exclude the possibility that this experience is a veridical perception of the Divine presence, since God may feature further back in the chain of causes. When I see a tree, there are proximate causes of my perceiving the tree other than the tree itself, and specifying *how* proximate a cause of a perception has to be – especially when

the Divine presence is supposed to be the object of experience – to make the perception veridical cannot be settled by way of philosophical argument. In short, we have a 'common core' and diversity, but no dilemma.

By now the connection between agatheistic vision of religious belief and the global ethical dialogue should be clear. Agatheism sees religious belief systems as grounded in the exercise of agathological imagination that struggles to give an expression to our concern with human values and human good. Thus, agatheism locates religion not in the realm of extraordinary 'religious phenomena' that might be perceived as exotic and irrelevant by an atheist, but rather in the sphere of central human concerns which bother every human being. In this sphere all human beings are *on par*, because science cannot settle the most vital matters of the ultimate good and the ultimate meaning of human existence. It is also the sphere in which human beings – communicating and justifying to each other their agathological beliefs – have to find the ways to live a solidary life on a global scale, mindful of the global ethical imperative to act so as to promote the chances of all to realise in their life the potentialities for good inherent in human reality.

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Robert McKim. On Religious Diversity. Oxford University Press, 2012.

In eight chapters McKim explores exclusivist, inclusivist, and pluralist responses to religious diversity and assesses these responses in the light of religious ambiguity. Two of these chapters regard exclusivism and inclusivism about truth. Another two chapters regard exclusivism and inclusivism about salvation. There is one chapter on pluralism and one chapter on religious ambiguity together with an introductory chapter and epilogue. McKim's explorations stem from his identification of an increasing awareness of other religious traditions among believers and an ensuing shifting of attitudes. He takes the case of American evangelist preacher Billy Graham to make his point.

McKim suggests twelve different things alethic exclusivism could mean and thus rejects giving a single definition of alethic exclusivism preferring instead to say that it refers to a range of views. So, on the one end of the scale we have closed alethic exclusivism: 'Our tradition is entirely right, and all other traditions are entirely wrong' (p. 14). On the other end of the scale we have the more highly qualified attitude expressed by open alethic exclusivism:

The claims of our tradition are true, or most of them are true, and overall we do best in terms of truth; other traditions are correct when they accept our true claims; and they are mistaken when they reject our true claims; and their claims are generally mistaken. (pp. 30-31)

Alethic inclusivism incorporates some of the sentiments expressed in open alethic exclusivism but in addition also accepts that others actually do fairly well in terms of truth or that it might even be possible to learn from them.

With regard to salvation, McKim distinguishes between views on the means of salvation and views on the beneficiaries of salvation. Then there is the issue of whether particular beliefs are required for salvation. While a salvific exclusivist is sure of the means and/or the beneficiaries of salvation, there are a number of ways a salvific inclusivist can be less certain. A salvific inclusivist could affirm that there is only one means of salvation while not excluding those who unwittingly affirm it or who are not fully aware of what they reject. Alternatively, a salvific inclusivist could affirm that there is more than one means of salvation but that one means of salvation is most effective. McKim gives special attention to a Vatican statement, *Dominus Iesus*, and how it exemplifies some of the issues surrounding inclusivism about salvation which McKim discusses. McKim suggests those traditions which claim a special position for themselves deserve suspicion.

In his chapter on pluralism, covering both issues of truth and salvation, McKim continues to distinguish between different positions which are often grouped together. He also distinguishes between convergent and nonconvergent pluralism. Convergent pluralism suggests that there can be contradictions between the beliefs of different religious traditions whereas nonconvergent pluralism denies this due to being based on religious relativism. McKim also discusses John Hick's pluralism by following the well-trodden path of criticising the much maligned feature of Hickean pluralism, the Real. According to McKim more sense could be made of the Real if it was morally positive rather than morally neutral, after all, how else is it supposed to aid moral transformation if it is not itself moral? However, one wonders whether the Real has caused too much confusion and whether to understand properly what Hick envisaged by his notion of the Real we need to keep in mind that it was primarily supposed to be a posit which helped explain the success of religious experience. Another interesting discussion in the chapter is how the elephant and duck-rabbit motifs can give rise to two different types of pluralism. With the elephant motif we have a number of groups each misled about the elephant in its entirety due to each knowing only about a part of the elephant. On the other hand, the duck-rabbit motif tells of two different yet equally correct views.

Chapters 2 to 6 see McKim refusing to restrict exclusivism, inclusivism, and pluralism to definitions. This is sensible given his concern with exploring the field, yet listing the shared features of each *ism* would not have been harmful. In Chapter 7, 'On Religious Ambiguity', McKim defends his view that religion exhibits extremely rich ambiguity, as opposed to merely simple or rich ambiguity. This claim is supported by pointing to ambiguity in the body of data relating to the existence of God. It is suggested that the extent of ambiguity in other bodies of religious data is to be determined on a case-by-case basis. Chapter 8, 'Epilogue: Religious Diversity in the Shadow of Ambiguity', sees McKim outline a very open, if not syncretic, form of religious exploration which he calls

the 'global approach'. This approach is to be taken all the more seriously given religious ambiguity. McKim also outlines an approach to salvation which he calls 'reclusivism', an approach which recommends being open minded about the extent to which salvation is available outside a given religious tradition.

Much of McKim's work has been seen before but the arrangement in one volume does give rise to some new material, for example, in the epilogue. McKim is notably non-committal in his work and is even careful to avoid claiming that he has *shown* religion to exhibit extremely rich ambiguity. However, not committing to a particular view on religious truth or salvation does tell of McKim's own eagerness to explore the religious traditions with an open mind and to evaluate them by means of how open they are to this type of exploration and to each other, as well as to religious ambiguity.

The prolegomena approach to religious diversity has also been seen before in Peter Byrne's *Prolegomena to Religious Pluralism: Reference and Realism in Religion* (Basingstoke: Macmillan, 1995). While Byrne's work was grounded in Rom Harré's philosophy of science and Michael Devitt's philosophy of language, McKim's work is grounded in his study of the religious traditions. Clearly written with many interesting religious anecdotes, *On Religious Diversity* will prove to be a helpful book for anybody wishing to think through an epistemological and soteriological response to religious diversity.

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Mikel Burley. Contemplating Religious Forms of Life: Wittgenstein and D. Z. Phillips. Continuum, 2012.

Mikel Burley's book is an ideal volume for those who wish to understand the views of Wittgenstein and D. Z. Phillips on the philosophy of religion. What strikes one initially is the opening sentence of the introduction: 'This book is about the work of two men whose contributions to the study of religion over the last hundred years have been pre-eminent: Ludwig Wittgenstein (1889-1951) and D. Z. Phillips (1934-2006).' Burley is right in choosing these two philosophers, but Phillips would

have been embarrassed with this introduction. He would see himself as a disciple of Wittgenstein rather than his equal, though it is true that Phillips was considerably more – though not exclusively – concerned with religion during his life than was Wittgenstein. Another way of putting this is to say that, were it not for Wittgenstein, Phillips could not have written what he did. Even so, it would be difficult to overstate the significant effect that Phillips has had on the world of philosophy of religion, both through his extensive publications and through his contributions to the many conferences that he attended and organised in Europe and the USA.

Structurally, the book consists of two equal parts, with three chapters devoted to each of the philosophers, followed by a concluding chapter. The origin of the book lies in papers or presentations previously published and delivered between 2007 and 2012. Burley's exposition of Wittgenstein and Phillips is largely apologetic, but not without some criticism, which occurs mainly in one particular chapter on Phillips. The views of each thinker are expressed with clarity, and the views of their opponents presented without distortion. Most of my remarks will be devoted to the part on Phillips.

Wittgenstein's and Phillips' approach to philosophy is 'contemplative', by which is meant that the emphasis is on understanding the meaning of religious language as it is found in specific contexts, in contrast with the truth of its statements, which occupies the interest of most philosophers of religion. Burley brings out this difference well by discussing examples, which is the meat of the Wittgensteinian method. Cool contemplation may be a pastime for some and a spiritual activity for others, but for both thinkers it is the only correct way of doing philosophy. It requires one to enter the world of another, in order to do justice to what is going on in any particular practice; yet, at the same time, the method requires that one 'leave everything as it is'. Phillips calls this position philosophy's 'cool place'. Burley agrees with this approach, but he thinks that Phillips does not always stick to his brief, in particular when he describes some beliefs as 'shallow' or 'deep', which makes his position *qua* philosopher warmer than he intends.

Wittgenstein said little about Christianity, so Burley has to confine himself to Wittgenstein's writings on the work of Frazer's *Golden Bough*, where he brings out the difference between the former's attention to description and contrasts it with the latter's attention to purpose and explanation, especially in the understanding of 'ritual'. The writings of

some sympathisers of Wittgenstein are considered, such as Peter Winch and his much-discussed paper, 'Understanding a Primitive Society', as well as the views of Frank Cioffi and Howard Mounce. In chapter 2, 'Absolute Safety', Burley finds a difference between Wittgenstein and Winch on absolute safety in connection with religion and morality. In chapter 3, Burley provides a long but useful and telling criticism of Severin Schroeder's claim that Wittgenstein (and Phillips, it would follow) advocates an expressivist view of religious belief. This occupies some 24 pages.

In Part 2, Burley rightly begins a discussion of Phillips with a chapter entitled 'Beyond Realism and Non-Realism'. Rightly, because it is this topic that occupies the attention of Phillips' dissenters, who usually want him to come clean on whether he is a realist or a non-realist. This is fully evident in Kai Nielsen's and Phillips' jointly authored book, Wittgensteinian Fideism, and also in the writings of John Hick, Phillips' predecessor at Claremont Graduate University. Burley's defence throughout is that neither Wittgenstein nor Phillips can be fitted into either pigeon-hole, in spite of the impatient attempts of their opponents. He finds that the latter share a common error, viz., that they do not consider religious beliefs in their natural habitat. As Wittgenstein puts it: 'What we do is to bring words back from their metaphysical to their everyday use.' (Philosophical Investigations, § 116) But Phillips says that, even if he were to use their language of realism, non-realism, evidence, proof, it would not mean that he would be any closer to their views, for the meaning of these words would differ in different contexts. For Phillips, his opponents' two positions do not exhaust the possibilities. Beside the realism of Hick and the non-realism of Cupitt, there is the possibility of seeing the language of religion as sufficient in itself. The pictures we have in religion have a meaning which does not depend on some external reality. Nor is that meaning an attitude dressed up in realist clothes. As Wittgenstein puts it, the truth is in the pictures. This is sometimes a difficult idea to get across, and one which has led some to ask: if the idea of God lies in the picture, does God die with the disappearance of that picture? The reason why this point of view is so implausible to non-philosophically inclined Christians is that they take Phillips to be guilty of some sleight of hand in translating such events as the nativity story, the miracles, the resurrection and the ascension, into non-historical language. Yet Phillips at times claims that far from changing what the ordinary believer believes he is truly representing not revising their beliefs. So far, Burley goes along with Phillips. But in the next chapter, 'Contemplating Eternal Life', he distances himself from some of Phillips' views. This occurs mainly in the section 'Against Survival'. Here, Phillips appears to have touched a raw nerve in Burley, who now employs a critical vocabulary that one would not have expected to find in his phrase book. He sees 'danger in Phillips' approach' (p. 112), which is too quick 'to dismiss temporal conceptions of immortality' (p. 111), argues that Phillips can lack 'critical evaluation' (p. 110), is guilty of 'philosophical hubris' (p. 114) and, worse still, fails to examine 'the lives of people within the relevant cultures themselves' (p. 114). Physician heal thyself! Is Burley having a change of heart towards Phillips? What has raised his temperature is that the latter has confined himself to Christianity - as if that would be sufficient to yield an understanding of religious beliefs in general. The issue in question is the matter of reincarnation. Up to this point, Burley - along with Phillips - has shunned the metaphysical and the temporal features of the after-life, but he finds that Phillips' views are wanting when one considers the ideas of Hinduism and Buddhism. Burley reminds us that we cannot ignore 'the beliefs of many millions of Hindus and Buddhists' (pp. 113,114). Strangely, Burley was not so ready to raise the same objection concerning the belief – addressed in the previous chapter – of vast numbers of Christians in the afterlife. Phillips can make the views of Christians look silly when he presses on them positivist questions relating to personal identity, such as 'What is a baby or an octogenarian going to look like in heaven?' What, then, has happened to Wittgenstein's advice - usually in Phillips' repertoire - that what is ragged must be left ragged? Those who believe that life continues hereafter may stammer and stumble when a philosopher asks for details of that continued existence. But does not Burley's own discussion of reincarnation - and in spite of what he has said in the previous chapter - propose the continued existence of souls as a form of personal continuity post mortem? Has not the metaphysical reappeared, even though John Haldane's position that the metaphysical is not necessarily in opposition to the religious was dismissed earlier? Lest it be said that Phillips has philosophers of religion in his sights, rather than the ordinary believer, it is worth pointing out that such philosophers are not like particle physicists who speak in their academic capacity of tables as not being solid, but who are quite happy to complain (without contradiction) to a waiter in a restaurant that their table is not steady. For many philosophers of religion are ministers of the cloth who use the same language in the study as at the altar. Is there a tension between Burley's view of the Christian's idea of the after-life and that of the Buddhist and Hindu?

Burley goes on to discuss Phillips' moral objection – influenced by Simone Weil – to the belief in a temporal view of the afterlife. This belief is seen to have a corrupting effect on our moral life, in that it is thought to weaken the moral effect of the finality of death, as it goes along with a compensatory view of the life hereafter, when injustices can be recompensed. But surely the Day of Judgement is not just meant to compensate for one's sufferings on earth, it also is a time when the integrity of one's life on earth is judged. It is a time of reckoning – hardly a comforting thought. In fact, one could claim that a belief in the finality of death could be seen as a form of escapism. Perhaps Burley's criticism of Phillips here could be summed up by saying that the latter has spoken of *the* grammar of immortality, rather than *a* grammar of immortality.

Phillips studied literature in university before he turned to philosophy, and he retained an interest in it throughout his life. Burley's chapter 'Philosophy of Religion through Literature' (ch. 6) is unique in revealing the extent to which Phillips resorted to his knowledge of literature to expound and illustrate his understanding of religion. In this chapter, Burley discusses Phillips' thoughts on Larkin, Tennyson, Beckett, C. S. Lewis, Edith Wharton and Simone Weil, but he thinks that, at times, Philips can be charged with interpreting their ideas to fit with his own. This is an important chapter in the study of Phillips' dependence on literature in his thinking.

Some final comments on important omissions. There is little mention of the label that Kai Nielsen pinned on Phillips, which stuck to him however often he rebutted it, viz., that of being a *fideist*. I was also surprised not to find in Burley's book much more about the influence of Rush Rhees on Phillips. Phillips regarded Rhees as his most influential teacher, edited 16,000 pages of Rhees' manuscripts, published a number of books from these, and, of course, corresponded with him. It is a pity, too, that there is no reference to the excellent volume *D. Z. Phillips' Contemplative Philosophy of Religion* (Aldershot: Ashgate, 2007), edited by Andy Sanders, in which six philosophers of religion present their criticisms of Phillips, followed by what turned out to be his final responses to his opponents. Regrettably, Phillips did not see the publication of this book. In spite of these omissions, Burley has presented

us with an excellent volume, which will help continue to keep alive the huge contribution that Wittgenstein and Dewi Phillips have made to the study of philosophy of religion.

CHAD MCINTOSH

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Linda Zagzebski. *Omnisubjectivity: A Defense of a Divine Attribute*. Marquette University Press, 2013.

When I first read Thomas Nagel's 'What Is It Like To Be A Bat?' immediately I wondered, 'Does *God* know what it's like to be a bat – or *me*?' In her 2013 Aquinas lecture, Linda Zagzebski answers in the affirmative, arguing that God has 'omnisubjectivity', the 'property of consciously grasping with perfect accuracy and completeness every conscious state of every creature from that creature's first person perspective' (p. 10). Two distinct but intersecting tracks can be discerned throughout this small book, one defensive and the other exploratory. The former defends the possibility of omnisubjectivity by advancing a model that seeks to demonstrate *how* God can be omnisubjective; the latter explores the attribute's scope, relation to other divine attributes, and practical significance to believers. Consider each in turn.

It seems impossible that anyone but me could know what it's like *for me* to see red or taste a strawberry. A friend and I could see and taste the same strawberry, but we could never have qualitatively identical experiences, which seem *essentially* private to our own conscious perspectives. But if this were so, argues Zagzebski, God would not know all there is to know about creation. Even if God were omniscient and knew all the objective facts about the world, 'perhaps the most important feature' (p. 13) would be left out: the what-it-is-likeness of creaturely experience. This is unbecoming of the Christian God who, from an Anselmian perspective, is not merely omniscient but *cognitively perfect*. God must therefore 'grasp what it is like to be his creatures and to have each and every one of their experiences' (p. 15).

Zagzebski considers two models of how God could 'grasp' creatures' mental states. According to the first, God's consciousness merges or overlaps with creatures' consciousnesses. So when I see and taste

a strawberry, God literally sees and tastes it exactly as I do. Indeed, on this model, my and God's conscious experiences aren't really distinct at all. For this reason Zagzebski thinks this model is more at home in panentheistic or process thought, which, in contrast to more orthodox thought, is comfortable blurring the Creator/creature distinction. In fact, she rejects any model - call it a 'sharing model' - that requires that either (a) God literally share the selfsame mental state with a creature, or (b) creatures to be in any sense 'part of God'. Zagzebski's dismissal of sharing models as unorthodox, however, may be too quick. One might for instance adopt an Alstonian model of the indwelling of the Holy Spirit, according to which 'there is a literal merging or mutual interpenetration of the life of the individual and the divine life, a breaking down of the barriers that normally separate one life from another' (see William Alston, 'The Indwelling of the Holy Spirit', in Divine and Human Language (New York: Cornell University Press, 1989), p. 246). Alston likens 'indwelling' to a partial merging or sharing of two individuals' interior lives such that 'when you are moved by a scene I will thereby be moved with your feelings; when you find a remark distasteful I will thereby find it distasteful' (ibid.).

Nevertheless, Zagzebski proposes 'the model of total empathy' as a corrective to sharing models. Unlike human empathy where one adopts by imagining – albeit imperfectly – another's mental states, God is capable of 'perfect total empathy', or the ability to acquire 'a complete and accurate copy of all of a person's conscious states'. Zagzebski continues: 'Since your state is from your first person point of view, God grasps it as if it were from your first person point of view, but in an empathetic way, never forgetting that he is not you.' (p. 30) Because the mental states God acquires empathetically are copies - albeit perfect ones - of a creatures' mental states, this model sidesteps the pitfalls thought to afflict sharing models. However, it's not clear to me how exactly we are to understand the modifiers 'perfect' and 'complete' in describing God's copied states. One understanding would threaten to collapse the perfect empathy model into a sharing model. In Parmenides 130-134d, Plato argues that no object in the sensible world can *perfectly* resemble the Form of which it partakes, for if it did, it would just be the Form itself. Similarly, Frege argued against the correspondence theory of truth on the grounds that perfect correspondence between thought and reality - a relation he thought essential to the theory - would require thought and reality to be identical. The reasoning seems straightforward: compare any two

things, *x* and *y*, where *y* is a copy, resemblance, or representation of *x*; if *y* differs from *x* in *any* respect, then *y* cannot be a *perfect* or 'complete' copy of *x*, for *y* does not copy *x* at least in that respect. However cogent this reasoning is, at the very least something more should be said about how we are to understand 'perfect', 'total', and 'complete' as modifiers.

The model of total empathy, according to Zagzebski, shows that omnisubjectivity is possible. This conclusion alone is enough to diffuse Patrick Grim's well-known argument that God cannot know first-person indexical propositions expressed by creatures. But she argues further that God *is* omnisubjective, a fact implied by other divine attributes, principally omnipresence. Zagzebski takes Aquinas's description of omnipresence as all things being 'bare and open to [God's] eyes' almost literally, meaning 'there is no aspect of the created world about which God does not have intimate acquaintance' (p. 19), including the interior lives of creatures. God does not just know *that* you are anxious; God is *present in* your anxiety.

Having defended the idea that God can be and is omnisubjective, Zagzebski explores some of its implications. Zagzebski first ponders the scope of omnisubjectivity, proposing that in addition to grasping creatures' actual subjective states, God grasps creatures' counterfactual subjective states, i.e., 'what it would be like for any possible conscious being to have any conscious state possible for that being' (p. 36). Without counterfactual subjective states of His own, God could not know what it would be like for one world to be actual as opposed to another, severely limiting His sovereignty. Further, without knowing what it would be like for creatures to experience joy, sorrow, suffering, etc., God's creating them is apt to come across as an insensitive and premature gamble.

Zagzebski also considers the apparent conflict between omnisubjectivity and the traditional divine attributes of timelessness and impassibility: because creaturely experience is marked by temporality, an omnisubjective God must know what it's like to have temporal experiences (e.g., anticipation). But the essentially temporal character of such experiences makes it hard to see how God could know what they're like without being in time. Here Zagzebski appeals to an analogy, observing that when empathizing with characters in a novel, 'rarely do we imagine the character's experience in real time' (p. 42); the character's experience can be drawn out or compressed dramatically. Similarly, God could empathize with someone's extended temporal experience in 'a single moment' or 'in a flash' (p. 43). But the reviewer wonders how we

are to understand these locutions, if not temporally. Apart from a tenseless paraphrase, Zagzebski's defence seems incomplete. Zagzebski is less optimistic about the compatibility of omnisubjectivity and impassibility, as the former requires that God be affected *ab extra* by creaturely mental states. She softens the blow by suggesting that omnisubjectivity 'comes closer to expressing what is included in perfection and the implications of prayer and worship' (p. 45).

Turning to these more practical implications, Zagzebski effectively demonstrates how omnisubjectivity illuminates how God 'hears' prayers and comprehensively loves us (love being premised on a kind of intimate personal knowledge. Cf. Gen. 4:1; 1 Cor. 8:3; 13:12). Omnisubjectivity can also bring more clarity to what it means to 'know and experience God personally,' language many find frustratingly vague. For example, we might think of personal knowledge or experience of God as our awareness of God's awareness of us, like 'when someone is empathizing with us and we are able to detect the sharing of our emotion' (p. 52).

Some might worry that omnisubjectivity implies too intimate a knowledge of creatures. For example, God might know what it's like for me to feel sad, but does God know what it's like for me to sin? Would this 'contaminate' God's perfect holiness and purity? Only if an empathetic representation of an immoral conscious state is itself immoral, answers Zagzebski. But when we empathize with evil people or fictional characters, it hardly follows that we are thereby immoral. Reading a biography of Hitler might enable us to empathize with his anti-Semitic attitudes and feelings, but we still respond to his attitudes and feelings as ourselves. Indeed, seeing things from a miscreant's point of view facilitates fair judgment. For this reason Zagzebski thinks it not unlikely that God must empathize perfectly with sinners in order to exercise perfectly righteous judgment. Zagzebski does not address a related worry, however. Plausibly, some creaturely knowledge ought to be private. For instance, I know what it's like to have intimate relations with my wife. And, intuitively, only I ought to know that. But omnisubjectivity implies that God also knows what it's like for me to have intimate relations with my wife! At the risk of sounding crass, the example effectively captures a consequence some might find alarming, to say the least (Zagzebski's response, relayed in personal communication: 'get over it.').

One additional worry and one comment. Zagzebski maintains that the intimate Creator/creature relationship secured by omnisubjectivity helps to distinguish the Christian conception of God from the impersonal God of the Philosophers. But I wonder if the distinction is fully carried out. The Christian God is Tri-Personal. But now the claim that God is omnisubjective is taken to a new level (two new levels, to be precise). If each Person of the Trinity has His own subjective mental states, being cognitively perfect, each must empathize perfectly with the others' mental states. The Father, for example, must know what it's like for the Son to suffer and die on the cross, which may raise patripassianism concerns. Further, in addition to knowing what it's like for me to see red, would the Father also know what it's like for the Son to know what it's like for me to see red, then the Son must know what it's like for the Father to know what it's like for the Son to know what it's like for the Father to know what it's like for the Son to know what it's like for me to see red, and so on.

Finally, I would like to have seen Zagzebski interact with Yujin Nagasawa's God and Phenomenal Consciousness (Cambridge: Cambridge University Press, 2008), which presents a view of omniscience according to which omnisubjectivity is impossible. Nagasawa argues that if omniscience is understood in terms of epistemic powers, and if God does not - as a matter of metaphysical necessity - have the epistemic power to know what it's like for me to see red, then this counts no more against God's omniscience than the paradox of the stone counts against God's omnipotence. In other words, cognitive perfection does not require God to be omnisubjective any more than being perfect in power requires universal possibilism, because what can be done delimits what can be known (Nagasawa's account is especially relevant because it is consistent with thinking cognitive perfection entails having more than propositional knowledge). It is puzzling why Zagzebski doesn't consider this view because it is ably represented in Thomistic and Anselmian traditions, with which she has much sympathy.

Omnisubjectivity: A Defense of a Divine Attribute is a fast and fun read, but leaves many interesting areas along the defensive and exploratory tracks open for further investigation. I very much hope to see a longer, more technical analysis of this fascinating attribute in the future, but the present treatment is in keeping with the stimulating and exploratory character of preceding Aquinas lectures.

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Evan Fales. Divine Intervention: Metaphysical and Epistemological Puzzles. Routledge, 2010.

How does God do things? What can God know? Do we have experience of God? These are the three questions that motivate Evan Fales's sometimes frustrating, sometimes fascinating book, *Divine Intervention: Metaphysical and Epistemological Puzzles*.

Fales isn't clear on whether or not he believes in God. Superficially, it sometimes sounds like he does, when for example he asks questions like: 'How exactly *does* God make things happen in our world?' (p. 3) But other times, it seems like he doesn't, when for example he presents a problem regarding God's omniscience, and says that 'the theist' does not have 'an easy escape' (p. 70).

There's a sense in which Fales's secrecy regarding his own beliefs is fine: atheists and theists can discuss the philosophical issues equally well; one doesn't need to put one's cards on the table before doing philosophy of religion. But the problem is that it's sometimes hard to figure out where Fales is going with his discussion – he often raises worries, says that the discussion is inconclusive, and then moves on. Perhaps that's all he's trying to do, but one gets the sense that there's more going on. Specifically (both from reading this book and reading Fales's other work), I gather that he's more on the atheist side of the atheist/theist spectrum, and he's trying to raise worries for theistic belief. (This comes out most clearly toward the end of the book, as I'll discuss below.)

While Fales doesn't quite present his book this way, I see it as divided into three parts. The first part discusses metaphysical issues, involving how God could interact with the world. The second part involves epistemological issues, such as whether God could be omniscient, and whether God faces sceptical worries. The third part critiques the argument from religious experience for the existence of God. I'll discuss each of these parts below. Some foreshadowing: the metaphysics part is sometimes frustratingly inconclusive and sometimes interesting, the religious experience part doesn't have much new, and the epistemology part is exciting and thought-provoking.

First, metaphysics. Is it even possible for a nonphysical being like God to interact with the physical world, and if so, how does God do it?

Fales discusses various views of the nature of causation, to try to figure this out, but concludes:

We know as yet too little about causation, as I judge, to come to reasonably definitive conclusions about the nature, or even the possibility, of divine interventions in the physical order. (p. 154)

He also takes up the question of whether God establishes what the laws of nature are, and the question of whether the laws, once established, could be suspended. His conclusion is similarly inconclusive:

We do not have firm enough a grasp upon laws, and perhaps also on space and time, to arrive at clear determinations of the possibilities here. (p. 154)

Fales's positive contribution here is 'to bring into relief the inadequacy of the *fiat lux* model of divine activity, which has too commonly been taken to settle the matter' (p. 36). According to the *fiat lux* model, God creates just by commanding. But Fales rightly asks a question: 'what is the connection between God so commanding, and its coming to pass?' (p. 33) It appears that this connection is a causation relation, and needs a corresponding law of nature governing this causal relation. But where does that law of nature come from? It's hard to see how this law of nature could come from God's command, on pain of vicious regress.

The other issue in metaphysics Fales discusses is the relationship between God and time. Here the discussion is less inconclusive, but I'm not happy with Fales's conclusion. He writes:

If there were a universe lacking a preferred reference frame [and our universe is such a universe, according to the standard interpretation of Einstein's theory of relativity], there would be no facts of the matter of how God relates temporally to that universe – when He acts in that universe, which of His actions are simultaneous, or what the temporal relationship is between His willing that a certain event occur in that universe, and the time of its occurrence. (p. 56)

Well, in a universe with no preferred reference frame, the standard view is that the eternalist theory of time is true. According to eternalism, the universe is a four-dimensional space-time system, with no objective facts about which events are past, present, or future, and no objective flow of time. In such a universe, there are no objective facts about simultaneity for events that are located in different regions of the universe – but it is reasonable to hold that events that are co-located are simultaneous. My

view is that, in an eternalist universe, we need to take God's omnipresence seriously – when God acts in the universe, he is co-located with the physical region of spacetime that contains the effect of his act. Since God sustains the universe in existence, God is co-located everywhere, and God's actions are simultaneous with the effects of God's actions. *Pace* Fales, I don't see a problem here.

Let's turn to the third part of Fales's book, saving the most exciting second part for last. In the third part, Fales critiques the argument from religious experience for the existence of God. Specifically, Fales argues that there are no adequate criteria distinguishing veridical mystical experiences from illusory ones. He also argues that the account of mystical experiences that maintains that they are somehow caused by God is a less satisfactory account than that which holds that they can be accounted for naturalistically, via the resources of anthropology and neurophysiology. Fales concludes that mystical experiences do not provide anyone with good evidence for supernatural reality.

Fales is savvy enough to recognize that simply providing a naturalistic explanation for mystical experiences isn't enough to disqualify mystical experiences as evidence of the supernatural – it could be that the naturalistic explanation correctly says, for example, that the mystical experiencer is in a certain brain state, while there is also a correct supernatural explanation of why the experiencer is in that brain state. But Fales goes on to argue that, for the case of mystical experiences, the anthropological and neurophysiological explanations are better than just the supernatural one, and attempting to add a supernatural explanation to the anthropological and neurophysiological explanations diminishes the force of the naturalistic explanations.

Overall, I didn't find that much philosophically new in Fales's critique of the argument from religious experience. The most interesting parts were his appeals to anthropology and neurophysiology. On the anthropology side, Fales discusses the work of I. M. Lewis, who argues that certain social contexts are more likely to produce people who act as mystics, and claim to have mystical experiences. On the neurophysiological side, Fales points out that certain types of mystical experiences can be generated by electrical stimulation of parts of the brain. He puts forth the interesting hypothesis that people who are more prone to having religious experience have thinner myelin sheathing on their nerves in the temporal lobe, so that electrical signals can jump from one axon to neighbouring ones, thus releasing an avalanche of nerve firings that give

rise to the feeling of a mystical experience. Fales maintains that such naturalistic accounts cannot be happily supplemented with an appeal to God as the cause of mystical experiences.

Let's turn, finally, to the second and most exciting part of Fales's book, his discussion of epistemological issues. Fales gives two arguments for the view that God is not omniscient. His first argument holds that God is 'impassible', and hence that God can't know the contingent facts that could only be known by perceiving the world. Fales doesn't define 'impassible', and while it often means 'incapable of suffering or feeling pain', I take from context that Fales means something stronger. He writes:

God, it is generally supposed, is impassible. And that means that no created object is causally responsible for anything that happens to God: *nothing* ever *happens to* God. (p. 71)

Fales argues that, because God is impassible, God can't perceive the world, and hence can't know contingent facts about the world. This is, clearly, a result that traditional theists would not be at all happy with. How would they respond?

One response Fales considers is for the theist to hold that God knows everything about the world because God knowingly wills it, and God knows that what God wills is fulfilled (p. 72). But Fales points out two interesting difficulties for this response. One difficulty is: how does God know that God's will is successful? God can't know it by way of empirical investigation, under the assumption that God is impassible (in Fales's strong sense that God is not causally affected by the world). Perhaps God could know that there is a law-like connection between his will and the effects of his will via a priori means. But Fales says that 'it is not easy to see ... how a law is the sort of thing that could be known *a priori* (even by God)' (pp. 72-3).

The second difficulty Fales raises for the response that God knows everything about the world because God knowingly wills it is that (according to Fales) God does not will everything that happens in the world – if something like the standard interpretation of quantum mechanics is true, then fundamental physical processes are indeterministic. Fales doesn't go into this in detail, but I think this raises an interesting concern about God's control over what happens in the world. For example, according to quantum mechanics, there's a non-zero chance that we could all die in the next second, if for example enough of our particles scatter to distant regions (which is allowed by quantum

mechanics, since the wave function tails for a particle extend to infinity). Presumably God is not simply leaving it up to chance that we continue to exist; this makes me think that God is at least willing to exert his will over even indeterministic events in the universe.

All this is in response to Fales's argument that God is not omniscient because he's impassible. I think that the most promising way to respond to Fales's argument is simply to hold that God is impassible only in the sense that he doesn't suffer, not in the sense that he's not causally affected by the world. Fales recognizes this option, and his counterreply is simply to move on to his second argument for the claim that God is not omniscient.

Fales's second argument for the claim that God is not omniscient applies the argument of an epistemological sceptic to God himself. Specifically, Fales asks, how does God know that he is not being deceived by an evil demon? Fales's discussion here is sophisticated and intriguing, and I won't be able to do it justice. Fales's overall point is that 'God Himself has no reasoned response to the sceptical worry that His cognitive faculties might be in some way defective' (p. 83). God can't know that they aren't defective through his own activity – even if he decided to banish epistemological evil demons from the world, how could be he be certain that he had successfully done so? Fales says that, for God to be omniscient, 'God must just set aside the conceptual possibility raised by the sceptic' (p. 84). But in doing so, God isn't being perfectly rational. Fales concludes that God can be either omniscient or perfectly rational, but not both.

At the end of his book, Fales correctly points out that he has avoided talking about the traditional, familiar puzzles associated with God's omnipotence and omniscience. This is true, but as a result the philosophy in Fales's book sometimes seems comparatively underdeveloped. But Fales is to commended for raising new issues, and trying to start new debates. Given the long history of philosophy of religion, this is hard to do, and Fales deserves credit for being successful in doing so.

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István Aranyosi. God, Mind, and Logical Space: A Revisionary Approach to Divinity. Palgrave Frontiers in Philosophy of Religion. Palgrave Macmillan, 2013.

During the course of the last century, philosophers and theologians became increasingly unsatisfied with classical theism both in respect to its internal coherence and its explanatory power. As a consequence, alternative concepts of the divine, like panentheism and open theism, received much attention. In *God*, *Mind*, *and Logical Space* István Aranyosi suggests a further alternative to classical theism that he refers to as *Logical Pantheism*.

Logical Pantheism is based on a number of assumptions, the most important ones of which are as follows: First it is based on a particular conception of Logical Space, which Aranyosi develops and justifies throughout the book. Logical Space, according to Aranyosi, is the sum of all logical regions whereas 'anything ... that can be said in a piece of fiction, a story, a play, or a poem, corresponds to a logical region, except ... sentences that even individually do not make sense and cannot be given any meaningful interpretation in context either' (p. 16). The category of logical regions so conceived of includes 'possible and impossible worlds, possible and impossible partial worlds or situations, as well as supra-world entities, like sets and sums of possible worlds' (p. 13). Since Logical Space is furthermore closed under 'any logical operation on any proposition whatsoever' (p. 13), Aranyosi draws the conclusion that Logical Space is the Absolute Everything: 'Logical Space is the largest conceivable space whatsoever, or the Absolute Everything. This is what I call the thesis of Logical Totalitarianism.' (p. 13)

Second, there is no ontologically significant notion of absolute existence in contrast to merely possible existence: existence is always relative to logical regions: 'All objects and states of affairs in Logical Space have equal claim to being ... To exist means to-exist-relative-to-a-region-of-logical-space.' (pp. 27-28) That is to say, each and every entity which we can conceive of – be it Pegasus or a round square – exists relative to a logical region and nothing that exists at a logical region has ontological priority over entities existing at other such regions: 'Pegasus and other winged horses exist in some surroundings (world, situation,

or any relevant region of logical space), and they don't exist in our surroundings. (p. 25)

Third, Logical Space is 'beyond existence and nonexistence. It is the support of being and non-being' (p. 121), that is, 'existence of Logical Space is the only absolute notion of existence, and existence of Logical Space is necessitated by the plenitude principle of Logical Totalitarianism' (p. 118). Whereas every entity in Logical Space exists relative to its logical region, Logical Space itself is considered to be the absolute vessel that holds everything within.

Based on the aforementioned assumptions, Logical Pantheism is the thesis that God is identical with Logical Space: 'Logical Pantheism can be considered as the most inclusive type of panentheism, because God is identified with Logical Space, the Absolute Plenitude as characterized by our principle of Logical Totalitarianism.' (p. 117)

According to Aranyosi, logical pantheism is able to deal with several perennial questions and problems found in the philosophy of religion. First, the assumption that God is identical with Logical Space turns the ontological argument into a sound a priori argument for the existence of God because Logical Space is the greatest conceivable entity and exists necessarily: 'To deny that Logical Space exists is itself a proposition in Logical Space, so that the denial is only non-contradictory if by "Logical Space" one really meant something less than Logical Space. Logical Pantheism is the only view that brings about a successful ontological argument, because it accommodates all conceivability intuitions, and because Logical Space itself is the only entity that is absolutely necessary.' (p. 117)

Second, logical pantheism is able to deal with Leibniz' question, 'Why is there something rather than nothing?' Whereas there is a riddle of existence in respect to standard actualistic ontologies that assume only one world to be actual, logical pantheism's answer to Leibniz' question is straightforward: 'Why does anything actually exist, then? The answer is that Logical Space depicts everything as existing at some region or other ... so necessarily the states of affairs that compose our actuality will have to be in Logical Space and exist-at-a-Region-R, so there is no mystery why something contingent exists at all.' (p. 121)

Third, as regards the problem of evil: whereas on standard conceptions of classical theism, the problem of evil is perceived to be one of the most daunting problems, logical pantheism is able to dissolve the very problem by way of turning the existence of evil into a logical consequence

of logical pantheism itself. Aranyosi discusses both the existence of evil in our world and the existence of possible evil and draws the following conclusions: 'Evil is necessary, and our world has a certain amount of it. If God is identical to Logical Space, then there is no problem of evil at all. We understand that it is part of the identity of Logical Space that it contains all possible amounts of evil. This world is neither the best nor the worst, because it is easy to imagine better or worse regions.' (p. 143) Furthermore, 'there is no modal problem of evil for the logical pantheist, for several reasons. One is the obvious reason that Logical Space is itself defined by the absolute plenitude, hence, it is no wonder that a world full of pain is part of it; it must be part of it, on pain of its not satisfying the requirement of plenitude' (p. 149).

According to Aranyosi, he wrote God, Mind, and Logical Space 'without paying too much attention to whether it follows some rules and canons of how philosophy is written nowadays and to whether it will please or raise to the expectations of his peers. In fact, he thinks it will not please them, and he foresees universally negative reviews' (p. xii). As regards the latter point, I have to disappoint Aranyosi: God, Mind, and Logical Space is interesting to read and provides many intellectual stimuli as it deals with many problems in the philosophy of logic, the philosophy of mind and the philosophy of religion from the point of view of logical pantheism. However, whereas the thesis of Logical Pantheism is clearly elaborated and related to the notion of Logical Space, there is a problem with the book: the main arguments to vindicate the basic assumptions of logical pantheism would have benefitted from a more extensive treatment. As they stand, they often did not convince me because they look question begging or ambiguous as regards the use of their key terms. In what follows, I only have the space to briefly discuss the argument for the thesis of existential relativity.

The assumption that there is no absolute notion of existence which we could use in order to demarcate between objects that exist and those that do not is one of the most important assumptions in respect to Aranyosi's conception of Logical Space, and consequently in respect to his Logical Pantheism: both the answer to Leibniz' question concerning the contingency of the existence of the actual world and the solution to the problem of evil essentially depend on existential relativity and its consequences, that is, that evil has to exist in Logical Space and that every contingent entity exists relative to its own logical region. However,

although existential relativity plays such a crucial role in Aranyosi's system, the argument for it is problematic. It goes as follows:

- (1) If existence is absolute, then fictionality is a relevant alternative to our belief that we and our surroundings exist.
- (2) Fictionality is not an alternative whatsoever to our and our surrounding's existence.
- (3) Hence, existence is not an absolute notion. (pp. 20-21)

The argument is obviously valid, so let us look at some problems: A first problem concerns the justification of the first premise. According to Aranyosi, the assumption that existence is absolute entails that 'the hypothesis that you and me, and all the others around us are characters of a fiction is not provably false' which 'is the best sceptical scenario one could think of' (p. 18). Since globally sceptical scenarios are seldom provably false, Aranyosi offers further support for the first premise:

Suppose there is a story in which the character Pegasus and a large number of winged horses are depicted as present in the world, and there are also two philosophers, call them 'Wilma Schwine' and 'Alexa Seinong'. The two philosophers are having a discussion. They agree that 'Pegasus is one of the finest winged horses' is true, because Pegasus, indeed, a very fine winged horse, is part of the two philosophers' surroundings. They also agree that 'Man o' War does not exist' since there are no wingless horses in the philosophers' surrounding, such horses being just characters in a fiction the two philosophers know about. The fiction they know about happens to depict us: you and me, and all of our surroundings. If existence is absolute, then either we are right in saying that it is Pegasus who does not exist and Man o' War does, or they are right when saying that Pegasus exists and Man o' War does not. However, the symmetry of our situation with respect to them (Schwine, Seinong, and so on) and their situation with respect to us raises the obvious worry: how do we know that we are right, specifically that it is us ... who exist, and not them: Schwine, Seinong, Pegasus, and their surroundings? For all we know, we could be the fictional ones. (p. 21)

The biggest problem with this justification of the first premise of the argument is that it presupposes the truth of the conclusion of the argument for existential relativity and thus begs the question: one can only plausible assume that Schwine's and Seinong's situation is ontologically relevant at all and not just an interesting thought if one yet already presupposes existential relativity and assumes that it is coherent to suppose that in Schwine and Seinong's world a thoughtful conversation is going on. If one does not share this assumption but continues to presuppose an ontologically committing notion of absolute existence, then the argument for the first premise does not even get off the ground because in this case the situation is simply as follows: there is a possible world including Schwine and Seinong and winged horses, but in contrast to our world, this world does not obtain and only possibly exists.

A second problem with the argument for existential relativity concerns the term 'fictionality'. Although the way he introduces the term at first suggests that there has to be an author of a fictional story on whose imagination the story and its characters ontologically depend (cf. p. 18), he later argues that there does not have to be an author because all the stories are yet already there in logical space and just have to be discovered by the mind: 'there is one-one correspondence ... between a fiction and a region of logical space.' (p. 28) However, if, on the one hand, by 'fictionality' he means something like 'participation in a region of Logical Space' or 'being depicted in some way by a region of Logical Space' then it is unclear what the second premise actually asserts because in this case it looks like the negation of the ultimate conclusion of the argument: that existence is relative to a region of Logical Space. That is to say, if something's being fictional is equivalent to there being a logical region relative to which it exists, then the second premise of the argument is false: in this case fictionality would be a correct description of the situation at hand. But if, on the other hand, he deploys a notion of fictionality according to which fictionality is not an alternative whatsoever to our existing, then he presupposes an absolute notion of existence against which fictionality is rejected. That is, we obtain an obvious interpretation according to which the second premise is true if we assume that it implicitly presupposes an absolute notion of existence: the reason why fictionality is no alternative whatsoever to our existence is that we actually and absolutely exist while fictional characters do not.

Of course, the problems in respect to the justification of existential relativity do not entail that existential relativity and consequently logical pantheism itself are false. However, since the argument is either question begging or presupposes an absolute notion of existence itself, Aranyosi's case for logical pantheism ultimately failed to convince me.

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Paolo Diego Bubbio & Philip Andrew Quadrio (eds). *The Relationship of Philosophy to Religion Today*. Cambridge Scholars Publishing, 2011.

This collection of essays from a variety of leading and promising thinkers has several things going for it. Stylistically, the texts are clearly written and thus refreshingly accessible. Secondly, the editors have included contributions not only from both the analytic and Continental traditions, but also from theistic, atheistic, and agnostic perspectives, so the volume exemplifies an openness to a variety of currents of thought – an inclusivity that we should expect/demand *today*. And perhaps most importantly, the essays are rigorously argued, engaging, and life-relevant, so that what we have is, in fact, quite an expansive exploration into not just 'one' relationship between philosophy and religion today but into a number of *relationships*. And so, the book actually lives up to the promise of its title (and perhaps surpasses it in some ways).

To begin with, the most surprising and impressive part of the book for me is the form and content of the editors' Preface. Right from the start, and with a nice stylistic mix of humility and ambition, the editors challenge us thinkers of religion to be more ambitious ourselves, by not just limiting ourselves to traditional philosophico-theological problems (divine non-/existence, the problem of evil, etc.) but of asking (at the risk of 'arrogance'): 'What *ought* the relationship between philosophy and religion be?' (p. vii). The editors are very clear on the directions they want philosophy of religion to pursue today (and tomorrow): they speak in particular of the 'political' and 'socio-political' several times throughout the rest of the Preface, as well as referring to 'the symbolic and regulative dimensions of religious life, the existential and cultural import of religion, and the question of religion and politics' (p. ix) – expansive, indeed. (The question of the relationship between religion and the political shall recur throughout this review.)

I will say a thing or two to say about all the papers, but will have more to say about the contributions that I myself find most relevant, particularly in terms of the most essential and urgent relationships that philosophy is beginning to have – and should have – with religion. The first essay is exemplary in this regard. Matheson Russell's 'Philosophy

of Religion in a Secular Age: Some Programmatic Reflections' begins by offering a concise overview of the four basic directions or categories of philosophical thinking of religion: metaphysical, epistemological, philosophico-theological, and philosophico-anthropological. Russell offers a nuanced critique, one with which I am in agreement, e.g., that philosophy of religion has 'become increasingly abstract and technical' (p. 13). The overview alone is impressive, but then the author goes on to situate the various strata in relation to their broader socio-intellectual contexts, with an emphasis on their relationships to secularity. Confirming the thoughts and aspirations of the editors, Russell insists upon the need that philosophy of religion consider its relation to its 'political, social and cultural dimensions': this phrase (and its variations) is repeated throughout the paper. And I was particularly encouraged to note that he cites one particular (and crucial) aspect of this contextualization: 'the adoption of capitalist modes of production, and the development of concomitant forms of socialization and individuation.' (p. 12) (Inspired and informed by the likes of Slavoz Žižek, Antonio Negri, Alain Badiou, and others, thinkers of religion are today beginning to critique capitalism.) The next piece is John Bishop's 'Philosophy and Religious Commitment'. This is a solid piece, which is no surprise, given that the author is a wellestablished figure in contemporary philosophy of religion. In this essay, Bishop begins by convincingly dismantling elements of Alvin Plantinga's 'Reformed epistemology', before outlining a 'modest fideism' influenced by William James and developed by Bishop.

The third contribution is Paul Crittenden's 'Faith In Keeping With Reason: A Critique of the Regensburg Address'. The papal Address (delivered in 2006), which appears to be a strong affirmation of the relationship between rationality and divinity, is critiqued from the outset and along various fronts, e.g., the Pope's attempt to portray a strong link between biblical faith and reason; his construction of a wider gap between Islamic and Christian thought than what may be the case; etc. Crittenden thus effectively weakens the papal argument in a way that is both rigorous and enjoyable. But perhaps what I found most engaging about the piece is what I perceive as an absolutely critical task for both philosophy in general and for philosophy of religion today (and tomorrow): of the need for a revised/expanded figuration of reason, one that avoids, one the one hand, a narrow yet bloated scientistic-instrumentalistic hyperrationalism, and, on the other hand, an impotent reason diluted by a host of excesses (hyper-relativism, over-contextualism, an excessive

emphasis on difference and otherness, etc.), thus denying reason its force and universality. Crittenden cites the likes of Edmund Husserl, Ludwig Wittgenstein, and Jürgen Habermas as thinkers contributing to the reconception of reason (p. 70).

The next contribution is Kevin Hart's 'Contemplation: Beyond and Behind'. This is a typically brilliant piece of work from Hart, with all the hallmarks: a careful retracing of a concept over the centuries, an expansive/encyclopaedic knowledge of the subject-matter, and of course, beautiful prose. But just as this essay is the most beautiful piece in the collection, it is also perhaps the most abstract/removed when it comes to its relation to the rest of the volume – though Hart's text certainly has a lot to say about the continuing relationship of contemplation to theology and philosophy.

The fifth essay is Graham Oppy's "New Atheism" versus "Christian Nationalism": this text also exemplifies the talents of its author: clearly written, thoroughly researched, rigorously argued with all the necessary provisions, qualifications, and nuances ... in sum, a 'nononsense' approach to thinking religion - which should surely be one of the defining characteristics of philosophy of religion today. This piece explores the 'New Atheist' attack on religion, and it is refreshing - even heartwarming – to observe an atheist with a fierce intellect undermining the excessive claims of the New Atheists. Of course, one may find objections with the essay - and Michael Levine certainly does. 'New Atheism, Old Atheism and the Rationality of Religious Belief' is quite a tour de force, somewhat reminiscent of Nietzsche (which is a good thing), but risking a condescension which should have no place in philosophy or philosophy of religion today; e.g., Levine construes philosophy of religion's relation to 'mainstream philosophy' as 'a quaint and poor relation' or 'an irrelevant anachronism' (p. 157). As to who is (more) 'right' would require an extended response, but one way in which I would summarize this most engaging debate is that Oppy may be too forgiving, whilst Levine may be too severe. (I would also contend that philosophy of religion today should re-cast this particular debate in the following way: New Atheism is dogmatic, which makes it nothing new, whilst religion is guilty of some of the charges made by New Atheism, and must be re-figured or even re-made as an open, minimalist - and, yes, rational – faith, which is/would be something new.)

The seventh chapter is 'Religious Reasons in Political Debate: Jeffrey Stout and the Tradition of Democracy' by Anthony J. Langlois. Taking

up the theme of religion and politics called upon by the book's editors and Russell, Langlois explores this relationship in the context of liberal democracy. As the chapter title indicates, he outlines and evaluates the work of Jeffrey Stout, who wrote the landmark work, Democracy and Tradition (2004). (I myself find it increasingly difficult to defend liberal democracy - particularly in its capitalist manifestation - in the wake of ecological, financial, and a multitude of other crises.) The essay is another solid piece of scholarship. The final essay is Douglas Pratt's 'Religious Identity and the Denial of Alterity: Plurality and the Problem of Exclusivim'. The question of religious diversity should certainly be considered when exploring the relationship/s of philosophy to religion today, so this is a welcomed contribution. But what stands out about this text on this topic is that it offers a nuanced understanding of exclusivism: that it should be perceived as being located on a 'continuum' with its 'competing' categories of inclusivism and pluralism (p. 202), and of distinguishing between subtler/more sophisticated forms of exclusivism from exclusivistic extremism (p. 203). Once again, this essay is characterized by the essential features of good scholarship and reflection.

Of course, *The Relationship of Philosophy to Religion Today* is not – nor does it pretend to be – an exhaustive exploration into all of the actual or possible relationships. But it is certainly encouraging to note that the work signals some of the most relevant (and interesting) directions. (As for myself, two particular directions resonate most sharply: the need for a re-figured reason, one that is simultaneously humble and ambitious and informed by a certain openness to faith; and the articulation of how this faith and reason may contribute to much-needed socio-political change.) I strongly recommend this book for anyone interested in philosophy of religion.