

LIBERTY UNIVERSITY

INCARNATION AND THE NATURE OF MIRACLE: THOMAS FORSYTH

TORRANCE'S VIEW OF THE INCARNATION AS

PARADIGMATIC FOR DEFINING *MIRACLE*

A THESIS SUBMITTED TO THE FACULTY OF THE SCHOOL OF RELIGION IN
CANDIDACY FOR THE DEGREE OF MASTERS OF ARTS RELIGIOUS STUDIES

SCHOOL OF RELIGION

BY

DANIEL C. SAMMS

LYNCHBURG, VIRGINIA

August 1, 2008

ABSTRACT

The concept of *miracle*, especially the miracle of the Incarnation is vital to the Christian faith. However, current approaches to *miracle* begin with a cosmologically dualist presuppositions rooted in Newtonian physics, which see the universe as a closed mechanistic system on which order is imposed from the outside. Miracles are not possible in this dualist framework that separates God from His creation. The result is incongruent definitions of *miracle*. Many of these incongruent definitions rule out God's redemptive self-revelation to human beings. However, Thomas Forsyth Torrance has developed a unitary theological science that understands the universe as "open-up" to God's redemptive self-revelation, especially His revelation in the Incarnation of the Son of God. Contra Newton, Torrance via Albert Einstein, understands the universe to be inherently rational. Thus, the universe does not need to have rationality imposed on it from outside. In this way, it is contingent and thus open to the Incarnation of the Son of God. This thesis identifies key principles in Torrance's approach to the Incarnation in order to develop a model to be applied toward a definition of *miracle*.

ABBREVIATIONS

<i>CTSC</i>	<i>Christian Theology and Scientific Culture</i>
<i>GGT</i>	<i>The Ground and Grammar of Theology</i>
<i>NASB</i>	<i>The New American Standard Bible</i>
<i>STI</i>	<i>Space, Time and Incarnation</i>
<i>TGNT</i>	<i>The Greek New Testament</i>
<i>RST</i>	<i>Reality and Scientific Theology</i>

CONTENTS

Chapter 1	Problem: Dualist Conceptions of the Universe resulting in incongruent definitions of <i>Miracles</i>	
	Introduction and Method.....	1
	Current Definitions of <i>Miracle</i> and the nature of the universe.....	3
	Current Dualist Newtonian Definitions pose problems for epistemology.....	7
Chapter 2	Current Approaches to <i>Miracle</i> Begin with Dualistic Presuppositions Rooted in Newtonian Physics	
	Two Classic Pre-Newtonian Christian Approaches to <i>Miracle</i> : Augustine and Aquinas.....	12
	Four Modern and Contemporary Christian Approaches to <i>Miracle</i>	14
	The Fundamental Problems of Most Modern and Contemporary Christian Approaches to the Nature of <i>Miracle</i>	41
	The Need: A Non-Newtonian Approach to <i>Miracle</i>	44
Chapter 3	Solution: Proposed Interrelational Approach to <i>Miracle</i> : Top-Down, Interactive, and Unitary	
	The Primacy of the Incarnation.....	53
	The Miracle of the Incarnation: Thomas Forsyth Torrance’s Understanding.....	55
	Two Opposing Views of the Universe: Newton and Maxwell-Einstein.....	59
	The Incarnation in Relation to the Universe.....	81
	Conclusions: A “Torrancian” Model.....	96
Chapter 4	Conclusion: A Biblical, Post-Newtonian Model for Approaching Miracles	
	A Miracle is primarily an act of self-revelation from God, occurring as a space-time event.....	103
	A Miracle must be intelligible in order to be known.....	103
	A Miracle must be in accord with the recognition that the universe is “open-up” to God’s divine self-revelation.....	105

CHAPTER 1

PROBLEM: DUALIST CONCEPTIONS OF THE UNIVERSE RESULTING IN INCONGRUENT DEFINITIONS OF *MIRACLE*

Introduction and Method

Many modern and contemporary definitions of *miracle* are rooted in Newtonian physics, which is dualistic in character, notably in terms of the God-world relation, and so essentially negate the ability of God to interact with His creation. Newton's cosmological dualism views God as spatially separated from the created universe. In this view, the universe operates as a closed system of cause and effect, making it impossible for God to interact directly with it and in it.

Given such a basis, most modern definitions must conclude that a miracle is an event which appears to contradict the fixed *a priori* natural laws of the universe. In this cosmologically dualistic, Newtonian conception, miracles are necessarily impossible, irrational and thus unknowable, because by this definition they disrupt the regularity of the universe. If so, this poses a major problem since the purpose of miracles is to reveal God. But such assumptions regarding *a priori* "natural law" do not reflect current trends in relativity physics.

The purpose of this thesis is to describe the unitary theological science of Thomas Forsyth Torrance, especially as he applies it to the Incarnation. Through this analysis, key principles will be extracted in order to develop a potential model for approaching the possibility of miracles more generally. The model developed through the description of Torrance's approach will be applied toward a more sound definition of *miracle*. In the process, the thesis will briefly explore Torrance's approach in relation to two major

modern views of the *universe* (Newtonian and Einsteinian) in order to understand which view is more congruent with and useful for a biblical understanding of the universe as contingent and the space-time possibility of the miraculous, especially as miracles are understood to relate to the possibility of human beings coming to adequate realist and redemptive knowledge of God as He has objectively given himself to be known by humans in the world. The overall concern of the thesis is: A more proper, biblical concept of miracle in light of the cosmological and epistemological insights of Thomas Torrance.

Beginning with Torrance's definition of the Incarnation, the thesis will discuss the primacy of the Incarnation as a *miracle*. Special attention will be given to the revelatory purpose of the Incarnation. Realizing the revelatory purpose of *miracles*, the thesis will describe how Einstein's theory of relativity played a significant role in the development of Torrance's understanding of the universe and thus the Incarnation. In doing so, the thesis will compare Torrance's Einsteinian view of the universe with a Newtonian view. This will allow for a clear understanding of Torrance's view of the nature of the universe in relation to God, especially as it relates to the Incarnation's revelatory purpose. This section will be paradigmatic to Torrance's view of epistemology as it relates to God's revelation, because it will explain how Torrance's Einsteinian view portrays a universe that is "open up" to the revelation of God.¹

Building on Torrance's view of the universe, the thesis will move into a descriptive discussion of Torrance's view of the Incarnation in relation to the universe in particular. The thesis will describe how Torrance's Einsteinian belief in the contingent

¹ This understanding of "open-up" will be discussed with further detail later. It is used to refer to the universe's relation to God as relational, rather than cosmologically dualistic.

rationality of the universe makes it rational to believe that the Son of God could “enter” the universe, could manifest himself historically and particularly there without disrupting its order. This will also involve a brief study of the Johanne use of “Word,” especially as used in the first chapter of John’s gospel. It will also involve an explanation of how this understanding of the universe not only allows for the possibility of the Incarnation, but also makes it possible for human beings to know God through His revelation without the Newtonian based limitations on knowledge of God grounded in the thought of German philosopher Immanuel Kant, i.e., humans cannot know the *Ding an sich* (the thing in itself).

Through this study, the thesis will present several key principles related to Torrance’s method. These principles will involve Torrance’s view of the revelatory purpose of miracles, as well as their contingent rationality within space-time. Torrance believes that miracles exist for the purpose of revealing God to human beings. This belief is supported by Torrance’s view of the God-world-human relation, especially as he understands it in light of the correction to Newton advanced by Albert Einstein’s view of relativity physics in relation to the dynamism of the universe as a whole. Torrance’s methodological principles will then be applied toward a potential non-dualist description of *miracle*.

Current Definitions of *Miracle* and the Nature of the Universe

Miracles are crucial to classical Christian faith. The earliest parts of the Bible describe divinely parting waters, burning bushes and wooden staffs which turn into serpents. More importantly, the central event in Scripture is the Incarnate life, death and resurrection of Jesus Christ. Unless miracles can be regarded as viable historical events

then the Bible, on this level, has its credibility significantly weakened and orthodox Christian faith to this extent is likewise weakened in credibility. However, if the miracles of Scripture could and did actually happen as historical events, then the Christian faith as a whole rests on a firm foundation. For this reason much effort has been dedicated to defending the reliability of miracles as space-time historical events.

However, the matter is complicated by the fact that so many people, including theologians and Christian philosophers, have radically differing opinions not only about the possibility of miracles, but, given the possibility of *miracle*, how to define such an event. No clear conclusion can be reached on the possibility or definition of miracles until a clear understanding of the God-world-human relation is established. Further, a more effective definition may help to put to rest several arguments against their possibility. In short, a more adequate definition of miracle would be of great help to the Christian faith.

Many modern and contemporary definitions of *miracle* are still based on Isaac Newton's conclusions regarding *a priori* deterministic natural law. This *a priori* approach to the question of *miracle* is usually rooted in deterministic, Newtonian physics, which is founded upon a cosmological dualism, notably in terms of the God-world relation, which essentially negates the ability of God to interact with His creation. Newton saw God as the *divinum sensorium* ("infinite receptacle") who holds the universe within Himself, "imposing" rationality on the universe from "outside." While this understanding gave an explanation for the knowable order of the universe, it effectively epistemologically separated God from His creation, because God cannot be understood to enter the universe contained within Himself any more than "a bucket can contain itself."

Upon this basis most modern definitions conclude that the notion of a miracle is an event that contradicts the fixed *a priori* natural laws of the mechanistic universe. By this dualist conception, miracles are necessarily impossible, irrational and thus unknowable, or if they have occurred, they operate against the grain or “mechanisms” of the universe as divine intrusions, because by their nature they would disrupt the regular, knowable order of the universe. Further, in the Newtonian conception the universe is “contained” externally within God, making it in fact impossible for God to actively enter and act within the universe, for how could God enter the thing He contains within Himself, i.e., how can anything contain itself? Still further, in the Newtonian conception, the universe gains rationality as rationality is imposed upon it from the infinite, divine “receptacle” in which it is contained.

This concept was subsequently applied to epistemology by Immanuel Kant who stated that “we can have no cognition of an object as a thing in itself, but only as an object of sensible intuition, that is, a phenomenon.”² Kant’s epistemological dualism is rooted in Newton’s cosmological dualism. Newton’s receptacle notion that rationality is imposed by God from outside onto the receptacle of space, led to Kant’s “Copernican Revolution,” which separated the *Ding an sich* (the thing in itself) from the sensory realm experienced by the knower.³ According to Kant (often called Newton’s philosopher), the human mind imposes rationality on sensory information from the universe.⁴ This approach rules out knowledge of external objects in the universe as they are themselves,

² Immanuel Kant, *Critique of Pure Reason*, trans. J.M.D. Meiklejohn (London: George Bell, 1878), xxxiii.

³ Thomas F. Torrance, *Space, Time and Incarnation* (New York: Oxford, 1969), 43. Note: this thesis will use Torrance’s approach to Kant.

⁴ Kant, 101.

the essence of things, including God. Kant's view eliminated objective knowledge of essences (*Ding an sich*) and largely limited knowledge to subjectivism. Thus, real knowledge is cut off. This too poses a problem since; again, the primary purpose of miracles is to reveal God.

Further, in addition to separating God from His creation and greatly limiting human knowledge, such definitions of *a priori* "natural law" do not reflect the revolution in physics that has occurred during the past century via relativity physics. Now that these advances in physics have been made, current definitions should reflect or at least engage with them.

Modernity, dominated by Newton in many respects, has wreaked havoc on the Christianity for many years. Its dualist and determinist conceptions of the cosmos, combined with Newton's equally dualistic "receptacle" notion of space imposed by Isaac Newton's physics, has caused many thinkers to either completely reject or to reinterpret the notion of the miraculous in the Christian faith.⁵ Consequently, the New Testament teaching that God not only created and sustains the universe but directly acts there and has also personally actively related himself with and in the universe and history, becoming a human being, has been completely rejected by modern thinkers because it contradicts those dualist notions of the God-world relation. But without such divine action there can be no knowledge of God, and so no redemption from sin, and no future hope of a resurrection for believers and the coming of the fullness of God's Kingdom. Many theologians, such as Rudolf Bultmann and Paul Tillich, who presuppose a Newtonian view of the universe, have reinterpreted the miraculous events of the New

⁵ Torrance, *STI*, 38.

Testament into existential terms. The remainders of Newtonian thought have caused and continue to cause problems for the Christian claim for God's direct action in history.

Current Dualist Newtonian Definitions pose problems for epistemology

Modernity as grounded in Newtonian cosmological dualism has long forced orthodox Christians to understand the faith in the face of philosophical opposition. Many (Bultmann, Tillich, et al.) choose to abandon orthodox Christianity by re-inventing the faith to concur with Newtonian principles of the universe and Kantian epistemology.

Classical Christian thinking related to miracles, revelation, etc. has been damaged due to the reverberating effects of Newtonian thought. This notion of a receptacle universe, i.e., a universe "contained" by God, served to under-gird the conceptual cutting off of God from humanity and humanity from God.⁶ Consequently, many Christian philosophers and theologians have felt compelled to somehow define *miracle* in conformity with Newtonian *a priori* conceptions about rigid natural law, i.e. they define *miracle* as anything that "breaks" Newtonian *a priori* natural law. The contention is that, contra Newton, God can make exceptions to deterministic natural laws. They begin with the assumption that the universe is a fixed, mechanical system that is "broken" or "suspended" when God enters or acts upon it. This approach plays into the hands of naturalist thinkers like David Hume, because it begins with their presuppositions about the nature of the universe, presuppositions that make miracles impossible and epistemologically unknowable.⁷ Hume defines *miracle* as a "violation of the laws of

⁶ Ibid., 38-9.

⁷ Notably, before Albert Einstein, there was no alternative to Isaac Newton. However, since Einstein, there are other possibilities as we seek a now altered understanding of the universe and God's relation to it.

nature” and argues that they are impossible based on his naturalist view of the universe.⁸ If miracles are “breaks” and do not exist as part of the knowable order of the universe, they cannot be understood by human beings that are part of that natural order. As a result, naturalists like David Hume and Antony Flew were able to rule out miracles by definition, because they saw nature as a closed system. Because Newtonian physics rules out supernatural intervention, *miracle* as suspension must be *ad hoc*. Otherwise, the Newtonian view rules out their existence.

Essentially, Christian philosophers, theologians and apologists have too often assumed a rigid, Newtonian view of natural law and so have structured their definitions of *miracle* accordingly. Some naturalist philosophers rule out the possibility of miracles (as understood by orthodox Christianity) by definition within their deterministic framework.⁹ But it is this framework that has been called into question by more recent advances in physics. As we will see, such developments transform the situation and establish a more dynamic, relational, contingent view of the universe as open to the possibility of the space-time action of God and more in keeping with the biblical view of such.

Therefore, according to Torrance, it is epistemologically vital to develop a clear definition of *miracle* that can be argued for within an “open” framework. That is, in order for humans to know God, it is necessary that the universe be seen as “open up” to His revelation. The universe, as God’s creation, is “open up” in the sense that it allows for the interaction of God. Further, it is necessary that the definition of *miracle* concur

⁸ David Hume, “Of Miracles” *In Defense of Miracles* (Downers Grove, Illinois: InterVarsity Press, 1997), 33.

⁹ Torrance, *STI*, 48.

with the view of the universe as open up to God. Again, within the Newtonian framework miracles are impossible and God is unknowable.

To be specific, Newtonian thought has devastating effects on the miracle of the Incarnation. Within the Newtonian view, the universe is a closed system of cause and effect centered in the concept of gravity as the supreme, unchanging force in the universe.¹⁰ This deterministic cause and effect understanding, forced Newton to a very mechanistic view of the universe that required the universe to be a closed system. That is, in Newton's view, the universe could not be directly acted upon or within by an outside force. The system is "closed" in that it operates as a fine-tuned machine that cannot be entered or tampered with by God lest the machine break down. Eventually, Newton came to understand the universe as a contained unit of space that exists within God. He believed that the universe exists within a receptacle and thus within God (*divinum sensorium*). God thus imposed rationality on the universe from the outside as He brought inertial order to the universe.

Hence it becomes clear that Newtonian physics cause serious problems for the miracle of the Incarnation. If space and time and the rational structure of the universe is infinitely "enclosed within" God, then it is impossible for God to enter that container to reveal Himself to its inhabitants, because it is not possible for a thing to contain itself.¹¹ Again, in Newtonian physics, God impresses rationality on the universe from the outside. To abandon his role as container would cause the universe to lose its basis for rationality. Additionally, He cannot act directly within the universe that He contains within Himself.

¹⁰ Isaac Newton, "Fundamental Principles of Natural Philosophy," *Newton's Philosophy of Nature*. Ed. H.S. Thayer (New York: Hafner, 1953), 30.

¹¹ Torrance, *STI*, 63.

Further, if God cannot enter the universe, He certainly cannot act directly in it either.

Hence, Newton brought about a conception of a rigid determinism in the universe that served only to support a dualist view of the God-world-human relation and so a deistic understanding of God.

CHAPTER 2

CURRENT APPROACHES TO *MIRACLE* BEGIN WITH DUALISTIC
PRESUPPOSITIONS ROOTED IN NEWTONIAN PHYSICS

The fundamental problem with most modern and contemporary definitions of *miracle* is that they presuppose a dualism rooted in Newtonian physics. This involves beginning with a conception of *a priori* natural law, and then working to understand *miracle* from a foundation in that pre-supposed rigid framework. Torrance argues that this model is based on a misrepresentation of natural law. He says that for those with a purely instrumentalist view of science,¹² “natural law is defined in terms of what we can do with things, which is to invert what it really is, viz., a rational representation of interconnections and regularities in the events themselves.”¹³ Often, this results in a definition of *miracle* that does not concur with Scriptural revelation, instead seeking to re-invent the term, giving it a non-orthodox definition (e.g., Bultmann).¹⁴ Conversely, when an orthodox definition of *miracle* is found and established, it fails to concur with the modernist (Newtonian) framework by which it defines itself. As a result the idea of miracles becomes nonsensical and unknowable to human beings.

¹² Torrance uses “instrumentalist” to refer to a view of science that focuses on controlling nature for human purposes like technology.

¹³ Torrance, *STI*, 68.

¹⁴ Understandably, many philosophers would not see this as a problem, because they do not consider Scripture to be authoritative and simply accept the closed system that Newtonian philosophy presents. However, because the purpose of this thesis is to present a possible model for approaching miracles, it will not rule out Scriptural inspiration *a priori*.

Two Classic Pre-Newtonian Christian Approaches to *Miracle*: Augustine and Aquinas

The cosmologically dualistic separation of the supernatural from the natural realm did not begin with Newtonian thought. It was already entrenched in Western culture via Aristotle, Platonism and neo-Platonism before it was applied to Christian thought by certain early church fathers and long before it was developed further by Newtonian thinkers. However, prominent early and late medieval Christian thinkers such as Augustine and Aquinas were surprisingly “open” to divine action in the universe, despite certain cosmological dualist tendencies.

In the late fourth and early fifth century Augustine claimed that miracles did not go against nature but that they only went against what human beings believe to be true of nature.¹⁵ As a pre-modern, Augustine had no need to defend against any Newtonian mechanistic view of the universe. This allowed his concept of *miracle* to avoid various problems caused later by Newton and modernity.¹⁶ However, Augustine still conceived of a type of dualism that has plagued Christian thought for centuries.¹⁷ Augustine’s dualism arose from his neo-Platonism, especially as it related to the universe reflecting infinite Forms which he took to be in the mind of God. Fortunately, as Augustine focused more study on creation *ex nihilo*, he increasingly moved away from Platonism in favor of a less dualistic cosmology that viewed the universe as “open” to the Incarnation. Michael Hanby mentions that Augustine seems to have two sides; philosophical,

¹⁵ J.D. Spiceland, “Miracles,” *Evangelical Dictionary of Theology* 2nd ed., Ed. Walter A. Elwell (Grand Rapids: Baker, 2001), 779.

¹⁶ Notably, while Augustine did not have to address Newtonian thought, he did have to face ancient Platonic “receptacle” views of the universe given his own background in neo-Platonism.

¹⁷ Torrance, *STI*, 40.

approaching the world with a Platonist worldview and doctrinal, focusing on the truth of Scripture.¹⁸ This is evidenced as he confirms the existence of miracles, noting that eyewitness accounts of early miracles (including the Incarnation) were the basis of faith for the church.¹⁹ Obviously, Augustine did not believe that God was dualistically separated from His creation. Augustine's understanding of *miracle* does not fully define the term. Instead, he describes wondrous supernatural actions that adhere to a natural law that is beyond human perception. Centrally, he understood the God-world-human relation out from Christ.

Like Augustine, Thomas Aquinas believed that miracles adhered to an unknown natural law. However, rather than saying that miracles were events that go against what humans believe to be true of nature, Aquinas saw miracles as events that went beyond the order of the universe observed by human beings. That is, Aquinas understood that there was an order that went beyond the realm of human perception, a truly natural order that superseded the limited order apparent to humans.²⁰ His definition brings an added level of complication to Augustine's definition. While both of these conceptions of *miracle* seem viable on the surface, without Einstein and Torrance they cannot fully explain how miracles are possible within the universe. Augustine and Aquinas did not have access to Einstein and Torrance, but there still exists a need for further development of a coherent definition that is rational, that is logically coherent within the context of the universe.

¹⁸ Michael Hanby, *Augustine and Modernity*, (New York: Routledge, 2003), 7.

¹⁹ Augustine, *The City of God Against the Pagans* Ed. R.W. Dyson (Cambridge, UK: Cambridge University Press, 1998), 1120.

²⁰ Thomas Aquinas, *Summa Theologiae*, vol. 15, trans. T.C. O'Brien (New York: Cambridge, 2006), 14-17.

Four Modern and Contemporary Christian Approaches to *Miracle*

A Newtonian view of the universe understands it to be a system closed to divine action that functions according to fixed, deterministic, mechanical rules that can be known and understood by human beings. This separation exists because the universe exists within God and has rationality imposed on it by God from the outside. Thus, God cannot act in the universe without compromising His existence and the order of the universe. Knowledge for the Newtonian is said to be rooted in knowledge of the nature of determined cause and effect relations within the universe as a result of the human ability to test and observe the mechanistic *a priori* natural laws thus exhibited by the universe in action. As aspects of nature are tested and observed to behave in certain repeatable ways under controlled circumstances. The Newtonian assumes that these always behave the same way in this cause and effect manner. These patterns of normalcy are considered natural law.

Perhaps the most recognizable example of this method of scientific observation can be found in the legendary account of Isaac Newton observing an apple falling from a tree and postulating why objects fall to the earth when dropped. Observing the behavior of objects in like circumstances, he concluded that gravity was the ultimate force in the universe and that all objects “obeyed” its rules.

Given this view of the universe, some who seek to defend miracles understand miracles as breaks in this natural cause-effect system. According to the Newtonian,²¹

²¹ My use of the word “Newtonian” here and elsewhere does not necessarily indicate one who holds a view identical to Newton. I am using the term to refer to those positions which maintain some significant hold-over from Newton in that they see the universe more mechanically rather than relational. I am not in any way implying that those who hold this view are deists as some might imply by the term “Newtonian.” I realize that a true Newtonian would probably not believe in (or would at least have a serious problem with) the actual occurrence of miracles in the classical Christian sense at all.

unless the system is somehow “broken” or suspended in some way by the divinely effected occurrence (miracle) in question, then the occurrence is part of the universal system and thus not a miracle. For the Newtonian, “the system” of the universe is like a machine, and a miracle has to stop or break that machine for it to occur historically yet without being a part of that machine.

Consider a copy machine. Blank paper passes through the machine and comes out with print upon it. In order to stop the printing, a person must shut down or break the machine. This metaphor illustrates the Newtonian view of the universe. It operates with what are claimed to be known, unchanging, necessary rules. Those rules do not change, but they can be interrupted according to some definitions of *miracle* developed by “Newtonian” Christians.

Richard L. Purtill

Miracles as temporary exceptions to a priori natural law. One views natural law as *a priori* when he or she believes that the laws of the universe operate in a fixed, deterministic, mechanical manner. Given this essentially Newtonian framework, one way that Christian thinkers define *miracle* is to explain them as “temporary exceptions” to natural law. Richard Purtill, retired Professor of Philosophy at Western Washington University reflects this approach. Accepting both miracles and fixed natural law, Purtill seeks to make them compatible by allowing for a divinely effected temporary arrest of the laws. Thus he is arguing for a pause or suspension of natural law. This is an attempt, perhaps rooted more in mere semantics that is meant to avoid such words as “break” or “violate” in relation to natural law. Often, such words (“break” and “violate”) imply that

there is something improper and give credence to naturalist arguments from people like David Hume.

Purtill defines *miracle* as a “temporary exception” to natural law brought about by divine action.

Although all miracles are part of the divine ‘economy,’ not all providential events are miracles. I propose to define a miracle as an event in which God temporarily makes an exception to the natural order of things, to show that God is acting.²²

The key piece of Purtill’s definition is his statement that God “makes an exception to the natural order of things.” Purtill is proposing a definition of *miracle* that remains dependant on a modernist view of natural law.

Arguing against metaphysical naturalism, Purtill explains that natural laws are “ordained by God for the typical governance of phenomena in the natural world, such that events in the natural world follow a regular and predictable pattern.”²³ He believes that God has set the universe in motion in such a way that it operates with a level of predictability and order.²⁴ However, he argues that this level of predictability is only possible through the act of a divine Creator via creation and sustenance. According to Purtill, a naturalist view of the universe gives no basis for natural order. In this way, naturalism cannot be sure that the universe will continue to operate with the same laws of nature. He believes that theism provides the basis for natural law. This means that natural law is not “ultimate” but penultimate. However, as penultimate he does not believe that natural law rules out the action of God in the universe. On the contrary,

²² Richard L. Purtill, “Defining Miracles,” *In Defense of Miracles*, ed. R. Douglas Geivett and Gary R. Habermas, (Downers Grove: InterVarsity, 1997), 62-63.

²³ *Ibid.*, 72.

²⁴ Purtill believes that natural law is rigid and predictable. Miracles only occur as “breaks.” This is different than Torrance seeing natural law as less rigid and more relational as will be discussed later.

Purtill believes that as Creator and active sustainer of the universe and its regular natural law, God has the ability to act in history. God's power as creator of natural law gives Him the power to suspend natural for the purpose of revealing Himself in a unique way to human beings.

In elaborating his definition, Purtill makes use of the method employed by C.S. Lewis.²⁵ Purtill makes clear his view of nature and the need to understand nature in a particular way in order to understand and define what a miracle is. He writes, "Unless we have the idea of a way things ordinarily happen [regularity]—*the natural order of things*, some idea of 'laws of nature'—then the idea of a miracle cannot be made clear... Without the idea of natural law to which miracles are an exception we cannot explain the basic idea of a miracle in this sense."²⁶ He knows that miracles have to stand out as rare against the backdrop of the natural universe in order to be noticed at all. If miracles did not at least initially *seem* to contradict nature, then human beings would never notice or recognize them at all and so they would have no redemptive revelatory value. Purtill develops his definition further by emphasizing the need for a "sign" or for something "to show that God is acting."²⁷ His desire to focus on the exceptional nature of *miracle* is obvious.

Having thus stated his definition, Purtill defends his reasoning by pointing out several important elements of his definition. The first thing he focuses on is, "The exception to the natural order is *temporary*."²⁸ He emphasizes the temporary (window-

²⁵ Lewis' view will be discussed later in the thesis.

²⁶ Purtill, 63.

²⁷ *Ibid.*, 64.

²⁸ *Ibid.*, 63.

like) nature of the event, because in his understanding of *miracle* once the event has occurred, the natural order of nature is restored so that all subsequent events can be called “natural” even though they too are the result of what he would call an un-natural or supernatural cause. This is a limited improvement on the “break” theory of miracles, because it avoids the subsequent “ripple effect” (to be addressed later) that causes confusion about what happens to natural law after the miracle. Emphasizing the temporary nature of the miracle and the immediate action of the universe to restore natural order makes it possible for a miraculous event to occur without bringing about long-term affects on the universe. However, Purtill does not go far enough in describing the brevity of this exception to the natural order. At the moment of the exception, what happens to the rest of the universe? Due to the Newtonian laws of cause and effect, even if the exception is limited to a very small “portion” of space and time, would it not cause inevitable complications in the surrounding space and time that is not directly affected by the exception? Inevitably, the complications would spread like a “wave” until stopped by an outside force.

He continues by stating that “[*miracle*] is an *exception* to the ordinary course of nature.”²⁹ Here, Purtill evidences his presupposition regarding the *a priori* form of natural law. He sees the universe as having certain rules that apply the bodies existing within it. However, in order to recognize something as “outside” the natural order of events, one must first know what that natural order is. This poses a problem for humanity, because as finite beings, humans cannot view the universe in its entirety or know what is orderly to it. Any understanding of a natural order can only result from a

²⁹ Ibid., 63.

survey of humanity's limited perception of the universe. What occurs in a particular circumstance or event of human observation may not always occur in all parts of the universe, though the Newtonian assumption is that it does. Unknown variables both in reality and in our observational process could affect the limited observations of humans. What is considered to be an identical circumstance may not be precisely the same. While the Newtonian view takes variables into account, it also assumes that what is true in one place is necessarily true in all places.

However, this understanding of *a priori* natural law is vital to Purtill's definition. He writes, "Unless we have the idea of a way things ordinarily happen—the *natural order of things*, some idea of "laws of nature"—then the idea of a miracle cannot be made clear."³⁰ Once again, his statements reflect a strict *a priori* approach to natural law. He asserts that there must be some known strict order before an intervention by God can be identified as such. He continues, "If nature were chaotic, if 'anything could happen,' then miracles could not be contrasted with what we ordinarily expect."³¹

True, there must be regularity for humans to perceive something to be exceptional or for humans to know and live in the world at all. However, Purtill's concept is once again resting on a definition that assumes a rigid *a priori* conception of natural law. Many things happen that may appear to be out of the regular order of the universe that are simply not fully understood by natural science. If *miracle* is defined by *a priori* natural law, then all unexplained events must be dubbed "miracles" until science catches up and identifies them as natural or fails to do so, leaving them to naturalist speculations that future scientific advances may eventually explain them. However, if *miracle* is defined

³⁰ Ibid.

³¹ Ibid., 63

based on God's action, such misconceptions will not occur. God's entrance in the universe is only problematic if it damages the system of the universe. If the His entrance does not negatively affect the universe, then there is no problem.

Purtill points out that there is no evidence that Hebrew thought had any conception of rigid laws of nature. That is, Hebrew people of course did not conceive of rigid *a priori* natural laws in the same manner as modern and contemporary thinkers. However, the Hebrews clearly acted in accord with the regularities of the world. For instance, they took part in agricultural efforts and were amazed by such events as the crossing of the Red Sea.

Some authors have suggested that the Hebraic worldview had no formal notion of 'laws of nature' and that defining a miracle as a 'temporary exception to the natural order of things' is anachronistic, especially if we explain the 'natural order of things' in terms of natural laws. But that is precisely why I have used the phrase 'the natural order of things.' The Hebrews at the time of the crossing of the Red Sea knew perfectly well what naturally happened to the sea. The fact that the Red Sea parted to enable the children of Israel to cross dry shod could seem by them as exceptions to the way things naturally occurred."³²

It is obvious that the Hebrew people could recognize a wondrous event when it occurred. They simply did not have a modern conception of natural laws. Certainly, they recognized that men do not normally ascend into the air even though they had no teaching on the concept of gravity developed by Isaac Newton. The point is that they recognized the wondrous working of God. Human perception of natural order from day to day experience is vital to the recognition of miracles. It cannot be ignored. This aspect of Purtill's argument is correct. However, the fact that the Hebrew people had a conception of natural order and still accepted the existence of miracles does not necessarily support Purtill's view that a miracle is a "suspension" of natural law.

³² Ibid., 63-64.

Miracles require evidence of the power of God. For Purtill, the most important part of his definition of *miracle* is that “A miracle must be caused *by the power of God.*”³³ For an event to be a miracle in the classical, Christian sense, it must be the result of God’s action in the universe. Here his definition hits the mark. Clearly, for a miracle to be “miraculous” in the formal Christian sense, it must be the result of God’s specifically enacted power. Thus, he writes, “We must include within our definition, then, the idea of miracle as a *sign* of God’s action.”³⁴ For Purtill, an example of a “sign” would be Jesus’ prediction of His own resurrection before its actual occurrence. Jesus’ prediction of the miracle evidences that He had knowledge or even control over the event. Indeed, an important element of any definition of *miracle* is the emphasis on God’s action, because the purpose of *miracle* is to reveal God. However, it seems from a cursory look at Scripture that God’s action is the only thing necessary for a miracle. As was previously mentioned, the Hebrews did not need a formal concept of natural law in order to recognize signs and wonders which they took to be events affected by the power of God. The sign of God’s action in a wondrous event set it apart as a miracle. The sign of God’s action sets it apart from a strange natural event while the wondrous nature of the miracle sets it apart from mere providence.

Purtill’s view in light of Relativity Physics. Purtill can be commended for his efforts to emphasize the importance of God’s action in miracles. His efforts to emphasize the possibility and centrality of God’s action positively influence the effort to adequately define *miracle*. However, Purtill’s definition is flawed from the start, because it does not

³³ Ibid., 64.

³⁴ Ibid., 64.

begin with the vital element of God's relational action. That is it not rooted in a relational understanding of the God-world-human relation. Additionally, he has not fully developed the definition to explain the subsequent effects of a "temporary exception" to *a priori* natural law so crucial in a "Newtonian" universe. His definition is unworkable in light of relativity physics. Within relativity physics, the universe operates with innate natural order that is contingent and relative. Thus, God's action in the universe would not "break" natural law. God could act miraculously, in that He is a supernatural power acting in the natural order of the universe. However, His action would simply affect *a posteriori* natural law, rather than break *a priori* natural law. Such a definition would be rooted in an understanding of the God-world-human relation that sees the universe as "open up" to the action of God.

Richard Swinburne

Richard Swinburne, Professor of Philosophy at Oriel College, Oxford University, defines *miracle* via *a priori* natural law, much like Purtill. However, while Purtill calls for only a temporary, local cessation of the laws of nature, Swinburne claims that a hard break in the natural order is required for an event to be a miracle. This is different from Purtill's view in that natural law is not merely "suspended" but actually broken. While the difference between these two views is probably little more than semantics, Purtill's view at least attempts to avoid the repercussions of a "hard break" by substituting the word "suspension." Swinburne's view, on the other hand, requires that God "break" the natural law of the universe. This emphasis on a hard break in the natural order seems to evidence a dualistic conception of the universe rooted in Newtonian physics.

Miracles as “violations” of the laws of nature. Our investigation of Purtill’s view showed that problems arise out of even the temporary, local arresting of natural law.³⁵ However, the idea that rigid *a priori* laws of nature could be completely broken would seem at least to bring greater problems, problems Purtill attempted to avoid with his definition.³⁶ According to Swinburne, however, such a conception is logically valid and even necessary. He says, “The concept of a violation of a law of nature is coherent, and we must reject the views of [those] who claim that it is not logically possible that a [*a priori*] law of nature [can] be violated.”³⁷

Granted, to the classical Christian, God is omnipotent and can do anything that is in accord with His nature. However, if human beings are to understand the concept of *miracle* against the backdrop of a particular understanding of the universe as *God’s* creation, both their understanding of the nature of the universe and their understanding of the nature of God in relation to it must not conflict! For the Christian, the universe must be understood by its relatedness to God’s creation, providence and Incarnation.³⁸

Clarifying his definition of *miracle*, Swinburne defines laws of nature as “principles embedded in nature determining what happens.”³⁹ Standing alone, this understanding of natural law is not necessarily deterministic. However, Swinburne’s view that a “hard break” is necessary points toward a rigid view of *a priori* natural law.

³⁵ However, it is not clear how such effects can remain “local.”

³⁶ As we will see, it is difficult to distinguish between Purtill’s view of a “temporary suspension” of natural law as opposed to Swinburne’s view of a “break” in natural law. Notably, the difference between their definitions seems to be very small. One might argue that Purtill has simply explained his definition in a way that sounds less problematic than Swinburne’s.

³⁷ Richard Swinburne, *The Concept of a Miracle*, (London: Macmillan, 1970), 28.

³⁸ Thomas Forsyth Torrance, *Reality and Scientific Theology*, (Wipf and Stock: Eugene, 2001), ix.

³⁹ Richard Swinburne, *The Resurrection of God Incarnate* (Oxford, Clarendon, 2003), 17.

Relying on this definition of natural law, Swinburne attempts to prove that a strong violation of nature is coherent.

The way things behave depends on God (or some other supernatural agent) and he can alter this on isolated occasion, while conserving the normal way things behave on other occasion(s). We need a looser conception of a law of nature so as not to rule out that logical possibility...That allows the logical possibility of a 'transgression,' or, as I shall call it, a violation of 'law of nature.'⁴⁰

In Swinburne's conception, natural law depends on God, existing and functioning as He designed it to exist. Thus, in Swinburne's view, God controls natural law, and thus is free to change it for His purposes. While Swinburne's resulting conception of natural law is then coherent in this respect, it does not align itself well with his definition of *miracle*. For if God manipulates natural law to enact a miracle then He is not violating His natural law. He is only "violating" what humans perceive to be the regularity of natural law. Thus, the "hard break" Swinburne's view necessitates is ruled out by his own understanding of the God-world-human relation. This *ad hoc* interjection of a "looser conception" of natural law does not align with the rest of Swinburne's definition.

According to Eleanore Stump, Swinburne develops his definition of *miracle* out of a somewhat deistic view of the God-world-human relation, believing that God has only acted in history a few specific times and has otherwise left the universe to its natural order.⁴¹ Swinburne sees God's relation to the universe not as an active and saving interrelation, but as a cosmologically dualistic separation of natural from supernatural, breached only on few occasions for redemptive revelatory purposes. Swinburne's call for a "hard break" and his dualist understanding of the God-world relation evidence that he

⁴⁰ Ibid., 18.

⁴¹ Eleonore Stump, "Revelation and Biblical Exegesis: Augustine, Aquinas, and Swinburne," *Reason and the Christian Religion*, ed. Alan G. Padgett. (Oxford: Clarendon, 1994), 166.

presupposes a Newtonian view of the universe. However, his seemingly *ad hoc* call for a “looser conception” of natural law makes it difficult to label him Newtonian.

Miracles in relation to the physical sciences. God’s redemptive self-revelation in history is exactly what is at stake in defining *miracle*. If a miracle is a “break” in natural law, then it is not something that can be known within the framework of the natural world, for by definition, it is not a part of it. It is a break. In order for the miracle to reveal God, it must be coherently observable to human beings. This does not necessarily mean that a miracle must occur in strict accord to natural law. However, it does mean that it must occur within the observable in a way that we can, in some measure, understand it in space-time terms. According to Purtill, Swinburne’s definition rules out any scientific study of miracles.

Swinburne seems to think that scientists must regard nature as a ‘closed system’ and make predictions on that basis. If something from outside of nature operates to change the natural order of things, the scientist, as a scientist, has no professional concern with it.⁴²

This is a problem. While scientific observation cannot prove that God performed the miracle, it can establish that it occurred as a historical event. Actions within the natural world must be at least observable at some level to the sciences. That is they can be studied as historical events. If they cannot be observed or studied in this manner, they cannot be taken seriously as historical events. It is not necessary that the miracle be explained or fully understood, but the event must be capable of being subjected to scientific or historical inquiry. What is to be made of a “break” in the order of the universe? Such an anomaly cannot be easily observed because the “break” itself is not a part of the observable order of the universe. It cannot be studied or evidenced with

⁴² Purtill, 69.

scientific investigation. Swinburne's definition does not rule out observation. However, the definition makes it difficult to study the miracles. While *miracle* does not depend on the scientist to make it revelatory, it must be observable to the human being to be revelatory.

Swinburne's view in light of Relativity Physics. Swinburne perceives the universe in much the same mechanistic, predictable terms that Newton did. Advances in subatomic physics call these mechanistic conceptions into question.⁴³ If the world is not as rigid and deterministic as Swinburne's "hard break" implies, then his definition needs to be re-considered in light of a view of the universe that understands the universe as "open up" to God's interaction and self-disclosure.

In light of Einsteinian physics, his model leaves much that remains unanswered. Swinburne's definition has many of the same problems as Purtill's, not the least of which is that in relativity physics, the universe does not operate as a closed system of necessitarian, mechanistic cause and effect. According to relativity physics, the universe operates with a natural order as bodies in motion relate to one another in contingent relationships. The contingent order of the universe is dependant on the rationality, i.e. ordered intelligibility, of God. God gives rational, non-deterministic order to the universe. If the cosmos is thus "open up" to God then He can "control" that order by simply acting in it. Thus, as God acts in the universe, He does not break natural law or "break open" the universe, but affects it, i.e., He acts within it according to his rational

⁴³ Notably, Swinburne appears not to be aware of the implications of Einstein's theories of General and Special Relativity. While his model may not address all the issues related to the new physics, it does not mean he is ignoring the facts.

nature as He reveals Himself historically in it. Swinburne's view of *miracle* does not make sense within an Einsteinian universe.

Rudolf Bultmann

Miracles Require "Demythologization." Rudolf Bultmann's Newtonian presuppositions affect Christian definition of *miracle* more severely than any other in this group. Like so many others, Bultmann claims a "scientific world-view" which essentially rules out any direct divine historical action in the universe. Bultmann states, "In any case, modern science does not believe that the course of nature can be interrupted or, so to speak, perforated, by supernatural powers."⁴⁴ Thus, the historical, orthodox view of the incarnation is incongruent with his modernist, determinist conception of the universe. Bultmann understands the universe to be dualistically separated from God i.e., God cannot "enter" or act directly in the physical universe to reveal himself. In his view, God cannot act within history because the necessitarian cause and effect order of the universe closes it off from any supernatural action. That is, the mechanistic universe, operating with a strict system of cause and effect cannot be acted upon by an outside "cause" that cannot itself be affected.⁴⁵

Hence, the universe, and so humanity, is closed off from any direct action or self-revelation from God. As a result, Bultmann is forced to re-interpret or "demythologize"

⁴⁴ Rudolph Bultmann, *Jesus Christ and Mythology*, (Charles Scribner's Sons: New York, 1958), 15.

⁴⁵ *Ibid.*, 37-8.

the Scriptural portrayals of miracles, especially Jesus as the God-man and His resurrection in a way that conforms to his “closed” view of the universe.⁴⁶

Obviously this view renders the historicity of miracles of the New Testament, including the Incarnation and resurrection of Christ, impossible. Bultmann’s Newtonian presuppositions forced him to completely re-define the teachings of the New Testament regarding miracles. Torrance speaks to this issue in *The Ground and Grammar of Theology* as well as in his other books.

Undoubtedly the immediate fears of these theologians, and their cultivated separation of theology from science, are tied up with false notions of science as well as of theology. Particularly damaging in its influence upon them, however, has been the prevalent conception, obsolete though it is, of the universe as a mechanistic system, or a closed continuum of cause and effect, characterized throughout by a hard determinism.⁴⁷

Of Bultmann, Torrance specifically says, “As an instance of this some of you may recall Rudolf Bultmann’s view of the world in which even history figures as a closed continuum of effects regarded as individual events connected by the succession of cause and effect.”⁴⁸ Clearly Bultmann and Torrance have radically different definitions of the nature of *miracle*, and so different conclusions about their historical possibility, because they approach the topic with radically different presuppositions about the relation the nature of the universe in relation to which all historical events occur as well as radically different presuppositions about the relation of God to the universe.

⁴⁶ Some theologians do not believe the New Testament teaches that Jesus was both God and man. However, this is the historical, orthodox view. This view is presupposed by the thesis.

⁴⁷ Thomas F. Torrance, *The Ground and Grammar of Theology*, (University of VA: Charlottesville, 1980), 18.

⁴⁸ *Ibid.*, 18.

Bultmann argues that the primary message of Jesus Christ is the Kingdom of God.⁴⁹ However, according to Bultmann, the New Testament's teaching about the person of Christ has been "mythologized from the very beginnings of earliest Christianity."⁵⁰ That is, they were understood and recorded by people with a "mythological" worldview. This means that such biblical teachings as the Incarnation, the virgin birth, the hypostatic union and the resurrection were handed down to Christianity from Jewish and Greek mythologies. Bultmann thinks that beliefs like the virgin birth, Incarnation, and resurrection really came about as Jewish and Greek mythology found its way into Christian thought. For Bultmann, "mythology" refers to the worldview presupposed by the teaching of Jesus and all ancient peoples. It is the view that the world is made up of heaven, earth and hell and that supernatural powers intervene in the affairs of human beings.⁵¹ Miracles are not historically accurate. He writes, "modern science does not believe that the course of nature can be interrupted or, so to speak, perforated, by supernatural powers."⁵² His presupposed dualism resulting in deism causes him to rule out *a priori* any notion of God's action in history. That is any miracle mentioned in Scripture, including the Incarnation, is denied as a historical act of God, because miracles are not possible within Bultmann's scientific worldview. However, wishing to find some value in the New Testament account, Bultmann develops his hermeneutical method termed "demythologization" for extracting truth from the Scriptures.

⁴⁹ Bultmann, *Jesus Christ and Mythology*, 11.

⁵⁰ *Ibid.*, 16.

⁵¹ *Ibid.*, 15.

⁵² *Ibid.*

In order to understand Bultmann's hermeneutical method, it is first necessary to understand his "physics." One must keep in mind that Bultmann believes the New Testament was written in a "mythological" worldview that no longer has meaning for people who hold to a modern world view. Bultmann attempted to separate faith from the "scientific" understanding of the physical world. Bultmann says that to expect people to accept the New Testament worldview "would be both pointless and impossible."⁵³ His dualism is an attempt to "protect" Christian faith from the scrutiny of science. He tries to find value in the New Testament that is not dependent on historical events vulnerable to scientific scrutiny. In this way, he would make it impossible to "disprove" the New Testament. For him, the core of the message of Christ is not the mythological genre of the New Testament. Instead the truth of the Gospel but is buried within the myth of the New Testament, necessitating "demythologization" to extract the core truth of the Gospel.⁵⁴

Yet, Bultmann does believe that the New Testament has value to modern, existing human beings. But to become valuable it must be properly interpreted.

We must ask whether the eschatological preaching and the mythological sayings as a whole contain a still deeper meaning which is concealed under the cover of mythology. If that is so, let us abandon the mythological conception precisely because we want to retain their deeper meaning.⁵⁵

Bultmann defines "myth" as "the report of an occurrence or an event in which supernatural, superhuman forces or persons are at work."⁵⁶ Such events are called

⁵³ Rudolf Bultmann, *The New Testament and Mythology*, (Philadelphia: Fortress, 1984), 2.

⁵⁴ Bultmann, *Jesus Christ and Mythology*, 16.

⁵⁵ *Ibid.*, 18.

⁵⁶ Bultmann, *The New Testament and Mythology*, 95.

“myth” because they are not possible within Bultmann’s Newtonian “scientific” worldview. In his view, the miraculous accounts in Scripture, while not literally true, express a deeper truth that has value to modern human beings. Therefore, rather than seeing the New Testament as a false document, he proposes a new hermeneutic which he calls “de-mythologization.” “Its aim,” writes Bultmann “is not to eliminate the mythological statements but to interpret them. It is a method of hermeneutics.”⁵⁷ Bultmann is attempting to affirm the value and use of miraculous accounts by developing an appropriate system for interpreting mythological contexts.

Demythologizing Miracles to accommodate Newtonian physics. In demythologizing, Bultmann essentially re-interprets supernatural events of Jesus into existential, twentieth century, Heideggerian terms. Making the message of Jesus a matter of existential thought separates it from the physical realm relating it only to the non-physical realm. This “preserves” it against the claims of rigid “scientific” determinism of the universe which he believes is required by modern, “scientific” concepts. In doing so, Bultmann separated Christianity from the requirements of the sciences, keeping all matters of faith “safe” from the scrutiny of any rational, scientific questioning. This dualistic separation allows him to apply existentialist thought to religion without fear of critical scrutiny from the sciences. However, in separating the miracles of Jesus from natural reality, he eliminates the possibility of any personal, redemptive, knowledge of God, because he is ruling out the redemptive self-revelation of God to human beings. Separating the gospel from the physical realm also separates it from the field of objective

⁵⁷ Bultmann, *Jesus Christ and Mythology*, 18.

human knowledge. Thus, the “truth” of Scripture is reduced to an existential experience absent of declarative truth. Torrance addresses the issue.

With this initial assumption, he [Bultmann] had to rule out of court anything like incarnation or miracle or resurrection, on the ground that they would rupture the continuum of historical happenings through the alleged interference of supernatural, transcendent powers. But he had also to rule out of consideration any objective act of God within the cosmos, for example, in the crucifixion of Christ, which in point of fact emptied the atonement of any real saving content for men and women of flesh and blood within this world of space and time.⁵⁸

For Bultmann, this is a moot point. From his perspective, Christian concepts like atonement and eternal punishment have no real meaning for modern man largely because they cannot within a Newtonian framework. They are part of “an ancient world-view which is obsolete.”⁵⁹ Therefore he does not concern himself with the fact that his worldview and hermeneutic voids the atoning work of Christ. For him, atonement is not necessary. Existential restored authenticity with self and God is the need that Bultmann sees as the demythologized interpretation of the atonement.

Fearing the effects of his own modernist scientific thinking on the Christian faith, Bultmann sought to remove and so exempt what remains of the Christian message from this destructive “closed” universe by applying it within an existential framework and thereby being embedded not in history but in human subjective “authenticity.”

The effect of all this was to make Bultmann offer an existentialist reinterpretation of the Christian message, in which it would be made safe from the critical investigation of science—or, otherwise expressed, in which the advances of scientific understanding of the universe would be quite irrelevant for Christian existence and faith.⁶⁰

⁵⁸ Torrance, *GGT*, 18-9.

⁵⁹ Bultmann, *Jesus Christ and Mythology*, 36.

⁶⁰ Torrance, *GGT*, 19.

Torrance writes, “While existentialism has much to say about being, it does not admit of any concept of the *logos* inherent in being; being, therefore, cannot be known in its inner relations. Thus, existentialism remains trapped in the Kantian dualism.”⁶¹ Torrance is referring here to Immanuel Kant’s epistemological dualism. Kant maintains that it is impossible to know the *Ding en sic* (the thing in itself).⁶² By this, he means that man cannot know things as they truly are, i.e., essences. As a result, knowledge of that which is other than ourselves severely curtailed. Bultmann’s existentialism fails, despite his attempt to remove “truth” from the confines of modernist science. Without actual knowledge of God in the realm of space-time existence, humanity cannot be redeemed for redemption is grounded in truly knowing God.⁶³

Bultmann’s efforts, like the efforts of so many modernist theologians are destructive to the objective self-disclosure of God in Jesus’ incarnate life, death and resurrection. When the Christian faith is removed from any real relation to the historico-physical, four-dimensional space-time continuum, it loses all effect on and relation to that realm. Bultmann may have succeeded in separating Christianity from the railings of modernist science, but he has thereby destroyed the message in the process. However, Bultmann believes that he has successfully interpreted the “husks” of mythology through “demythologizing,” illuminating the existential truth within myth that frees humanity. For him, the very need for the “message” is changed when the antiquarian world-view of the New Testament is replaced with a modernist scientific worldview. Torrance

⁶¹ Ibid., 34-5.

⁶² Kant, xxxiii.

⁶³ Bultmann did believe that God had indirect relation to human beings through the Kerygma.

comments, “Such a segregation of Christianity from science, of course, also has the effect of making it impossible for Christian theology or ethics to have any impact on the development or deployment of modern science and technology. Behind all this lies a disastrous dualism.”⁶⁴ Torrance targets that dualism which is the heart of the problem, specifically the Newtonian dualistic separation of God from the world and the Kantian separation of the truth of God from the human knower.

Contrary to Bultmann, Torrance argues for “theological science.” He says that as Newtonian dualist thinking is replaced with an Einsteinian unitary view of the God-world-human relation that allows for His interaction in the universe, we can approach theology scientifically. This “theological science” is properly objective knowledge of the proper object out of its own self-disclosure.⁶⁵ Torrance writes that theological science is not the same as “formal” science but that it is none the less a “real” science.⁶⁶ This scientific approach to theology is made possible by post-Newtonian, i.e. Einsteinian advances in physics.

Bultmann comments that “Myths give worldly objectivity to that which is unworldly.”⁶⁷ Admittedly, theology is *fides quaeren intellectum* (faith seeking understanding).⁶⁸ As it applies to God’s redemptive self-revelation in Jesus Christ, theology is the outcome of faithful reflection on the knowledge God gives in Christ. But,

⁶⁴ Torrance, *GGT*, 19.

⁶⁵ Thomas F. Torrance, *Theological Science* (New York, Oxford, 1969), iv-vi.

⁶⁶ Torrance, *RST*, 65-6.

⁶⁷ Bultmann, *Jesus Christ and Mythology*, 19.

⁶⁸ Though, in Bultmann’s view it is not knowledge or understanding of God that is gained, but rather existential authenticity.

perhaps objective knowledge is possible, despite the modernist conceptions of such thinkers as Bultmann.

To de-mythologize is to reject not Scripture or the Christian message as a whole, but the world-view of Scripture, which is the world-view of a past epoch, which all too often is retained in Christian dogmatics and in the preaching of the Church. To de-mythologize is to deny that the [gospel] message of Scripture and of the Church is [inextricably] bound to an ancient world-view which is [now] obsolete.⁶⁹

When Bultmann refers to the world-view of Scripture as obsolete, he means that the people of the New Testament saw the world as a place where miracles did regularly occur. He believes the modernist, scientific world-view is much more accurate to how the universe really works. However, the modernist world-view Bultmann accepts is in many ways obsolete itself. Indeed, what if recent trends in physics reflect a universe not “closed” but rather “open” to that which lies beyond.

Bultmann writes, “The attempt to demythologize begins with this important insight: Christian preaching, in so far as it is preaching of the Word of God by God’s command and in His name, does not offer a doctrine which can be accepted either by reason or by a *sacrificium intellectus*.”⁷⁰ Ambiguously, in terms of “doctrine” Bultmann seems to call us to something between rationality and fideism.⁷¹ While it is not clear what that is, it is clear that in his view, Christianity cannot be rationally accepted. That is, Bultmann does not believe that Scripture can be taken at face value, i.e., as stated in ancient terms in the modernist scientific sense. For him, Christian teaching is not rational or true in the same way that the physical sciences rational.

⁶⁹ Bultmann, *Jesus Christ and Mythology*, 36.

⁷⁰ *Ibid.*, 36.

⁷¹ Bultmann seems to imply that preaching should offer a “demythologized doctrine.”

Modern man acknowledges as reality only such phenomena or events as are comprehensible within the framework of the rational order of the universe. He does not acknowledge miracles because they do not fit into this lawful order. When a strange or marvelous accident occurs, he does not rest until he has found a rational cause.⁷²

“Modern man”⁷³ here denotes a myriad of thinkers including Bultmann, David Hume, the early thought of Antony Flew and especially Immanuel Kant.

Bultmann’s comments also reflect the modernist preconceptions of David Hume. Hume’s view of miracles is “that no human testimony can have such force as to prove a miracle, and make it a just foundation for any such system of religion.”⁷⁴ Thus, he argues that because human beings observe the universe operating normally most of the time, the eyewitness evidence against miracles overwhelms any testimony of a miracle. As far as Hume is concerned, there is no way to prove that miracles exist. Of course, he does not prove that they do not. Instead, he rules them out by definition, stating that anything that happens in the natural realm is natural. If it exists, by his conception, it is natural. The philosophical presupposition that Hume brings to his interpretation of strange events is that no matter what, they are not miracles.

Such naturalism must pre-suppose any apparent miracle must be methodologically identified as defined above. Thus, a naturalist, rather than categorizing an event as a miracle, will attempt rather to either disprove that the event occurred at all, will explain it in “natural” terms, or will expand his definition of nature to include the

⁷² Bultmann, *Jesus Christ and Mythology*, 38.

⁷³ Not an elitist statement but a generalized statement about modern culture meaning “modern people.”

⁷⁴ Hume, 42.

miracle. In Hume's case, this requires seeing everything as "natural." If it exists, he calls it "natural."

The temptation here is to suggest that further advances in our scientific knowledge may verify several of the miracle stories in the Bible in the same sort of way. But this is not a bit of help to the apologist if the progressive verification is achieved... Suppose that all the miracle stories in the New Testament were true, but that none of the events that occurred were genuinely miraculous [They were not direct acts of God but caused by something else].⁷⁵

In that case, as in the case of Bultmann's view of *miracle*, the message of Jesus has no real, redemptive value for human beings.

Bultmann's view in light of relativity physics. Consequently, Bultmann's Newtonian, and consequently dualistic, view of the universe and the God-world relation keeps his definition from having any real meaning in the contemporary scientific world, because the physics upon which his view is based has been replaced with the general and special relativity physics of Albert Einstein. The universe is no longer understood by scientists as a closed, mechanistic system of cause and effect.⁷⁶ Instead, Einstein's theory of relativity, applied theologically by Thomas Torrance, views the universe as contingent and open to the interaction of God. Bultmann ruled out God's divine self-revelation because his Newtonian presuppositions. He developed his interpretive methodology of de-mythologizing because he could not accept the Scriptural accounts of God's direct, historical miraculous self-revelation. Much like physicists have moved from Newtonian

⁷⁵ Antony Flew, "Neo-Humean Arguments About the Miraculous" *In Defense of Miracles* (InterVarsity: Downers Grove, Illinois, 1997), 53.

⁷⁶ While the scientific world has moved to a more "open" view of the universe, the culture as a whole has not necessarily caught up with the advances of physics.

physics to relativity physics based on new evidence, so Bultmannian theologians must move from de-mythologizing to an orthodox hermeneutic.

C.S. Lewis

Prominent literary scholar and critic, and Christian “apologist” C.S. Lewis defines *miracles* as “an interference with Nature by supernatural power.”⁷⁷ In *Miracles*, Lewis gives a broad enough definition to include or allow for all three of the previously mentioned representative persons save Bultmann. Lewis uses “Nature” to refer to the whole of the universe, including human beings. To further explain his definition, Lewis adds that “Unless there exists, in addition to Nature, something else which we may call the supernatural, there can be no miracles.”⁷⁸ To put it simply the one real requirement Lewis has for miracles is the direct historical involvement of the supernatural in the natural world. This means that miracles can only be recognized as miracles if they contrast with the regular pattern of the universe. This is a broad definition, because “interference” can mean many things though it inclines to the negative.

In order for the reader to better understand what he means by “supernatural,” Lewis gives a definition of Nature. He writes, “In all the examples Nature means what happens ‘of itself’ or ‘of its own accord’: what you do not need to labour for; what you will get if you take no measures to stop it.”⁷⁹ For example, left to itself, the Red Sea does not divide and leave dry ground for people to walk through it. However, God, a supernatural force parted it, allowing His people to walk across on dry land. Thus, in

⁷⁷ C.S. Lewis, *Miracles*, (San Francisco: HarperCollins, 1996), 5.

⁷⁸ *Ibid.*, 5.

⁷⁹ *Ibid.*, 7.

Lewis' view, a miracle is something that happens that would not have happened apart from some reality in addition to or beyond nature.⁸⁰ This is a rather broad definition.

Lewis' view of the God-world relation. Lewis juxtaposes his definition of *miracle* over against a Naturalist definition of *Nature* as “everything” that is.⁸¹ Lewis argues for a supernatural realm that is distinct from the natural realm while relationally active in it. Lewis emphasizes that a miracle cannot be defined as something that “breaks the laws of Nature.”⁸² Lewis' uses the term “interfere” to describe God's action on the universe as opposed to the term “break.” While “interfere” seems to have a negative connotation, Lewis does not describe negative interference but relational action. In fact, Lewis describes the action of supernature, i.e. God's action, to have the same relationship to the natural order of the universe as does the action of natural beings. He notes that “It is one more bit of raw material for the laws to apply to.”⁸³

Instead of focusing on natural law to define *miracle*, Lewis focuses on the activity of God as central to the definition of *miracle*: “A miracle is emphatically not an event without cause or without results. Its cause is the activity of God: its results follow according to Natural law.”⁸⁴ This is a second valuable conception from Lewis, because he brings the focus of *miracle* back to the act of God rather than to the nature of the universe in relation to the miracle. This conception is very similar to Torrance's view

⁸⁰ It does not seem that Lewis is directly denying divine sustenance.

⁸¹ Lewis, *Miracles*, 6.

⁸² *Ibid.*, 94.

⁸³ *Ibid.*

⁸⁴ *Ibid.*, 95.

that emphasizes space as created by the relation between entities or bodies rather than as a “container.”

Therefore, Lewis describes a very relational view of the God-world relation that allows for God to act in the universe without breaking natural law. Instead, natural law applies to the action of God as applies to the action of natural beings. Lewis illustrates his understanding:

If I knock out my pipe I alter the position of a great many atoms...Nature digests or assimilates this event with perfect ease and harmonizes it in a twinkling with all other events. It is one more bit of raw material for the laws to apply to, and they apply. I have simply thrown one event into the general cataract of events and it finds itself at home there and conforms to all other events.⁸⁵

Lewis does not interact with Einstein or Torrance of course. However, his description of the God-world relation allows for an Einsteinian view of the universe. His description of *miracle* allows for God to act in the universe without breaking or suspending natural law.

Lewis' view in light of relativity physics. Lewis' understanding of *miracles* is rather comparable to the new physics, because he explains that the natural order of the universe is applied as God acts relationally on the universe. The universe is thus relationally “open” to the action of God. Still, compared to Torrance, Lewis' definition lacks one thing in that it does not give any specific explanation of a universe that is open to the work of God. It only speaks to the subsequent results on natural law after the miracle has occurred. For this more specific understanding of the God-world-human relation, we will look to Torrance. However, Lewis has provided a valuable, though broad definition of *miracle* that provides a starting place for a much deeper study of the God-world-human relation and so of *miracle*. Beginning with an understanding of

⁸⁵ Ibid., 94.

miracles as possible, one can develop an understanding of the universe that allows for their existence.

The Fundamental Problems of Most Modern and Contemporary Christian Approaches to the Nature of *Miracle*

It appears to be inevitable that one's definition of *miracle* is directly dependent on a one's view of Nature and the character and limits of the perceived natural system. Consequently, the root of the dispute over the definition of *miracle* comes from fundamentally incongruent views about the universe and the God-world-human relation in such a universe.

Modernist Conceptions Begin by Judging Miracles against *a priori* "Nature"

Fundamental problems arise when scriptural teachings about God's action in the universe are forced into a mechanistic understanding of the universe that denies the possibility of His action. Such conflicting conceptions produce inevitable inconsistencies in the theological systems.

Science is quite unable through demonstration of this kind to provide the basic belief in the objective rationality of the universe or the aspiration toward truth and understanding which it clearly requires. Without profound faith of this kind, which comes from religion and revelation, science would be inconceivable.⁸⁶

For Torrance, belief in objective rationality of truth is a prerequisite to scientific knowledge. In other words, one must believe that objective truth exists in order to apply the scientific method to find it. Torrance's understanding of this concept comes directly from Michael Polanyi's view that human knowledge requires a framework of faith to

⁸⁶ Thomas F. Torrance, *Christian Theology and Scientific Culture*, (Oxford University: New York, 1980), 7.

support it.⁸⁷ Polanyi develops an understanding of human knowledge and its relation to objective reality in his book *The Tacit Dimension*, stating that there is a “structural kinship between subject and object.”⁸⁸

God has revealed Himself, thus truth exists. In the same way, God has spoken, thus the universe is “open” to His revelation. This belief is necessary in order for knowledge of God to be possible, i.e. faith seeking understanding. For this reason, it is necessary to begin the process of defining *miracle* with the presupposition that God has acted in the universe to reveal himself. The church fathers and Torrance developed their theology in this manner, i.e., God has spoken, thus the universe is “open”. Rather than allow Platonic and Stoic thinking to dictate their understanding of the God-world-human relation, they developed their view in relation to the doctrines of creation and Incarnation.⁸⁹

Modernist Conceptions do not address *miracle* with proper objectivity

Human beings can never know from observation that things always act in a predetermined way. To say that all things must act according to *a priori* natural law, as we understand it, is presumptuous, because it assumes that man sees the majority of what goes on in the universe and can thus give a general judgment of what normally happens. Further, one cannot claim that any part of the universe is uniform. There is no *a priori* way to know all reality with absolute certainty.

⁸⁷ John Douglas Morrison, *Knowledge of the Self-Revealing God in the Thought of Thomas Forsyth Torrance*, (New York: Peter Lang, 1997), 70.

⁸⁸ Michael Polanyi, *The Tacit Dimension*, (Garden City, New York: Anchor, 1967), 29-30.

⁸⁹ Torrance, *STI*, 11.

Thus, even if humans accept a Newtonian universe, they can never really know when something “breaks” or “suspends” *a priori* natural law, because no one human know what happens in most places most of the time since there is no way to know that any one person’s experience, or the perception of the whole human race for that matter, is wide enough to be considered infallible on the subject of natural law.

David Hume assumed that what observably occurs most of the time is sufficient to overrule any testimony that something has acted to the contrary.⁹⁰ In other words, any account of a miracle is essentially ruled out by the fact that human experience inevitably points to the universe functioning without miracles. There are far fewer people that claim to have seen a miracle than there are who make no such claim. Therefore, such general experience means we must assume that no such event has occurred. David Hume sees this as a practically valid argument.

However, Hume’s argument is flawed because it rests on the modern assumption that the way the universe appears to behave most of the time is the way it must always behave without exception. This is why human perception cannot define natural law as a fixed *a priori* system of rules. Because human beings cannot state with absolute certainty the laws the universe will obey in all places and times, there are inherent difficulties when anyone defines a *miracle* as an event that breaks fixed *a priori* laws of nature.

Miracles are difficult to understand

The primary purpose of a miracle is to reveal God. God’s purpose in the Incarnation, as well as in all other miracles, is to redemptively reveal Himself to human beings to restore them to right relationship with Him. If human beings define *miracle*

⁹⁰ Hume, 33.

within a fixed, mechanical, *a priori* system of natural law that rules out the possibility of miracles by definition, their revelatory nature is lost because they will not be conceivable within the human framework of understanding as defined by that rigid system. Any attempt to define miracles within that system is not coherent.

As events of divine revelation, miracles must be rationally knowable.⁹¹

Therefore, if miracles exist, it is imperative that they exist within a rational universe of order wherein human beings can know reality and the God thus revealed without developing an incoherent conception of the universe. This means that a proper definition of *miracle* will begin with a belief that miracles do happen and will seek to understand the universe in a way that is open to them.

The Need: A Non-Newtonian Approach to *Miracle*

A contemporary subjectivistic, human-centered approach to miracles does not adequately answer current scientific understanding of the universe that was ushered in by Albert Einstein and others. The subjective “bottom-up” approach was necessitated by Newtonian physics and is thus now dated.

Methodologically, then, this new approach to *miracle* does not rule out miracles *a priori* or make their assertion incoherent. Instead, it begins with the presupposition that miracles are possible given an appropriate God-world-human relation. Following this Nicene, non-Platonic, patristic method makes it possible to understand the universe in relation to God’s redemptive-revelatory purpose, i.e., the universe is defined by God’s creative-redemptive acts, not *a priori* laws. As noted previously, deterministic *a priori*

⁹¹ Here, “rationally knowable” is not used in reference to pure human reason alone, but to truth as it has given itself to be known as it is.

natural laws effectively close off any relational interaction between God and the universe. Unfortunately, as was evidenced earlier, many Christian thinkers choose to adapt their view of *miracle* to adhere to such modernist thought, appropriately unaware of the change that has taken place. Torrance refers to Thomas Kuhn's book *The Structures of Scientific Revolutions*, noting that as scientists work creatively and make advances in the sciences, their discoveries can run in opposition to the prevailing thought of their field.⁹² Kuhn describes these changes as "destructive-constructive paradigm changes" and notes that they can come in the form of both discoveries and new theories.⁹³ Torrance notes that modernist theology has operated in the opposite way. Instead of advancing their science, they limit themselves within the current scientific-conceptual paradigms, halting the advance of theology.⁹⁴ Theologians must begin with the pre-supposition that miracles are coherently possible and then seek to advance past the limits of dualistic modernist thought.

Then, beginning with the presupposition that miracles can occur (as established previously via Einstein) will allow for a firm foundation to build a proper understanding of miracles within the universe. This presupposition can be justified through observation as human beings recognize instances of supernatural intervention and study them objectively. While naturalist presuppositions would rule out such instances by definition, the formulation of a clear, orthodox, Christian understanding of *miracle* must begin with

⁹² Torrance, *RST*, 154.

⁹³ Thomas S. Kuhn, *The Structure of Scientific Revolutions*, 2d ed., (Chicago: University of Chicago, 1996), 66.

⁹⁴ Torrance, *GGT*, 48.

the belief that miracles have occurred within the realm of space-time. This belief is necessary in order to recognize evidence of miracles rather than rule them out *a priori*.

According to the classical Christian understanding of biblical miracles, a *miracle* is a supernatural, historical event whereby God reveals Himself to people in history. Miraculous events only make sense within the context wherein God can and does reveal Himself. John 1 states that God created the universe with the intention of revealing Himself historically to human beings. Therefore, every act of God, both miraculous and non-miraculous, in the realm of space-time, everything from creation, to the parting of the Red Sea, to the conception of Jesus, to His resurrection, to the miracles of our present day are ways whereby He is revealing Himself to human beings.⁹⁵ It is absolutely vital for the coherence of the notion of *miracle* that God be knowable in and through miracles. Therefore, the definition of miracle must take this key element into account. Torrance highlights this revelatory conception of miracles as he writes of the relation between the space-time universe and God's revelation in it supremely through Jesus.

This is the universe of space and time through which God has also revealed himself personally to man in historical dialogue [historical interaction] with the human race, which has involved the establishment of communities of reciprocity in which his Word is intelligibly mediated to us and knowledge of God becomes communicable through Holy Scriptures...The natural scientist and the theologian are both at work within the same space-time structures of the universe and under the limits of their boundary conditions.⁹⁶

Humans knowledge is limited to the physical universe and in terms of it. Knowledge of God can only come as He reveals Himself in such space-time historical ways, including actions or events.

⁹⁵ Present day miracles are revelatory in that they show God to be receptively active in the world.

⁹⁶ Torrance, *GGT.*, 6.

Torrance writes, “It is in and through the universe of space and time that God has revealed himself to us in modes of rationality that he has conferred upon the creation and upon us in the creation.”⁹⁷ As created by, and so related and “open” to God by nature, the universe is the created context for revelation God has provided to human beings. God has given the universe order and created human beings with the capacity for rational knowledge of the world and for God’s self-revelation within that rational order of the universe. Therefore, human beings must see the universe as open to God’s revelation.

For Torrance we must begin by understanding the universe is open to God’s action. God has authority over space and time, because they are his *ex nihilo* creation. As created realities they cannot limit their creator. This means that “God stands in a transcendent and creative, not a spatial or temporal, relation to the creaturely world.”⁹⁸ The God-world-human relation then, is not a spatial separation. Instead, the universe is not only physically but also rationally contingent upon the Creator. This means that both the matter and order of the universe require God’s sustenance.

The problem is that too often human beings have constructed bifurcationist or dualistic views of the universe that begin with and centers on subjective human perception. When Rene Descartes in pursuit of certainty made the hypothesis “I think, therefore I am,” he effected a radical shift in the location and nature of knowledge. The knowing subject rather than the object known became the basis of truth. Subsequent thinkers such as Kant developed this method further in the realm of epistemology after Newton developed a view of the universe that eliminated the possibility of objective divine self-revelation. Consequently, human beings were left with a concept of the

⁹⁷ Ibid., 1.

⁹⁸ Torrance, *STI*, 60.

universe that is only understood from a human perspective, leaving no room for revelation from God. The inevitable result was naturalism, the belief that the physical universe is all that exists or at least all that can be known to exist. God is not free to act in His creation. Therefore, He cannot reveal Himself in it in a redemptive way.

However, from Einstein and others there has been a paradigm shift in the realm of physics with significant results for epistemology. The subjectivism brought about by Kant and his epistemological dualism, i.e. his noumenal/phenomenal split, rooted in Newton's cosmological dualism, must now be re-considered as the dualist, mechanical physics of Newton give way to the relativity physics of Einstein and his consequent claims about epistemology. As knowledge is understood in properly objective rather than subjective terms, positive changes occur. Torrance emphasizes the contingent nature of the universe, resulting in valuable insights for epistemology.

The technical results flowing from Clerk Maxwell's discoveries[i.e., field theory] are to be seen everywhere today, in our system of illumination, locomotion and communication, and their application to modern industry and life, but the deep change from mechanical to relational thinking [via Relativity theory], which he initiated, reached its culmination in Einstein's work. The effect of Einstein's discoveries reaches down into the very foundations of our understanding of the universe, affecting everything we know far beyond the limits of physics. Thus the new approach must allow for knowledge of God. Thus the combined work of Clerk Maxwell and Albert Einstein imports a radical alteration in the regulative basis of knowledge, transforming not only the structure of science but our basic ways of knowing.⁹⁹

Notably, Einstein laid the groundwork for Michael Polanyi's theory with his emphasis on the need to study the operational principles of particular fields rather than to make assertions by way of mechanical reductive principles.¹⁰⁰ Polanyi recognized that proper

⁹⁹ Torrance, *CTSC*, 12.

¹⁰⁰ Torrance, *STI*, 84.

objectivity came as “empirical and theoretical factors are fused together in an epistemically unitary outlook upon the world in accordance with the actual way in which they inhere to one another in the real world.”¹⁰¹ Thus, as conceptual knowledge and physical knowledge are fused together, human beings can have objective knowledge of truth. Similar to Polanyi, J. Clerk Maxwell developed “field theory,” which viewed the universe as dynamic and relational “in terms of continuous fields of force.”¹⁰² Speaking specifically of Electromagnetic Field, Maxwell writes that dynamic fields exist as “neighborhoods” of relation for objects in the universe.¹⁰³ These unitary, relational views of knowledge and the universe laid the groundwork for Torrance’s “theological science.”

The realm of physics has been radically altered by the advances of Albert Einstein especially.¹⁰⁴ His views on the dynamism of the cosmos have broken down the cosmological dualism brought about by mechanistic Newtonian thought, and an outcome is that divine revelation is possible and knowable within space-time. The overthrow of the cosmological dualism of Newtonian thought as well as the epistemological dualism of Kantian thought occurred because of the developments of Maxwell, Einstein, Polanyi and others. The separation of the creation from its Creator was the fundamental epistemological problem for humanity. With the new physics, this separation is removed in favor of an approach which portrays a universe “open up” to the sustaining action and self-revelation of God. The advances of the new physics point to a cosmos which is “open up” to the Lordly interaction of the transcendent God.

¹⁰¹ Torrance, *RST*, 43.

¹⁰² *Ibid.*, 79.

¹⁰³ James Clerk Maxwell, *A Dynamical Theory of the Electromagnetic Field*, (Edinburgh: Scottish Academic, 1982), 33-4.

¹⁰⁴ Kuhn, 6-7.

The goal is an understanding of the universe that does not exclude but rather allows for God's objective revelation in history. That is, a unitary outlook, i.e., one that sees the universe as having order and intelligibility, that sees the universe as "open up" to the relational interaction of God. Further, He has created it in order to reveal Himself. He has created it in such a way that it would be open to His redemptive self-revelation.

Rather than rely on human subjectivity or a Newtonian view of the universe, human beings can look to the Einsteinian view of the universe that is open to the interaction of God. Within the old dualistic Newtonian framework, God does not and cannot relate to the world directly. He does not enter it or act within it to reveal Himself, because He only contains it within Himself, imposing order and rationality on it from the outside as the *divinum sensorium*. God is dualistically separated from the workings of the universe and from human beings in it. As a result, human beings have no way of receiving objective, redemptive knowledge of and from their Creator-redeemer. However, Torrance via Einstein has developed a view of the God-world-human relation that allows for human knowledge of God as He can and does reveal himself in space-time. Einstein's Relativity theory, which defines space as relations between bodies in motion, provides the basis for Torrance's view, which allows for God's self-revealing action in the universe contra Newton who viewed God as dualistically separated from His creation as the *divinum sensorium*.

Theologically speaking, what we are concerned with here is an understanding of the spontaneity and freedom of the created universe as grounded in the unlimited spontaneity and freedom of God the Creator. Here natural science and theological science bear closely upon one another at their boundary conditions, and what is

needed is a **more adequate doctrine of creation**, in which knowledge from both sides of those boundary conditions can be coordinated.¹⁰⁵

By “boundary conditions” Torrance is referring to the related “frontiers” between the two disciplines, natural and theological science. He seeks to develop a proper understanding of creation that allows for knowledge of God, and hence the need for a universe of “spontaneity and freedom.” He is arguing that the universe be regarded as contingent and contingency must be free to be acted upon and open to being acted upon just as God is free to act, and that an adequate doctrine of creation must be developed to accommodate such relations. If a shift is made from subjective knowledge to properly objective knowledge, focusing on active objective self-revelation of and from God, a compatible understanding of the created universe arises, making knowledge of God possible as a result of His redemptive self-revelation.

The new physics has not only restored much of the biblical dynamism and proper rationality and contingency of creation, but has shown that Christian theology needs to develop a new approach to its understanding of *miracle* that is not contingent on Newtonian physics in any direct way. The new more faithful approach to *miracle* will free up human understanding of the created universe, allowing for divine interrelation, intervention and historical action in space-time. Additionally, pioneering this new approach will a dramatically shift away from the tendency of Christian thought to avoid constructive interaction with advances in the physical sciences. This new approach will help to restore a unitary understanding of the God-world-human relation and so of God’s historical activity and so of *miracle*.

¹⁰⁵ Torrance, *GGT*, 13.

A unitary outlook upon the created universe and the doctrine of God as the one creative Source of all order in the universe are profoundly interconnected. Hence, fundamental to all that follows are the Christian doctrine of God, the Creator and Redeemer, and the doctrine of the creation itself, within which God reveals himself to us and within which man, as man of science and man of faith, is called to be the priest of creation. This is the context in which all theological understanding unfolds and takes shape, but it is a context in which theological science and natural science are found to overlap with one another at profound points.¹⁰⁶

Clearly a unitary outlook on the God-world-human relation will result in more than just advances toward theological and scientific concurrence in the area of miracles.¹⁰⁷ As physicists and others, e.g., chemists, philosophers, theologians, etc. tear down the old, outmoded dualism between God and His creation, Arian heresies that reject the deity of Christ will be wholly overturned, because there will be no cosmological-epistemological reason to believe that the Son of God is dualistically separated from His creation. Further, Christians may gain a renewed focus on their role as stewards of God's creation.

¹⁰⁶ Torrance, *GGT*, ix-x.

¹⁰⁷ This does not mean that post-Newtonian physics will affirm miracles. Instead, the new physics show the world to be open to the possibility of miracles.

CHAPTER 3

PROPOSED INTERRELATIONAL APPROACH TO *MIRACLE*: TOP-DOWN, INTERACTIVE, AND UNITARY

The Primacy of the Incarnation

Torrance tells us the preeminent and paradigmatic instance of God interceding in the world is the Incarnation of the Son of God. This intercession parallels the miraculous work of original creation. It is imperative to note that when this thesis refers to the Incarnation it is referring not just to the conception of Jesus Christ but to the whole of His incarnate life, death, and resurrection. Also, when referring to the Incarnation, this thesis is designating the dynamic, interrelated act of the triune God within the space-time universe as one whole unitary, interactive, self-giving revelation by God in the Son. From Jesus' conception through His exaltation, it is all one unitary whole in God's plan for human redemption.

Again, the Incarnation is the preeminent manifestation of God's redemption action in space-time for human beings. There is general concurrence among orthodox Christians that the Incarnation is the most important part of the faith, because it is God's most direct, personal, redemptive self-revelation to human beings. Historically, orthodox theologians have emphasized the centrality of the Incarnation, i.e., Council of Nicea, Augustine, Aquinas, Luther, Calvin, etc. Torrance himself emphasizes the centrality of the Incarnation stating, "In Jesus Christ God has condescended to reveal Himself to us within our creaturely existence and contingency."¹⁰⁸

It is unlike general revelation, which only provides knowledge "about" God rather than personal knowledge of him. In I Corinthians 15:3, as in other places, Paul

¹⁰⁸ Torrance, *Theological Science*, 138.

references the resurrection, and so the Incarnation indirectly, as of “first importance.” Similarly, C.S. Lewis writes, “The central miracle asserted by Christians is the Incarnation.”¹⁰⁹ He argues that the Incarnation is central because it is God coming Himself in the person of the Son. According to Lewis, every other miracle “prepares” for the Incarnation by manifesting its significance in the universe.¹¹⁰ It is central in that it is God’s primary redemptive revelation of Himself.¹¹¹ We see this evidenced scripturally, especially in Hebrews 1, John 1 and Colossians 1. Hebrews 1:2-3 states that God “in these last days has spoken to us in His Son...and He is the radiance of His glory and the exact representation of His nature.” As the exact representation of God, the Incarnate Son of God is the central miracle of the universe. Without the Incarnation, there could be no sacrificial death and thus no hope of justification for man, because there would be no perfect God-man to die the atoning death Paul describes in Romans 4:21-26.¹¹² Additionally, there would be no resurrection and thus no hope for the future resurrection Paul describes in Romans 6:5.¹¹³

Because of the central nature of the Incarnation to revelation and because of the manifold scriptural basis for that importance seen in the New Testament, the Incarnation may provide principles of understanding applicable to miracles in general. As central and preeminent, it would seem *prima facie* that the Incarnation is an appropriate paradigm for

¹⁰⁹ C.S. Lewis, *Miracles*, 173.

¹¹⁰ Ibid.

¹¹¹ This is not to say that God does not reveal Himself at other times. It is to say that the Incarnation is unique in that God the Son enters the universe to redeem man through His atoning death.

¹¹² Ibid.

¹¹³ Ibid.

miracles and how one can understand and affirm the nature of miracles as acts of God in history.

The Miracle of the Incarnation: Thomas Forsyth Torrance's Understanding

Thomas Torrance's view of the Incarnation is very valuable toward the formulation of a model for approaching, portraying and understanding miracles, not only because it shows the general concurrence between the historical Christian view of the Incarnation/*miracle* and the post-Newtonian view of the universe, but also because it affirms the validity of the historical Christian orthodox understanding of the Incarnation. Torrance clarifies how in history, the Incarnation is actual, rational and therefore possible.

According to Torrance, the Son "makes room for Himself" in the universe and in that way becomes flesh. God the Son was and is free to enter the universe, because space-time is, by creation-redemption, open to Him. This is evidenced in post-Newtonian physics and its view of space. Torrance defines the Incarnation as it occurs in space-time:

The incarnation means that He, by whom all things are comprehended and contained [not in the Newtonian sense], by assuming a body made room for Himself in our physical existence, yet without being contained, confined or circumscribed in place as in a vessel. He was wholly present in the body and yet wholly present everywhere, for He became man without ceasing to be God. He occupied a definite place on earth and in history, yet without leaving His position or seat in relation to the universe as a whole.¹¹⁴

The reader will have noted the very distinctive element in Torrance's definition: Christ "made room for Himself in our physical existence." This especially diverges from a Newtonian understanding of space in which space and the universe particularly are

¹¹⁴ Torrance, *STI*, 13.

regarded as branded receptacles, and hence the Incarnation was impossible by definition. Within Newtonian physics, God was not free to enter His creation, because He contained it within Himself as a bucket contains water. The only miracle God could have performed is creating the universe. By contrast, Einstein developed his understanding of the universe whereby space is something that is created by bodies in motion, relating to one another as part of the space-time continuum, i.e., space as relational, rather than an unchanging container of objects. Torrance's view, in agreement with post-Newtonian physics, understands the universe as contingent. It is also contingently rational because God is rational. As the Son of God "enters" the universe He does not "break" or "suspend" natural law for natural law is contingent upon His rationality and not something deterministically imposed upon the universe. As Creator, He controls the natural order of the universe. It "adapts" to His will, because it is contingent on Him. In this way, God does not have to break a rigid *a priori* natural law. Instead, natural law, while ordered, is not rigid but *a posteriori* and open to God's creative, sustaining, redemptive action in the universe.

This definition of Incarnation reflects Torrance's dynamic, inter-relational Einsteinian four-dimensional view of the universe. The concept of the four-dimensional space-time continuum, given prominence in the thought of Albert Einstein and rooted in the physics of J. Clerk Maxwell, and developed theologically in the thought of Thomas Torrance, as he reflects on the non-dualistic thought of great early church theologians, reflects a contingent universe, open rather than determinate, dependent, relative and so continually "open up" to the intervention, interactivity and redemptive interrelations of the transcendent Creator-Redeemer God, centered above all and centrally in Jesus Christ.

Torrance's view is supported by Maxwell's "field theory" which puts forth a mode of thinking that links practical knowledge with theoretical knowledge "by which the process of our minds is brought into complete harmony with the process of nature."¹¹⁵ The universe as it is described by Einstein and Maxwell exists as a continuum of space-time that is knowable to human beings. In such a universe God need not merely relate but can directly, rationally, relationally enter the space-time continuum to enact His will, reveal himself and redeem human beings.

For Torrance too, then the Incarnation is paradigmatic for theological understanding. For Karl Barth, Jesus Christ is absolutely central to Christian theology. Following in the Christocentric footsteps of his mentor (Barth), Torrance understands the whole of the Christian theological framework out of the theological and epistemological centrality of Jesus Christ, the incarnate Word of God. According to Barth, "Jesus Christ as attested to us in Holy Scripture is the one Word of God whom we must hear and whom we must trust and obey in life and in death."¹¹⁶ This means that knowledge of God becomes historical and actual by the "movement" of God for us in Christ. Barth sees Jesus Christ as God incarnate, the central revelation of God.

For Torrance, in the hierarchy of God's "Word," the Incarnation is first, then Scripture as the "apostolic witness to the Word," then preaching of the Word. For Torrance, theology is "...interpretation and elucidatory penetration into the inner

¹¹⁵ Torrance, *CTSC*, 61.

¹¹⁶ Karl Barth, *Church Dogmatics* IV/3, ed. G.W. Bromiley and T.F. Torrance (Edinburgh: T. and T. Clark, 1957), 3.

intelligibility of divine revelation in which we allow our own thinking and articulation to be molded pliantly and obediently by the incarnate Truth of God in Jesus Christ...”¹¹⁷

Modifying Barth slightly, who vehemently opposed natural theology as a preparatory method or another route to acquire knowledge of God apart from Christ, Torrance “sought to restore the rigorous interpretation of the Book of Nature into Protestant systematic Theology.”¹¹⁸ Torrance christocentrically develops and expands latent themes in Barth’s thought relating to nature. Following the advances of John Calvin by way of Karl Barth regarding God’s redemptive self-revelation in Christ, Torrance has sought to understand God as Creator and God as Redeemer in a unitary coherent fashion in Christ. Calvin taught that even the Old Testament Law pointed to the good news of Christ.¹¹⁹ Barth writes that Calvin believes the doctrine of creation is vital for understanding God’s plan for redemption, and for Calvin both of these doctrines are linked in Christ.¹²⁰ Torrance too has followed Calvin in understanding them together. Additionally, Torrance sought to follow Karl Barth by understanding nature “through the lens of the Book of Scripture.”¹²¹ Of course, for both Barth and Torrance, the primary lens for interpreting nature is Christ. Scripture was secondary, though vital to this methodology. This theological method radically contrasts the epistemological methods of much of modernity under the sway of Newton and Kant which set man as the center of

¹¹⁷ Thomas F. Torrance, *Reality and Evangelical Theology* (Philadelphia: Westminster, 1982), 155-6.

¹¹⁸ Peter G Heltzel, “Interpreting the Book of Nature in the Protestant Tradition” *The Journal of Faith and Science Exchange* 2000 vol. 4, 223.

¹¹⁹ John Calvin, *Institutes of the Christian Religion*, vol. 2, (Philadelphia: Westminster, 1955), 9ff.

¹²⁰ Karl Barth, *The Theology of John Calvin*, trans. Geoffrey W. Bromiley (Grand Rapids: Eerdmans, 1995), 164.

¹²¹ Heltzel, 226.

knowledge about God rather than God as He reveals Himself. Consequently, Torrance opposes Immanuel Kant, David Hume, and a myriad of other modern thinkers.

Two Opposing Views of the Universe: Newton and Maxwell-Einstein

Torrance's non-dualist view of the God-world relation is supported by the open, non-dualist relativity physics of Albert Einstein just as much of dualist theology is supported by the mechanical, inertial, dualist physics of Isaac Newton. Because Torrance's non-dualist view of the God-world-human relation is dependant on contemporary physics, the consequent nature of the god-world relation as such and so a particular understanding of the universe, it is necessary to understand the basics elements and implications of that view. Torrance's affirmation of the rationality of the Incarnation, i.e., its logical coherence within the context of the contingent, open nature of the universe, is only possible from a Christian theistic view of the universe whereby the doctrines of Creation and the Incarnation are inherently related. Contrasting the dualism of Greek philosophy, Paul portrays this understanding of the universe in Colossians 1:16-17. Here, Paul says that the universe was created economically through Son and for Him. This is not to say that He acted alone. Economically, the Father, Son and Spirit created together as one Godhead.

As the means of creation, Christ has lordship over the nature of the universe. Therefore, the universe exists and is open for His purposes. Unmistakably, if the Son, in economic unity with the rest of the Godhead, is Creator of the universe, then He was able to form it in such a way as to allow Himself to be revealed in it to accomplish these purposes, even to the extent of becoming flesh in it. Thus, if the Son became incarnate it is necessary to develop a clear understanding of that universe open to His space-time

presence. This requires that we contrast of both the mechanistic view of Newton and the dynamic, interactive, multileveled view of Einstein.

The Mechanical, Inertial, Dualistic Universe of Sir Isaac Newton

Because of the subjectivism engendered by thinkers such as Rene Descartes and Immanuel Kant, human knowing has been cut off from the real world. Isaac Newton is a milestone thinker in this movement toward subjectivism. Though his intention was to establish objectivity, Newton's thought served to turn the focus from authoritative revelation to the scientific method as the source for human knowledge. This greatly limited knowledge as Immanuel Kant developed Newton's concept epistemologically.

The age of reason brought with it the giants of scientific thought who laid the groundwork for classical physics. Copernicus, Bruno, Kepler, Descartes and Galileo provided Isaac Newton with all he needed to explain motion in the universe. The astounding discovery that a multitude of physical facts could be explained by a few mathematical equations helped to reclassify the age of reason as the age of certainty [claimed by Descartes]. It was not long before a mechanical philosophy of the universe dominated scientific thought. The universe, once unknown and capricious, became a huge clock ticking along inexorably. Every event was easily explained as a combination of known forces. If an event seemed out of the ordinary, the discovery of more facts held the answer with complete explanation. With the machine functioning well, God was no longer necessary.¹²²

Brown summarizes the nature of modernist thought. When Copernicus revolutionized human perception by proving that the sun rather than the earth is the center of the solar system, humans began to question their own place in the universe, eventually questioning external authority as a source for knowledge. This meant rejecting divine revelation. In its place, Rene Descartes submitted the human knower as the center for knowledge,

¹²² William E. Brown "Quantum Theology: Christianity and the New Physics" *JETS* 33 v4 (December 1990), 478.

further removing divine revelation from epistemology. As Descartes' epistemology separated God from humanity by asserting that truth is that which the human mind reasons to be true rather than what God reveals to be true, Newton brought about a similar dualism in physics that completely separated God from the universe by stating that He contains the universe within Himself, imposing rationality on it from the outside.

Subsequently, Immanuel Kant radically impaired epistemology, especially as it pertained to knowledge of God. Rattled by the writings of Hume, especially as they related to his questioning of causality, Immanuel Kant brought the effects of Newtonian thought into the realm of ethics and theology, further crippling the ability of human beings to know their creator.¹²³ Newton's thought closed off the universe from God's action, making revelation from God impossible by asserting that the universe was contained within God. This led Kant to develop his epistemological dualism, further limiting knowledge.¹²⁴

Specifically, Kant developed Newton's idea that God imposes rationality on the universe from outside of it. Instead of seeing the information coming through the senses as having its own contingent rationality, Kant saw the human mind much like Newton saw the universe. That is, he believed that information did not exist in a logical state. In Kant's view, the human mind impresses its *a priori* categories on incoming "intuitions" just as God imposes rationality on the universe in "Newtonian" thought. The innate "Categories" of the human mind actively shape incoming sense information into the

¹²³ Torrance, *CTSC*, 20.

¹²⁴ For a more detailed description of Kantian epistemology, refer to Chapter 1, page 5.

mind's own logically coherent material.¹²⁵ In this way, information is given a rationality, but is never known as it is in itself. Thus, Kant believed that human knowledge could not extend to the “noumenal” realm, i.e., the realm of actual being, by “pure reason.”

Instead, human knowledge was limited to the “phenomenal” realm. That is, the realm of practicality. In applying this idea of the innate categories of the mind, Kant ushered in an epistemological dualism that separated truth from the human mind. As a result, of Kant's harmful, but influential epistemological separation of human knowing from the noumenal realm, many theologians have rejected classical Christian claims that God is known by His self-revelation in order to fit into the modern philosophical and scientific framework.

Newton's Container notion of space distinct from time. In order to give a reason for the rationality of the universe, Isaac Newton found it useful to employ a receptacle view of space and time, making God the external receptacle. This made any penetration by God into the universe impossible. Seeing God as the ultimate “container” (*divinum sensorium*) of all things, Newton concluded that God could not enter the universe to become incarnate anymore than a bucket could contain itself. Instead, God impresses rationality “on” the infinite universe from “outside.” Torrance comments on the formative influence of such a view. He writes, “In modern as in ancient thought, some form of the receptacle notion of space seems to have been predominant.”¹²⁶ This is a natural, though problematic way of viewing space arising from the perceptions that come from humans living in buildings. The continued prevalence of such a view even in

¹²⁵ Kant, 161.

¹²⁶ Torrance, *STI*, 22.

current Christian thought makes itself known in relation to the popular understanding of miracles, especially as it relates to post-Kantian theological views such as Bultmann's.

The ancient purpose of giving space closed, mathematical properties was to give position. The intention was not to close off the universe from divine revelation. However, this was the result. In addition, he states, "But this could be maintained over against the Aristotelian and Stoic view (which had dominated ancient science) that the world is intelligible only because it is finite, if space were somehow aligned with the infinity of God." Thus, the idea of a mathematical, receptacle universe was received by Newton from early Platonic and Stoic views and then developed into the dualist form it took from Newton. In this view there is no Incarnation, no miracles, and no direct, contentful revelation from God.

Torrance explains that "Newton himself spoke of space and time as an infinite receptacle in terms of the infinity and eternity of God, for it is in God as in a container that we live and move and have our being...he held quite literally that God contains and comprehends the universe in Himself."¹²⁷ Newton saw the infinite universe as a spatially contained unit that actually existed inside God, the ultimate container of all things. This affected more than just our understanding of physical relations in the universe. It also affected theology, greatly limiting the God-world-human relation in which all things are the same everywhere at all times, indeed, negating any and all direct divine action and relation to everything within the infinite "container."

Torrance writes, "With Newton time and space were identified with the all-comprehending mind and immanent presence [not incarnation, but permeation] of God,

¹²⁷ Ibid., 38.

the infinite receptacle containing and imposing order on all creaturely beings.”¹²⁸

Newton’s purpose was to determine the source of order in the universe and thus calculate the details of the universe. However, Newton contradicts himself by viewing God as spatially separate from the universe while still permeating it with His logic. What is worse, Newton’s view of the universe as a closed mechanical system makes it impossible for God to reveal Himself to human beings in the universe.

Newton worked with a concept of God as containing and ordering all things ‘within his uniform *sensorium*’, in such a way that neither God nor the world [directly] affects the other, for just as God suffers nothing from the motion of bodies so bodies find no resistance from the omnipresence of God.¹²⁹

Torrance refers to Newton’s view of God’s separation from the physical relations of the universe, not to God imposing rationality on the universe. Consequently, God and the world are regarded as dualistically separated with no direct interrelations, making revelation from God, miracles, and so the Incarnation impossible.

As noted above, this radical, deterministic dualism created problems for the historic Christian faith which asserts that the divine Son/Word became a historical person, entering the very universe which, according to Newton, He is said to have contained within Himself. Torrance writes, “But this joining together of God and the world by giving them space and time in common led finally into their separation.”¹³⁰

Newton believed that God was limited by the laws of space and time just as the universe is limited. Thus, for Newton, God’s transcendence became a mere spatial distinction, i.e. place. Newton oversimplified and thus misunderstood the true nature of God’s

¹²⁸ Torrance, *CTSC*, 18.

¹²⁹ *Ibid.*, 43.

¹³⁰ Torrance, *STI*, 38.

transcendence, and as a result, Newton's view caused problems for any claim to knowledge of God generally and to the Incarnation in particular.

Laying out the inconsistency, Torrance says that "Theologically the most important problem posed by Newton's thought was his association of space and time as an infinite receptacle with Deity, for that had the effect of reinforcing the dualism between space and matter which we have already noted."¹³¹ It is impossible within the confines of pre-relativity logic for a thing to contain itself. Given such a universe the incarnation becomes impossible. Newton commented that God could no more become incarnate than a box could contain itself. Thus, Newton rejects Nicene theology, specifically as it relates to the *homoousion*.¹³² Indeed, "Newton openly threw in his lot with the heretic Arius rather than with Athanasius and the Nicene Creed."¹³³ Newton's closed mechanistic view of the universe led him to align his theological doctrine of the hypostatic union with Arius' view that Jesus was not truly God but was only a creature.

With the central event of the Christian faith thus ruled out. Deism made its way into Enlightenment thinking. "Thus, against all his religious intention Newton paved the way for the rationalist deism that developed in English thought and which had such a potent influence in Germany, reinforcing its own latent dualism."¹³⁴ As filtered through Kant, this view has led modern theologians to seek after or approach God through other means such as alternative existential encounter via decision, emotion, and feeling, as is evidenced in the thought of Friedrich Schleiermacher and others.

¹³¹ Ibid., 39.

¹³² Ibid., 30.

¹³³ Torrance, *CTSC*, 19.

¹³⁴ Ibid., 40.

Dualist Developments from Newton through Immanuel Kant. Newton's influential conceptualization of a closed system of order laid the groundwork for Immanuel Kant's subsequent developments in epistemology. What Newton did in the realm of physics, Kant applied to the human knowing process.

With the so-called 'Copernican revolution' of Immanuel Kant the concept of absolute time and space was transferred from the mind of God to the mind of man...but the effect of Kant's identification of time and space with built-in capacities or *a priori* forms of intuition was very different: it undermined the concept of objectivity in its classical form and called in question the independent reality of the world apart from the modes of its appearance to us.¹³⁵

Kant developed the idea that human beings had innate mental capacities that actively shaped incoming information. His thinking caused serious consequences for epistemology. If the human mind imposes order on incoming information, then true knowledge of the objective truth of the true nature of the world is impossible. In Kant's re-formulation of the human knowing process, the knowing subject affects his or her knowledge of reality. Kant's thought ruled out the possibility for humans to have objective knowledge of reality as it is. Objective truth was no longer seen as the locus of knowledge.

Kant greatly limited human knowledge of the external world and eradicated any objective knowledge of God by persons in his book *Critique of Pure Reason*. Kant designated the realm of "essences" (i.e., God, self, etc.) the "noumenal" realm and used the term "phenomenal" to describe the realm that humans sense. In Kant's understanding, God is not able to reveal Himself to man, since man's knowledge is limited to the phenomenal realm and unable to see the *Ding an sich* (the thing in itself). Thus, knowledge of the noumenal realm becomes impossible. Consequently, revelation

¹³⁵ Torrance, *CTSC*, 20.

from God cannot be properly known as a result limiting the effects of the innate categories of the mind. In his book, *Religion within the Limits of Reason Alone*, Kant sought to develop an understanding of God through human knowledge absent of any objective revelation from God. Torrance marks that Kant's epistemology makes objective knowledge of God impossible to the human knower. This means that knowledge of Jesus Christ is ruled out because what is known of Him comes from first century observers who were themselves restricted to the phenomenal realm. In this way, Kant's epistemological application of Newtonian has ruled out human knowledge of the Incarnation. This Newtonian presupposition is also the source of Bultmann's demythologizing method.¹³⁶

Many modern philosophers have built their entire foundation for knowledge on these destructive epistemological presuppositions. Many arguments against the miraculous intervention of God formulated in the last three centuries have stemmed from the modern variations of the scientific and epistemological formulations conceptions of Newton and Kant. This closed system of order developed by Isaac Newton effectively separated God from direct revelation within His creation making human knowledge of God's miraculous self-revelation impossible. Further, the epistemological effects of Immanuel Kant served to eradicate all human knowledge of God as He is in Himself. But, this dualistic Newtonian foundation must be replaced in favor of a new system, because scientific advances evidence a universe that is "open up" to the revelation of God.

¹³⁶ Torrance, *CTSC*, 21-2.

Albert Einstein, Relativity Theory and the Open, Non-Dualistic Universe

When with Clerk Maxwell a rigidly mechanical way of thinking began to give place to a dynamic and relational way of thinking, new kinds of questions had to be asked which gave rise to a corresponding change in notions of time and space.¹³⁷

Torrance's model is profoundly affected by the relational physics of Maxwell and Einstein. Maxwell developed "field theory," an understanding that the abstract and concrete were inseparably linked, allowing for a unitary view of human knowledge. According to Torrance, Maxwell's theory was rooted in his belief that God actively relates to the universe.¹³⁸ Building on Maxwell, Einstein's theory of relativity has caused major changes in the realm of physics and beyond, replacing the dualist physics of Newton with a non-dualist, yet non-monistic model. It is necessary to have a basic understanding of Einstein's theory in order to understand Torrance's "open" view of the universe.

In the early twentieth century, Albert Einstein published a paper introducing his revolutionary theory of Special Relativity stating "that it was impossible to measure a body's absolute motion since time and space are relative for every observer."¹³⁹ At first glance, this would seem to have nothing to do with the nature of the universe as a whole, let alone with miracles or knowledge of God. However, while this theory was not formulated in conscious opposition to Newtonian physics, it was a significant development toward the end of the mechanistic thinking that had reigned for two centuries. While the implications of Einstein's thought have not been fully realized

¹³⁷ Ibid., 22.

¹³⁸ Ibid., 49-50.

¹³⁹ Brown, 478.

throughout the philosophical and theological community, let alone the popular level, his conceptions have caused many to abandon many foundations of modern thought.¹⁴⁰

Although his [original] findings were based upon the notion of fixed natural laws, he opened the door for the new and bizarre world of quantum mechanics. Atomic physics became the focus of experimentation, and science has never been the same.¹⁴¹

The realms of physics and many of the other sciences are now open to new possibilities that were once ruled out by definition.¹⁴² As physicists study sub-atomic particles, the features of “natural law” are called into question. Laws that apply in four-dimensional space-time seem to have no meaning at the sub-atomic level, i.e., matter teleports, objects seem to exist in two places at once, etc. This is significant for Torrance’s approach to the Incarnation for two reasons. First, the new physics negates seeing the universe as mechanically deterministic and “closed” but rather “open” to the intervention of God. Second, this view rules out *a priori* perception of natural law in favor of a less rigid notion of natural law (*a posteriori*) that could be open to the intervention of God.

Standing on the shoulders of Max Planck and his discovery of “packets” of energy as well as J. Clerk Maxwell and his “field theory,” Einstein proved that light emits as particles. Planck realized that energy did not flow in a continuous stream, but rather emitted in small segments or “packets.” Einstein applied this to light. Physicists delved further into the study of the atom finding at the sub-atomic level that particles called

¹⁴⁰ Not to mention many other academic domains that have yet to fully realize the effects of Einstein’s thought.

¹⁴¹ Brown, 479.

¹⁴² Many of the physical sciences have yet to reflect all the implications of Einstein’s thought.

quarks were shown to be both finite particles and waves, seemingly aligning themselves with whatever the physicist attempts to prove.¹⁴³

Perhaps the most alarming discovery of subatomic physics is the fact that “Somehow information is transmitted faster than the speed of light—[thought to be] a ‘physical’ impossibility. Such a reality again calls into question the classical understanding of cause/effect, the fundamental principle for certainty in knowledge.”¹⁴⁴ Brown is referring to instances in which sub-atomic particles seem to teleport¹⁴⁵ from one place to another faster than the speed of light. At the sub-atomic level, matter does not operate in the same predictable manner that matter operates with normally. The speed of light is considered the ultimate constant in the universe. If information at the sub-atomic level can travel faster than the speed of light, then the natural order of the universe is called into question, because it is believed that nothing can travel faster than the speed of light. Classical physics can no longer be applied with certainty, because sub-atomic particles are not following the uniform patterns of cause and effect as previously believed. Some theorize that another system of order brings order to the uncertainty. But, “String Theory” now theorizes that multi-dimensional “strings” or “super-strings” exist below the sub-atomic level, bringing order to the “uncertainty” of sub-atomic physics.¹⁴⁶

If the rigid, determinist cause and effect system of Newtonian physics has become problematic, then a radical ripple effect extends through and beyond the physical sciences

¹⁴³ Brown, 480.

¹⁴⁴ Ibid.

¹⁴⁵ “Teleport” is the term used to refer to an object moving from one place to another without in a moment without traveling the space to get there.

¹⁴⁶ Brian Green, *The Elegant Universe*, (New York: Norton, 1999), 6.

to the arenas of philosophy and theology and beyond. Philosophical systems, rooted in the rigid Newtonian framework, must now be called into question just as Newton's physics are being re-considered. The conclusions of every philosopher who based his philosophical framework on a Newtonian universe would have been rendered, to that extent, obsolete. However, these physical changes have not yet had their full transformational effect on the philosophical realm. Too often philosophers like Kant have still not been subjected to re-examination, based on the new physics. Does this mean that orthodox Christianity, once considered "mythological" from the presupposition of a "closed" universe, could now be viewed as sound within the framework of the new physics, because the universe is very much "open," e.g., contra Bultmann? There is much to consider, and possibly even more to re-consider.

God as transcendent over and related to space-time. As a result of Maxwell, Planck, Einstein and others, post-Newtonian physics finds itself working in and with a far more dynamic world than previously conceivable. Einstein's Relativity theory has changed everything for contemporary thinking about the Incarnation of Christ, i.e. describing a universe "open" to it. Torrance synthesizes the implications of relativity within the limits of space-time relations and their effect on God.

They [space and time] cannot therefore be bracketed with God after the manner of Newton, for the doctrine of God as the maker of all things, visible and invisible, excludes any mythological synthesis between God and the universe, God and nature, or between the divine reality and this-worldly reality.¹⁴⁷

Therefore, speaking theologically, because space-time finds its beginning at the creation of the universe as part of it, and because God created the universe, space-time does not

¹⁴⁷ Torrance, *STI*, 60.

limit God.¹⁴⁸ God is Creator of and free from space-time and its effects. What is more, not only is He other than and so transcendent “over” the space-time of the universe, He is also in absolute control over it. Thus, Torrance writes:

The creation of the universe out of nothing implies the absolute priority of God [as Creator] over all space and time, for space and time were produced along with the creaturely world as orderly functions of contingent events within it.¹⁴⁹

The fact of God’s otherness or transcendence and power “over” and in relation to the universe and its space-time makes His intercession in the physical world possible. Because of God’s act of creation, the universe is not “closed” but “open up” to the Creator-redeemer’s redemptive self-revelation.

According to Torrance, God’s relation to the universe must not be understood as a spatial reality. Otherwise, God would have to exist as a material being. Thus, when the Nicene Creed refers to God “coming down” from heaven, it is not referring to a spatial, decent. “That is to say the *relation* between the [spatial, physical] actuality of the incarnate Son in space and time and the God from whom He came cannot be spatialised.”¹⁵⁰ Torrance emphasizes that the relations between God the father, God the Son and the universe are not physical. These relations must be understood in another way. Rather than attempt to understand God’s relation to the universe from a static, inertial dualistic, Newtonian perception of the universe, Torrance finds he can accept God’s revelation about His creation and redemption as fact, thereby forming his understanding of the God-world-human relation.

¹⁴⁸ Notably, Einstein would not share the same theological view that Torrance applies here.

¹⁴⁹ Torrance, *STI*, 60.

¹⁵⁰ Thomas F. Torrance, “The Relation of the Incarnation to Space in Nicene Theology” *The Ecumenical World of Orthodox Civilization*,. (Paris: Mouton, 1974), 44.

Since space is regarded here from a central point in the creative and redemptive activity of God in Christ, the concept of space as infinite receptacle, or as infinite substance, or as extension conceived either as the essence of matter or as a necessity of our human apprehension, or certainly the concept of space as the first unmoved limit of the container, all fall away. And in their place emerges a concept of space in terms of the relations between God and the physical universe established in creation and incarnation. Space in this formulation is a sort of differential concept that is essentially open-ended, for it is defined in accordance with the interaction between God and man, eternal and contingent happening. This means that the concept of space in the Nicene Creed is relatively closed, so to speak, on our side where it has to do with physical existence, but is infinitely open on God's side.¹⁵¹

Thus, Torrance's view of the universe is shaped both by an orthodox view of creation and the Incarnation which is centered in Scripture and understood through the Nicene Creed as affirmed and informed by Einstein's theory of relativity.

Clearly, Torrance has (and Einstein for that matter) turned from Newton, for Torrance rejects any spatial understanding for God's relation to the universe and sees their relation in a terms of God's transcendence. Torrance writes, "God stands in a transcendent and creative, not a spatial or temporal, relation to the creaturely world."¹⁵² By concluding that bodies in motion are not "contained" but make space for themselves in the universe, rather than seeing the universe as an infinite receptacle within God, Einstein changed everything.

Einstein's theory of relativity has implications as we consider Patristic theology in relation to current theological pursuits. Greek philosophy and science viewed infinite things as unknowable, because they were outside the realm of finite human knowledge. If God was infinite, He was unknowable. Torrance writes of Classical Greek thought that "the finite, the intelligible and the limits of the container were all bound up together in

¹⁵¹ Ibid., 69.

¹⁵² Torrance, *STI*, 60.

their thought.”¹⁵³ Einstein’s theory made it possible to view the infinite as intelligible, because he saw the universe as finite, though relational. Things no longer had to be finite to be knowable, because the infinite God can interact with the finite universe. This freed our use of Patristic theology from the boundaries of Greek thought, though many of the church fathers such as Athanasius already understood that knowledge of the infinite God was possible because of His redemptive self-revelation.

The fact that God is not externally bound by space and time opens up a whole new world of possibilities for His interaction with the world and mankind, because instead of being limited or separated from the universe by His role as *divinum sensorium*, He is able to act on and in it creatively as He reveals Himself to human beings. Torrance explains the extent of the effects of this fact, “Hence even the relation between the actuality of the Incarnate Son within this world of space and time and the Father from whom He came cannot be spatialized or temporalized.”¹⁵⁴ God is not bound by the creative realities of space and time. Thus, contrary to Newton, God’s relation to the universe, to humans, and even to His Son cannot be limited to four-dimensional space-time, for though He enters it, He is not bound by it.

Space-time and logic in the universe. In addition to opening the way for the redemptive self-revelation of God as historical, Einsteinian physics, if true also have radical implications for human knowledge as it relates to the nature of the universe. The change in relations as seen in the fact that God is no longer seen as a container that forces space and time into mechanical systems of order. Instead, God imparts His rationality

¹⁵³ Ibid., 23.

¹⁵⁴ Ibid., 60.

onto the universe as Creator. Contrary to Kantian thought regarding human knowledge, the universe is knowable because it is rational and orderly. Torrance asserts this thought:

Nevertheless, since the whole realm of space and time is maintained by God as the object of His creative knowledge and power, space and time are to be conceived as a continuum of relations given in and with created existence and as the bearers of its immanent order.¹⁵⁵

Torrance sees the space-time as a created and so contingent, continuum that exists as a rational, knowable order whose intelligibility was imparted by God from the moment of creation. The ability for human beings to know external reality objectively is linked to the order of the universe.¹⁵⁶ Thus, anything already in the universe or that enters into it must share this rational order for humans to know it. This logical continuum is what makes the universe the logical medium for God's gracious redemptive self-revelation. This concept is vital to the epistemological nature of God's revelation. If God's self-revelation is not knowable, then it is not revelatory.

John Morrison writes on this subject, "As a result of these modern insights in the physical sciences, Thomas Torrance understands the universe as created, rational and ordered, and as contingently distinct and intelligible or open to knowing ("graspable") by the human mind."¹⁵⁷ This means that it is knowable "as it is" contrary to Kant's view that human beings cannot know objects as they are in themselves. Torrance's understanding of the knowable nature of the universe is directly related to his notion of the creative Word.¹⁵⁸ Torrance states that "This must be made explicit in order to clarify

¹⁵⁵ Ibid., 60-61.

¹⁵⁶ Thomas F. Torrance, *God and Rationality* (Oxford: Oxford University Press, 1971), 89-90.

¹⁵⁷ John Douglas Morrison, *Knowledge of the Self-Revealing God in the Thought of Thomas Forsyth Torrance* (New York: Peter Lang, 1997), 117.

¹⁵⁸ Torrance's understanding of the Word (logos) will be discussed later in the thesis.

the nature and connection of such with... ‘the correspondence theory of truth,’ reflecting ‘disclosure’ of inherent ‘coherence’ in and from the proper object.”¹⁵⁹ Morrison asserts that Torrance understands the created universe as rational and knowable to human beings. Torrance and Morrison is arguing that human beings can objectively know the truth of the world as it exists. The inherent order of the universe makes it logically graspable.¹⁶⁰ The human mind does not impress order on information through innate categories of the mind as Kant would suggest. This is not necessary, because information has objective order as it exists, though it must be rightly interpreted. As a result, objective knowledge is possible because by faith-ful knowing the mind of the knowing subject does not impose order onto the information it receives. Objective rationality exists and is graspable to the human mind.

This view of objective rationality clearly affects Torrance’s theological method. In physical and social conception, there is not one scientific method universally applied in all the sciences. Instead, he says, “there are only the actual methods which each science has developed in relation to certain special things.”¹⁶¹ Science must “seek to act toward things in ways appropriate to their natures, to understand them through letting them shine in their own light.”¹⁶² This focus on the inherent rationality of the proper object of every science, allows each scientific realm to function with its own rationality, rather than be subject to the out of context methods of other sciences, e.g., the proper object of biology is “bios”/life.

¹⁶⁰ Torrance, *God and Rationality*, 89-90.

¹⁶¹ Torrance, *Theological Science*, 106.

¹⁶² *Ibid.*, 107.

Donald Klinefelter does not agree with Torrance's contention that each science bears its own individual methods and rationalities. Klinefelter accuses Torrance of stating that "both natural science and scientific theology operate through a methodological exclusion of one another."¹⁶³ Torrance is proposing that each science, including theological science, must seek its objects self-disclosure as it is given. While Torrance may not be incoherent as Klinefelter accuses him of being, he does not clarify how each science's rationality exists without contradiction. However, this does not mean that his concept of theological science is incorrect. Despite some ambiguity related to relationships between the sciences, Torrance's method of theological science has value in that it focuses on the rationality inherent within the study of God's objective revelation. In his view, distinctive objects with distinctive inherent rationalities require distinctive approaches, because they each disclose themselves uniquely.¹⁶⁴

This epistemological foundation in relation to the world provides the framework for God's redemptive self-revelation to human beings. God has created the universe with order that man can grasp objective knowledge about it. But beyond that His creation provides an intelligible medium for His revelation to human beings, a revelation that must also be grasped objectively. So, Torrance explains this medium.

Apart from space and time nature would be indeterminable and unintelligible, for it would have no sequences or patterns of change and no series of continuous coherent structures and would thus be incapable of any kind of meaningful formalization. It is to space and time, therefore, that we have to look for the determinate and intelligible medium within which God makes Himself present

¹⁶³ Donald S. Klinefelter, "God and Rationality: A Critique of the theology of Thomas F. Torrance." *The Journal of Religion*, 53 (1973), 119.

¹⁶⁴ This does not mean that each science is totally different. In fact, each science bears many similarities to another. The important thing to understand is that there is distinction between the sciences.

and known to us and within which our knowledge of Him may be formed and grounded objectively in God's own transcendent rationality.¹⁶⁵

God has chosen to reveal Himself to humanity objectively in this universe where objective knowledge is possible. Therefore, human beings can accept His redemptive self-revelation as objectively knowable. The human mind does not have to imaginatively create or impose rationality on revelation that is already rational. Instead, the human mind can know truth as it exists in itself. Torrance via Einstein is opening up the *Ding an sich*.

Space does not contain bodies but rather is "created" by bodies. The dynamism and interrelatedness of the universe uncovered by Einstein and explained theologically by Torrance is "open" to God and even to the Incarnation of God. While God transcends the space-time continuum of the universe, he is personally and interactively related to it as Creator-Redeemer. Also, the four-dimensional space-time continuum is the order of the universe, making the universe a place for knowing. If this were negated, there would be no way for God to reveal Himself.

In contrast to Newton's "container" notion, the Einsteinian understanding of the universe emphasizes that space is not an "entity" in and of itself. Instead, created bodies make space for themselves in the universe in relation to each other. Space is not a contained vacuum. Space is not a receptacle for bodies. Space is "created" by material bodies in motion and in relation to one another. An object that exists within space-time is "making space" for itself in relation to all other things. For the Son to enter the universe, it was not necessary to enter an enclosed cosmic container. In becoming incarnate, the

¹⁶⁵ Torrance, *STI*, 61.

Son simply makes space for himself in the universe, and thus enter the world as a human being and for human beings, thus revealing Himself to mankind, making it possible for those human beings to know Him redemptively.

Change in the Concept of “Natural Law.” Since the rise of “field theory” via Clerk Maxwell and especially Einstein’s theory of general relativity, the universe as relational within and without has been understood as dynamic rather than rigid and deterministic. The universe is still understood in terms of a system of sorts, but not one that is closed-off, mechanical and inertial as it once was under the influence of Newton. There is now a tendency to view the universe in relational rather than mechanical terms. Via Einstein the universe is regarded to be more adaptable and expansive (expanding), a system of growing and developing order and intelligibility that exceeds our ability to know it, rather than a clock like system that never changes. However, this does not imply disorder or irrationality. Rather, the universe retains its contingent order as objects relate to each other with the space-time continuum.

The post-Newtonian universe of open relations can encourage theists to again view *miracle* as a supernatural relational action with nature rather than a violation, break, or suspension of nature. God makes space for Himself in the universe as it adapts to His entering and action. The relativity view of the universe makes it possible to assert that nature can be adapted, molded, and used by a supernatural being, because the universe relates to the direct intervention of God with contingent rationality. This relativity view does not require a miracle to be a break in nature. Rather, it is open to God’s action in the universe.

This understanding seems to be more compatible with the biblical view of the world, which was rooted in the decree of God.¹⁶⁶ If the world comes into being and reflects the Word (Logos) and rationality of God, then it is contingent upon His will. Thus, it concurs with His action and allows rather than limits his miraculous revelatory action within space-time. In this way, “natural law” is understood not as *a priori*, i.e., laws that nature must adhere to but as *a posteriori*, i.e., how nature behaves as we observe it. Consider Torrance’s definition.

Natural laws, therefore, may be regarded as empirical sequences and regularities, symmetries and invariant relations which God has imparted to nature amidst all the changes and varieties of its contingent processes, but what they ultimately are as *laws* they are by reference to the legislative Word and unifying Rationality of God the Creator and Sustainer of the universe.¹⁶⁷

By understanding the universe and its order as contingent in relation to natural law as proceeding from the Word (Logos) of God, the miracle of the Incarnation of the Word (Logos) in the space-time world as a historical event is given a rationality that allows for human knowledge of God. This is because human knowledge is tied to the logic of the space-time continuum. Humans perceive everything in relation to the order of the space-time continuum. By entering the universe, Christ intelligibly enters the realm of human knowledge.

Creation as the rational medium of revelation. Citing Origen, Torrance reiterates the necessity that Christ be understood both as Creator and Incarnate. As Creator, Christ has authority over the universe to act in it. “We are, to be sure, talking here of the Son of God through whom all things, visible and invisible, have been made,

¹⁶⁶ Torrance, *STI*, 122.

¹⁶⁷ *Ibid.*, 123.

so that we have to understand His presence primarily in accordance with His own creative agency.”¹⁶⁸ Because the universe is not a “container,” the Incarnate Son of God “makes space” for Himself in His Created universe. In doing so, He is revealing Himself as Creator. Further, Torrance emphasizes:

It is clear that we are to think of the relation of the Incarnation to space in accordance with the creative and determining agency of the Incarnate One. Even when He unites Himself to us in the body and is encompassed in a bounded human life, by His very nature and activity He springs it open; and He can accomplish this for He is Himself the Source and Creator of all material body throughout the universe and contains all time and space in the power of His Word.¹⁶⁹

As the source of all created things, Christ is able to reveal Himself to the created universe. He does this first by creating the universe with contingent rationality. This rationality makes human knowledge possible. In addition, by His Incarnation in this rational universe, He reveals Himself to human beings as the Creator-Redeemer of that rational order.

The Incarnation in Relation to the Universe

It is crucial that the Incarnation occur within the order of the universe as knowable. The same Son of God who became incarnate in the universe is the same Son of God who created it for His revelatory purposes. He had it in His plan at the beginning of creation to become incarnate. Thus, He created a universe that was open to His loving interaction. The purpose of the Incarnation is of the Son to reveal Himself, i.e., God as God the Son/Word to human beings and in so doing to redeem them. This necessitates radical condescension, i.e., the transcendent Son of God humbled Himself to become

¹⁶⁸ Torrance, “The Relation of the Incarnation to Space in Nicene Theology”, 59.

¹⁶⁹ *Ibid.*, 60-1.

Incarnate (Philippians 2:6-8). If His entrance into the universe involved a break or disruption of the space-time order, then His presence would be as one contrary to the knowable structures of reality and hence not knowable by man.

Human beings exist as creatures within space-time and cannot have extra-creaturally knowledge of God apart from the space-time structures of this existence.

Torrance writes, "...for we ourselves belong to nature and are unable to rise above it. We cannot of ourselves transcend the necessities of finite apprehension."¹⁷⁰ The inability of humans to reach God from their space-time existence necessitates God's redemptive self-revelation in space-time. For this reason Christ had to rationally enter created, contingent, rational space-time, reveling Himself and redeeming human beings through his incarnate life, death, and resurrection.

The four-dimensional space-time continuum provides the needed creaturely framework for creaturely human knowledge.¹⁷¹ Unlike the Newtonian thought, the universe as understood by Relativity theory exists as a contingent rationality graspable as it is (not totally but actually) by the human mind. Rationality is not imposed on the universe from the outside as in Newton's thought, nor is information actively formed by the human mind as in Kant's thought. Instead, all that comprises the cosmos has its own contingent rationality, making it knowable to humans. Given that humans exist within the space-time continuum and can know nothing apart from it until they are given glorified bodies, truth must be revealed to them within this continuum.

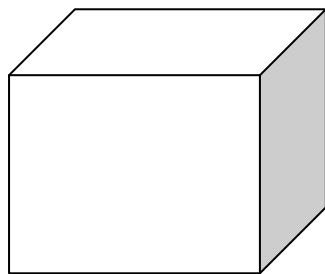
¹⁷⁰ Torrance, "The Relation of the Incarnation to Space in Nicene Theology", 46.

¹⁷¹ The fact that human knowledge is tied to space-time might cause some to wonder how humans will have knowledge in heaven. It would argue that knowledge is directly tied to the created reality in which a person exists. It is reasonable to speculate that our glorified bodies will be open to knowledge in the reality God has created for us to live in eternally.

Consider a person in four-dimensional space-time attempting to communicate to another person what a cube is. If he is permitted only one dimension for communication, he might be able to describe one edge of the cube with a straight line. His ability to reveal the cube, which exists in four-dimensional space-time, is severely limited by the fact that he has only one dimension to communicate this four-dimensional concept.



This graphic would be insufficient to explain a cube. A cube is more complex than this graphic will allow. So, instead consider what could be done with 2 dimensions. A person could draw a cube shape rather well.



This graphic would still cause confusion, because it is really an optical illusion meant to give the impression of a third dimension. However, the addition of a second dimension brings an advance in descriptive clarity.

Consider now, that one had the luxury of a third and fourth dimension (time) to describe the cube. The observer would actually be able to grasp the cube and perceive it with four-dimensional space-time, bringing a much deeper knowledge of the cube,

because the cube would be perceivable within the same space-time continuum as the human observer. More than just perceive, the human observer could relate to the cube as he exists with it at the same place and time. Four-dimensional space-time allows for relations between bodies in space (where) and time (when). The fourth dimension is vital to real human knowledge. Because human knowledge is thus tied to space-time contingent, intelligible realities, it is necessary that God's self-disclosure occur in a knowable and so intelligible way within the space-time continuum which is foundational for all human knowledge.

The Rationality of the Incarnation

The point is that the transcendent God has thus created this contingent, rational space-time universe, so that He can reveal himself to His creatures within it. Therefore, creation can be regarded as a rational medium by which and in which God can and does reveal Himself. Because the Incarnation is the primary and central event of God's self-disclosure it is needful that it be knowable as such and not de-mythologized or re-interpreted to be understood as something other than a space-time event. Further, according to Torrance, the contingent rationality of the universe prepares mankind for knowledge of God. He writes:

Thus the fact that the immanent rationality of the universe is unable to give any final account of itself is the obverse of the fact that the rational connection between the creation and God is grounded in God alone, and does not rest partly in God and partly in the creation. It is for this very reason, namely that the creation acquires its rationality in God's creative comprehension [i.e., by God's creation] of it, that it is constituted and enabled to be the rational medium through which God speaks to us and makes Himself known, and in which once and for all His own eternal Word has become man.¹⁷²

¹⁷² Torrance, *STI.*, 60.

Thus, the Incarnation is the space-time event in and by which God has chosen to make Himself known as he is to humanity in the fullest way. Far from being a disruption of the space-time order of the universe, given the fact that the universe is relationally open to its creator, rather, it is the means through which God has chosen to interact with the universe and with human beings. Torrance writes, “Here space and time provide the rational medium within which God makes Himself present and known to us, and our knowledge of Him may be grounded objectively in God’s own transcendent rationality.”¹⁷³ This is where the contingent rationality of the universe is so important. Human beings must know God as He is. If the universe did not exist with its own rationality or if the human mind imposed rationality on information, knowledge of God as He is would be impossible. Torrance emphasizes that humans must know God rationally. Thereby Torrance clarifies the preeminent importance of the Incarnation and its rationality for the existence and nature of the whole universe. The Incarnation makes it possible for man to know God redemptively.

It should be noted that the word *λογος*, used in the Johannine prologue is important to the thought of Torrance. Does he view the *λογος* the same as John, seeing the Word in the Jewish sense, or does he hold to the Stoic conception of the Word as an impersonal force of reason? His emphasis on the historicity of the Incarnation evidences that Torrance holds to a Jewish conception. Truly, the Old Testament Word (*dabar*) did *become* flesh. He became flesh and he became knowable. Both occurred in one act. Therefore, as Torrance evidences, the miracle of the Incarnation can be considered a logical event.

¹⁷³ Ibid., 24.

Space was thus conceived not in terms of the limits of a receptacle but in terms of body as an agency creating room for itself and extending through itself, thus making the cosmos a sphere of operation and place.¹⁷⁴

**Choice of Rationality in the Incarnation:
The Logos and Rationality**

Hence, Torrance understands the Incarnation as an “intersection” of the triune God with the universe, creator previously active with and in creation.¹⁷⁵ The Incarnation is God the Son becoming flesh in the world’s contingent rationality. Torrance writes, “The Incarnation of the Son of God in the realm of space and time means that He assumes created truth and [contingent] rationality and makes them His own, although He is distinct from them.”¹⁷⁶ The fact that He has created a contingent universe of rationality other than Himself means that He is transcendent in relation to it. Any subjection to it is a decisive act of condescension. This does not mean that He is not immanent. Rather, that He is distinct from the universe and not subject to it unless He chooses to be so. The Incarnation is God’s active choice. Torrance writes:

The conception of an infinite differential in the rationality of God allows us to say that God is free from any necessity, spatio-temporal, causal or logical, in His relationship with the creation, without making Him arbitrary and therefore inscrutable.¹⁷⁷

God is no mere immanent force within the universe (panentheism), nor is He the universe itself (pantheism). As Creator He sustains the universe and is not subject to its natural law unless He chooses to enter it and subject Himself to it. When Christ entered the

¹⁷⁴ Ibid., 9.

¹⁷⁵ Torrance often illustrates this “intersection” in terms of vertical and horizontal realities.

¹⁷⁶ Torrance, *STI*, 65.

¹⁷⁷ Ibid., 67.

universe and became flesh, He subjected Himself in physical form to natural law by choice. In this way, the Son remained utterly transcendent as He condescended to humans, revealing Himself through the universe. In the same way, at the ascension, the Son still maintained His transcendence without losing His Incarnation.¹⁷⁸

However, the fact that God is distinct from the universe as its Creator-Redeemer does not make Him the world's receptacle, imposing rationality on the universe from the outside. Rather, He has spoken the universe into existence, creating it with contingent rationality without continually forcing rationality on it from the outside. His sovereignty in relation to the universe and His choice to reveal Himself intelligibly in it ensure that His entrance is rationally knowable to human beings.¹⁷⁹

The only way to know Him is through the intelligibility of the universe. A Post-Einsteinian view of the universe is imperative to Torrance's conceptions to see this as "a rational representation of interconnections and regularities in the events themselves."¹⁸⁰

Thus from an Einsteinian, contingent, objective, open, inter-relational view of space-time and the manner in which it (space) comes to be becomes evident, space is effected as bodies (e.g., planets) make space for themselves in the relation they have to each other, i.e., the "field" created.¹⁸¹ Therefore, given Maxwell and Einstein's more faithful notion of space, it is possible for the Son of God to enter space because His very act of entrance creates the space for Him to be there. Space is not something that is of its

¹⁷⁸ Ibid., 31.

¹⁷⁹ Ibid., 67.

¹⁸⁰ Ibid., 68.

¹⁸¹ Ibid., 69.

own self. Space is created by bodies making room for themselves in the universe, so Torrance says via Maxwell, i.e. field theory and Einstein, i.e. Relativity theory.

The Word in Johannine Thought. John 1 provides the reader with a vitally important revelation and so understanding of Jesus as Creator, Redeemer and Revealer. The God who creates is, too, in Christ the God who redeems. John explains this concept through his description of the λογος in 1:1-18. Understanding the Son, referred to as “the Word,” as the Creator of the universe provides a continuity of understanding with His redemptive Incarnation. His authority as Creator makes His revelatory action possible. He would not have created a universe closed to His revelation, knowing that universe was to exist for His revelatory purpose.¹⁸² For this reason, it is necessary to develop a clear understanding of the Logos in Johannine thought.

In John 1, John refers to the pre-incarnate Jesus as “ὁ λόγος” which is translated “The Word,” i.e., Logos. In 1:1-3, John makes several comments about the nature of the Logos. His understanding of the Logos seems to be rooted in a Hebrew understanding of the term.¹⁸³ He speaks to the pre-existence of the Word, the deity of the Word, the creation of the universe through the Word.¹⁸⁴ The language of John 1 clearly reflects and

¹⁸² This is a point that will be further supported as John 1:1-14 is discussed.

¹⁸³ The roots of John’s understanding of the Logos will be discussed in further detail later on in the thesis.

¹⁸⁴ In order to understand John 1:1-3, 14 in its proper context, it should be studied in the original Greek. The text is provided below in both Greek and English.

Ἐν ἀρχῇ ἦν ὁ λόγος, καὶ ὁ λόγος ἦν πρὸς τὸν θεόν, καὶ θεὸς ἦν ὁ λόγος. οὗτος ἦν ἐν ἀρχῇ πρὸς τὸν θεόν. πάντα δι’ αὐτοῦ ἐγένετο, καὶ χωρὶς αὐτοῦ ἐγένετο οὐδὲ ἓν. ὃ γέγονεν...Καὶ ὁ λόγος σὰρξ ἐγένετο καὶ ἐσκήκωσεν ἐν ἡμῖν, καὶ ἐθεασάμεθα τὴν δόξαν αὐτοῦ, δόξαν ὡς μονογενοῦς παρὰ πατρός, πλήρης χάριτος καὶ ἀληθείας.

In the beginning was the Word, and the Word was with God, and the Word was God. He was in the beginning with God. All things came into being through Him, and apart from Him nothing came into being

echoes the creation account in Genesis 1, e.g., John uses the phrase Ἐν ἀρχῇ (“in beginning”) to introduce his prologue just as Genesis 1 begins with “In the beginning.” Further, just as God creates the universe out of nothing in Genesis, so in John 1, the Logos creates the universe out of nothing. John makes this point doubly clear stating, “All things came into being through Him, and apart from Him nothing came into being that has come into being.”¹⁸⁵

The use of the term λόγος has profound significance for its first century audience. Some have suggested that John’s understanding is rooted in Hellenist thought linking his writing with either Philo or the Stoics rather than in Jewish thought, i.e., the Old Testament. In the same chapter, John writes that the Word became human and that as a result human beings beheld His revealed glory. Leaving no room for doubt about the humanity of Christ, John uses the clear word σὰρξ (“flesh”). Such a base term could only be used to describe a physical human existence. This is a clear teaching that Jesus Christ revealed God to human beings in the Incarnation. This same Word who created the universe in Genesis 1:1 actively entered it for His redemptive, revelatory purposes on our behalf.¹⁸⁶

John 1 is paradigmatic to understanding the God-world-human relation in that it provides a unitary approach to Jesus Christ as both Creator of the contingent, rational universe and Redeemer within that universe. John describes Christ as both Creator and Incarnate Son, communicating the God-world-human relation clearly. However, in order

that has come into being... And the Word became flesh, and dwelt among us, and we saw His glory, glory as of the only begotten from the Father, full of grace and truth.

¹⁸⁵ John 1:3

¹⁸⁶ John 1:1 uses the phrase “in the beginning,” referencing Genesis 1:1.

to fully understand the implications of Johannine thought, it is important to understand his use of the term “λόγος.”

Hellenistic Usage of λόγος. The Greek word λόγος means both “word” and “reason.” For the Greeks, words and logic were intertwined in the same concept. In 560 B.C., the Greek philosopher Heraclitus developed the idea that all reality was in a constant state of change. While such change was universal, he also held that it was maintained in an orderly fashion through the concept of *Logos*. The *logoi spermatikoi*, which is the Stoic version of the Greek notion of *Logos* brings reason to the universe avoiding any need for an infinite receptacle to impose order from the outside of the universe. However, this Stoic understanding of *Logos* (*logoi spermatikoi*) is impersonal and panentheistic, because it functions as part of the world, bringing order to it. It does not mirror the Johannine definition. For the Stoics, “Space was thus conceived not in terms of the limits of a receptacle but in terms of body as an agency creating room for itself and extending through itself, thus making the cosmos a sphere of operation and place.”¹⁸⁷ While Stoic thought brought improvement in that it moved past a receptacle notion of space, it was problematic, rooted in pantheism and lacking a personal creator to bestow logic on the universe. In this way, the universe could not account for its own logic.

Though the Stoics had developed an idea of ὁ λόγος as an impersonal logic that ordered the universe, it is not clear that John based his understanding on Stoic thought. Others believe John to have borrowed from Philo, a Hellenist Jewish scholar in Alexandria in the first century. However there is no evidence that John borrowed from

¹⁸⁷ Torrance, *STI*, 9.

Philo either. They bear some limited similarities, probably resulting from the fact that they both work out of Old Testament writings. However, Philo's understanding of ὁ λόγος is essentially a Stoic view mixed with the Old Testament understanding of the Word of God. There is little evidence that John borrowed directly from Philo or the Stoics. There is more evidence that John based his understanding out of Old Testament thought.

Jewish Background to John's Usage. From a Jewish perspective, "word" had a powerful meaning. The Hebrews believed that words were tied inseparably tied to reality. It was through words that God spoke the world into existence (Genesis 1). It was through words that Isaac spoke his irrevocable blessing to Jacob. Jewish readers would not have merely glossed over the use of this term. They would understand its power and importance.

ὁ λόγος has powerful meaning for its Hebrew readers, because John's use of the word is rooted in Old Testament thought. In the Old Testament, God's power is directly connected to His creative word as He speaks the universe into existence. It is also connected to His Law. John's use of the word reflects Old Testament use of the "Word of the LORD" (*dabar Yahweh*), which referred to God's authority in Creation.¹⁸⁸ The significance of John's understanding deepens when we consider that Hebrew Rabbis sometimes personified *dabar*.¹⁸⁹ There are many examples of the personified Word of the LORD in the Old Testament. Psalm 33 is one example. While this limited personification is not the same as John's clear statement that the Word literally became

¹⁸⁸ Kysar, Robert. *John* (Minneapolis: Augsburg, 1986), 28.

¹⁸⁹ Keener, Craig S. *The Gospel of John: A Commentary* vol. 1 (Peabody, Mass.: Hendrickson, 2003), 351.

flesh, it emphasizes the significance of the term for John's first-century readers, who were largely Greek-speaking Hebrews. According to Ronald Nash, there is no need to seek a Hellenist background for Johannine thought, when other alternatives are much more likely.¹⁹⁰ Therefore, twenty-first century¹⁹¹ theologians must take these conceptions of the Old Testament Word and its creative order as they approach this text.

The Logos, Rationality and Torrance

Torrance understands the *λόγος* in a similar manner as does John.¹⁹² That is, he sees the Word as the only Creator of the universe who by creation *ex nihilo* both imparts His rationality to it and reveals himself generally in the universe itself as well as redemptively becoming incarnate in it.

The Word of God is the personal, living, and active Self-Word through whom all things visible and invisible were created out of nothing, and who orders and holds the universe together by binding it into such a relation to God that it is preserved from breaking up into nothingness or dropping out of existence, while at the same time imparting to it light and rationality.¹⁹³

Statements like “orders and holds the universe together” and “imparting to it light and rationality” comply with the Johannine understanding of the *λόγος*, i.e., “all things came into being through Him,” (John 1:3) and, “There was the true Light which, coming into the world, enlightens every man” (John 1:9).

Torrance sees Jesus Christ as the ultimate manifestation of the logic of God and thus the center for theological thought. He states, “It is here in the inner life and being of

¹⁹⁰ Nash, Ronald H. *Christianity and the Hellenistic World* (Grand Rapids: Zondervan, 1984), 88.

¹⁹¹ Late twentieth century theologians have also addressed this concept. It is not new to the twenty-first century.

¹⁹² Torrance's view is not identical to John's. However, his model is largely the same.

¹⁹³ Torrance, “The Relation of the Incarnation to Space in Nicene Theology”, 62.

Jesus Christ, in the hypostatic union, that we discern the interior logic of theological thinking, the logic of Christ.”¹⁹⁴ Thus, for Torrance, the Incarnation is the paradigmatic, logical center for theological knowledge, because it is the space-time manifestation of the logic of God.

Torrance affirms that the Word did indeed *become* flesh. That is, He became flesh in space-time as Jesus the Christ. By entering space-time as an historical entity, He became knowable to human beings whose knowledge is linked to the contingent rationality of created space-time. Thus, the Incarnation is a logically coherent event, but it is a miracle because in it God acts in the space-time universe.

The Benefit of the Intelligible Incarnation for Theology and Mankind: It's Effects on Epistemology

The Incarnation is the central revelatory self-disclosive act by which God disclosed Himself known to humanity and as a result both God and humanity are locked in to this revelatory act.

Therefore, now that the Incarnation has taken place we must think of it as the decisive action of God in Christ which invalidates all other possibilities and makes all other conceivable roads within space and time to God actually unthinkable. In this way the Incarnation together with the creation forms the great axis in God's relation with the world of space and time, apart from which our understanding of God and the world can only lose meaning.¹⁹⁵

Thus, this rational understanding is the only given mode of understanding available for redemptive knowledge of God as He is.

This brings up a problematic issue in Torrance's thought. In his effort to uphold the centrality of God's redemptive self-revelation in Jesus Christ, Torrance limits use of

¹⁹⁴ Torrance, *TS*, 217.

¹⁹⁵ Torrance, *STI.*, 68.

Scripture as he develops his thought. Instead of viewing Scripture as under Christ, the authoritative written Word of God, Torrance limits his definition of God's Word to Jesus Christ Incarnate, seeing Scripture as the human response to God's revelation. This method bears some similarity to Bultmann's method of de-mythologization. In Torrance's method, one must approach Scripture with the Incarnation in mind and trace it back through Scripture in order to encounter God in His true revelation.¹⁹⁶ This causes problems for revelation, because it limits God's revelation to human beings. Rather than viewing God's revelation as knowable, Torrance questions the objectivity of Scripture, seeing it as a means for encounter with God rather than objective revelation. Morrison comments on Torrance's method:

Here Torrance has shortchanged the crucial pneumatological aspect of revelation in this 'Being-Act and Act-Being' formulation. This seems to leave the Word 'above' human existence and necessitates alteration of the human in order to effect the conceptual grasping of the Word.¹⁹⁷

While Torrance's overly narrow view of Scripture has to be rejected in order to understand Scripture as the historically accurate, inspired Word of God, Torrance's emphasis on the need for God's redemptive self-revelation in Jesus Christ is vital. Ironically, it is difficult to have knowledge of Jesus Christ without believing that Scripture is inspired.

This has bearing on the coherence of miracles. "Since in Jesus Christ the eternal Son has entered within the contingencies of the created order, making it His own, He may be known only in and through its creaturely freedom and spontaneity, and therefore not in

¹⁹⁶ Morrison, 287.

¹⁹⁷ Ibid., 288.

any *a priori* manner.”¹⁹⁸ Human beings must rely centrally on the redemptive self-revelation of God, the Incarnation of Jesus Christ, for knowledge of God. The Son of God had to become man for man to know God, because human knowledge is linked to four-dimensional space-time rationality. In as much as human beings are bound to four-dimensional space-time, human knowledge of God is contextually bound to four-dimensional space-time. But this does not mean that God does not give any other revelation. It means that God must reveal Himself to humans in space-time. Though He reveals Himself in many ways, the Incarnation is central to His redemptive self-revelation, because the incarnate Christ pays the debt of mans sin by physical death on the cross.

If then the Incarnation is the primary act of God’s revelation to human beings, then it is the central source of mankind’s redemptive knowledge of God. While redemptive knowledge of the Incarnation comes through the inspired revelation of Scripture, It was necessary that the Son enter space-time to redeem human beings through His death and resurrection. By entering space-time, Christ revealed God to human beings in and in relation to the medium of His Creation. Torrance communicates this necessity and the benefit of the Incarnation to human beings.

By its nature the rational mind has been placed in a body and must advance from sensible things, which are bodily, to things beyond sense [with divine help], which are incorporeal and intelligible, but this advance is actually made possible through the bodily Incarnation of the Son of God, and through the rational teaching He imparts to us. And this is the way, as Origen has already explained, in which we may ascend to heavenly places and thus, without leaving our physical location on earth, be emancipated from the narrow confinement of dark material existence in which we have been involved through evil.¹⁹⁹

¹⁹⁸ Torrance, *STI*, 74.

¹⁹⁹ Torrance, “The Relation of the Incarnation to Space in Nicene Theology”, 61.

The fact that the Incarnation occurs rationally within the space-time universe God has created gives human beings the ability to know God rationally through the Incarnation, because the space-time universe is intelligible to human beings. This is not to say that knowledge of God was impossible otherwise. However, the Son of God became incarnate to redeem human beings, revealing Himself to human beings in space-time. Had the Incarnation occurred as a break or suspension of natural law, human knowledge of the Incarnation, and so of God, would be greatly limited if not impossible, because it would have run contrary to the space-time rationality that is the foundation of human knowledge.

With Einstein's understanding of the rationality of the space-time continuum, he was able show the human mind is able to know truth as it is. People ought not consider all relation to the world and truth of the world as an imposition, a molding by the mind, thus "separating" knowers from the truth of the Word, because the universe exists with a contingent rationality. Therefore, Torrance via Barth was able to connect this understanding to theology, evidencing that the universe is not only open to the Incarnation of Christ, it is also serves as the medium for rational knowledge and so for God's redemptive self-revelation.

Conclusions: A "Torrancian" Model

Upon the shoulders of Maxwell, Einstein, Polanyi, Karl Barth and others, Thomas Torrance has helped to illuminate the modern-Newtonian problem in relation to miracles and the implications of Relativity physics for and as complementary to the realms of theology, especially as it relates to the doctrine of the Incarnation and the knowledge of God. His understanding of Relativity physics helps to show and clarify that the space-

time nature of the Incarnation of the Son of God is possible where once it was thought impossible because of the pervasive influence of Isaac Newton. Torrance's approach to Incarnation would seem to be an effective paradigm for the development of a proper definition of *miracle* in this thesis.

Torrance's Christ-centered thinking brings out the rational nature of the Incarnation within the space-time universe by first showing that the universe is knowable, through the relativity physics of Albert Einstein. As a result of the "new" physics, Torrance theo-logically describes a universe "open up" to God's active relation to the world and so His objective revelation whereby he can be known as He is in Jesus Christ. In this space-time universe, God acts not only providentially, but also miraculously and objectively within the framework of His rational, contingent order, redemptively revealing Himself to human beings. Torrance also helps us realize that this transformed understanding of the cosmos is a return to the thinking of early church fathers, and provides several crucial theological principles which carry over to the defining of *miracle*.

The Miracle of the Incarnation, and so divine miracles as such, is primarily an act of God's self-revelation, occurring as a space-time event.

John 1:1-18 describes the pre-existent Word in relation to the cosmos and the Word's Incarnation and human life within the contingent rationality of the universe as existing for the purpose of revealing God to human beings. In the Incarnation, the Son of God enters space-time for the expressed purpose of His supreme and final redemptive self-revelation to human beings, through his life, death and resurrection, occurring as a

space-time event. The purpose of this miracle must therefore be paradigmatic as theologians explore the definition of *miracle*.

As we seek upon these bases to submit a fresh, Christocentric model with which to approach the definition of *miracle*, there must be an unwavering emphasis on the revelatory nature of miracles. The fact that the miracle of the Incarnation is primarily an act of God's self-revelation in space-time provides a principle to be applied in the process of defining *miracle*, i.e., a *miracle* is primarily an act of God's self-revelation, occurring as a historical space-time event in the contingent universe which is "open up" to His redemptive self-revelation.

The miracle of the Incarnation must be intelligible to be known.

When Torrance writes that "It is in and through the universe of space and time that God has revealed himself to us in modes of rationality that he has conferred upon the creation and upon us in the creation" he is asserting the absolute necessity of rationality in the Incarnation.²⁰⁰ By taking into account the contingent rational order of the universe and its crucial role if human beings are to know God as revealed in the world, Torrance, via Einstein, allows for a universe that is epistemologically compatible to the Incarnation and to human knowing. Further, it is noteworthy that this is compatible with the God revealed in Jesus as seen in Scripture.

It is because God himself is so absolutely faithful that the universe described by reference to the constancy of physical light is so invariantly reliable. God does not play dice, as Einstein used to say.²⁰¹

²⁰⁰ Torrance, *GGT*, 1.

²⁰¹ Torrance, *STI*, 83-4.

If the miracle of the Incarnation occurred as an event in relation to the rational order of the universe, if humans are capable of knowing God in relation to it, then it provides a vital principle that must be included in the definition of *miracle*. That is, a *miracle* must be rational, i.e., intelligible to be known. In other words, the contingent rational order of the universe provides human beings with their framework for knowledge. Anything contrary to it is as such not knowable by human beings.

Thus, the process of defining *miracle* must take into account the revelatory purpose, the space-time historicity, and the rationality or knowability of *miracles*. Most modern definitions of *miracle* lack these principles, because they operate from an outdated view of the God-world-human relation. Seeking to be acceptable in an outdated dualistic, mechanistic Newtonian framework, such approaches compromise or even negate the revelatory purpose of miracles and their space-time historicity in favor of existentialist understandings, e.g., Bultmann. Others have used the Newtonian framework to deny the existence of *miracles* all together, e.g., Hume, or they have striven unsuccessfully to define *miracle* against the disjunctive Newtonian framework that renders them impossible, e.g., Swinburne. Still others, such as Purtill and Lewis worked to maintain a classical, orthodox view of *miracle* against the Newtonian framework.

Given the scientific revolution that occurred via Einstein, Christians must no longer try to adjust these Christian teachings to falsified Newtonian views of the universe. Rather theologians must recognize how developments in the sciences, especially physics, ought to significantly affect our view of the universe. Again, given the “open” universe of relativity physics, *miracle* can be defined taking into account its revelatory purpose, its space-time actuality, and its knowability within space time.

The miracle of the Incarnation is in accord with the recognition that the universe is “open up” to God’s divine self-revelation.

Therefore, a proper definition of *miracle* must come with the recognition that the universe is “*open up*” or is naturally receptive by creation to God’s divine self-revelation. The universe, as God’s creation, is “open up” in the sense that it allows for the interaction of God. Hence, it would seem that a more sound definition of miracle must be expressed in accord with the context of the universe that operates as a contingent rational system, freely and dependently relating to the supernatural realm without losing its created order.²⁰² Only a mechanistic, closed universe would or could lead to the conclusion that miracles are an irrational notion. A miracle without such a context is a miracle that cannot truly fulfill its revelatory purpose. From what we observed a bit earlier, the most significant principles for helping us to define *miracle* come from Torrance’s approach to John 1, i.e., from the Johannine portrayal of the created universe as the created, prepared context for the redemptive, revelatory purpose of miracles. However, those principles must be applied in light of a proper understanding of the universe so that man can perceive the miracle within the context of human knowledge.

Beginning with these principles of revelation, rationality, and space-time actuality, we can now submit a possible expression to *miracle* that is in accordance with all these principles. In other words, we can suggest a concept of miracle that harmonizes our knowledge of space-time, biblical revelation and human knowledge.

The liberation of the human spirit from a closed, deterministic continuum of cause and effect, which is now taking place, makes for the resuscitation of belief in

²⁰² Within Torrance’s model, there is no danger of the universe losing its order as miracles occur. This statement is meant to contrast Newtonian notions that God’s action in the universe would cause a “ripple effect” that would disrupt or even eradicate the order of the universe.

divine providence and divine response to human prayer, but so far as specific Christian faith is concerned it allows the basic doctrines of the incarnation and resurrection to be thought out and formulated on their own proper ground without extraneous conditions unscientifically imposed under the absurd claims of a completely formalized model of the universe.²⁰³

Having abandoned the old closed, deterministic Newtonian system in favor of the recognition of the universe that is interactively related to yet wholly dependent on God's revelation, we now endeavor to formulate a proper definition of *miracle*.

Paradigmatic changes in the realm of physics, and consequently the physical and "theological sciences" as a whole, and subsequent changes in the realm of epistemology should cause Christians to reverse the continuing effects of the older view and to reassert the many implications and effects of the interactive God-world relatedness and to pursue their callings in every field, including the physical sciences, in light of it.

Moreover, as in the early centuries of our era so today Christianity must contribute creatively to the controlling ideas of this scientific culture if it is to take deeper root and grow within it. I do not believe that this will be possible unless Christian theology is prepared to engage in radical and critical clarification of its own conceptual tradition in light of questions arising from its interaction with scientific developments, as well as in deep-level testing of the preconceptions and beliefs underlying these developments.²⁰⁴

Therefore, considering Torrance's model as it relates to the Incarnation, a similar approach could be applied to miracles in general. In this way, a *miracle* could be approached as an act of God's self-revelation that occurs as a space time event. This "Torrancian" model would focus on the revelatory purpose of miracles as knowable historical events and so the rationality of such within the contingent rationality of the universe. This would require one to accept that the universe is "open up" to God's divine self-revelation. Therefore, it appears that Torrance's "model" relating to the miracle of

²⁰³ Torrance, *CTSC*, 18.

²⁰⁴ Torrance, *CTSC*, 14-5.

the Incarnation provides principles toward defining *miracle* in accord with a Scriptural understanding of the concept.

CHAPTER 4

CONCLUSION: A BIBLICAL, POST-NEWTONIAN DEFINITION OF MIRACLE

Principles developed in the earlier sections can now be applied to the concept of *miracle* with the goal of more adequately defining it in a way that is both biblically accurate and epistemologically coherent within the framework of the contingent rationality of the created universe. Applying these principles should clarify crucial elements about *miracle*, each of which plays a critical part in the definition.

A Miracle is primarily an act of self-revelation from God occurring as a space-time event.

Torrance's model of the Incarnation emphasizes that it is God's act of miraculous revelation to human beings in space-time. The Incarnation is "the chosen path of God's rationality in which He interacts with the world and establishes such a relation between creaturely being and Himself."²⁰⁵ In this way, He makes space for Himself in the space-time order of the universe.²⁰⁶ Thus God reveals Himself by acting in space-time. This point is vital to the revelatory purpose and nature of miracles. A miracle is God's action as a space-time historical event. Thus, a Torrancian approach will regard miracles as historical events in the space-time order of the universe.

A Miracle must be intelligible in order to be known.

God enacts miracles for the purpose of revealing Himself to human beings in the space-time continuum. If then their purpose is revelatory it requires rationality, because

²⁰⁵ Torrance, *STI*, 67.

²⁰⁶ *Ibid.*, 13.

redemptive knowledge of God cannot be irrational. This is because human knowledge is inherently tied to the rational order of the universe. Hence, miracles must “fit” in relation to the contingent rationality of the universe. If not, they could not be known, thus negating their purpose. Torrance writes that God provides a sequence or continuum of creation that allows for “meaningful formalization” in the universe. It is the rational continuum of space-time that makes human knowledge possible, because human logic operates according to the rational order of the universe.²⁰⁷

Torrance’s model of the Incarnation describes a worldview that includes a contingent, rational order, but that does not of itself rule out the action of the supernatural. Rather, he describes a universe of contingent order, a universe that is dependant on God for its rational, contingent creative order. He follows a Patristic view of the universe, seeing the order of space-time as a “created form of rationality to be distinguished from [but dependent on] the eternal rationality of God.”²⁰⁸ This created rationality is “open up” to the activity of God’s miraculous purposes. It is naturally receptive by creation to His divine self-revelation. If so, then God’s action within the universe is not an intrusion into or an abolition of natural law, but is “the chosen path of God’s rationality in which He interacts with the world.”²⁰⁹ Thus, in Torrance’s model, God’s miraculous action in the universe does not disrupt or negate natural law. Instead, God acts, and the contingent rationality of the universe adapts to His action. Just as space exists as bodies operate in relationship, God’s action has relational effects on the “open”

²⁰⁷ Torrance, *STI*, 61.

²⁰⁸ *Ibid.*, 65.

²⁰⁹ *Ibid.*, 67.

universe. All the while, His action is rational, and thus knowable to human beings in space-time.

**A miracle must be in accord with the recognition that the universe is
“open up” to God’s divine self-revelation.**

Hence a Torrancian model of *miracle* requires that the universe be open to the action of God. Miracles cannot exist in a cosmologically and epistemologically dualistic system as we have found. Torrance writes that Newton’s receptacle notion of space closes off the universe from God’s action.

The continuation of this dualism in modern theology is a crude anachronism, for it belongs to a cosmological theory that is no longer possible, but it was a theological impropriety in any case, i.e. a pseudo-theological construct deriving from an alien concept.²¹⁰

Torrance’s model requires that cosmologically and epistemologically dualistic views of the universe must be rejected in favor of an “open” view that allows for God’s interaction in the space-time universe.

Torrance emphasizes that the *ex nihilo* creation of the universe means that God has sustaining power over the space-time universe. Therefore, according to Torrance, “They [space and time] cannot therefore be bracketed [grouped] with God after the manner of Newton.”²¹¹ This is because God, as Creator, is not subject to the laws of His creation unless He chooses to subject Himself to those laws as in the case of the Incarnation. Thus, instead of being dualistically separated from the universe, “God stands in a transcendent and creative, not a spatial or temporal, relation not the creaturely

²¹⁰ Ibid., 63.

²¹¹ Ibid., 60.

world.”²¹² As a result, God is not dualistically separated from His creation. Instead, he is free to enter it and act on it according to His will. For Torrance, this “open” view of the universe makes miracles possible.

Therefore, a possible Torrancian model of *miracle* would define it as a rational, knowable, historical act [event] of God, whereby He reveals Himself to human beings in the rational space-time universe, lovingly meeting human need. Such a self-revelatory action of God is possible because God has so created and ordered the universe, reflecting His own rationality, that it is interactively related to and dependent on its creator-redeemer, contra Newton’s mechanistic universe, through his redemptive self-revelation. Further, the new physics provides an understanding of the universe that is much akin to the biblical understanding of the God-world relation and the contingent universe, which is “open up” to its creator-redeemer.

²¹² Ibid.

BIBLIOGRAPHY

- Aquinas, Thomas. *Summa Theologiae*, vol. 15. Translated by T.C. O'Brien. New York: Cambridge, 2006.
- Augustine. *The City of God Against the Pagans*. Ed. R.W. Dyson Cambridge, UK: Cambridge University Press, 1998.
- Barth, Karl. *Church Dogmatics II/2.*, ed. G.W. Bromiley and T.F. Torrance Edinburgh: T.and T. Clark, 1957.
- Barth, Karl. *The Theology of John Calvin*, trans. Geoffrey W. Bromiley Grand Rapids: Eerdmans, 1995.
- Brown, William E. "Quantum Theology: Christianity and the New Physics" *JETS* 33 v4. December, 1990.
- Bultmann, Rudolf. *Jesus Christ and Mythology*. New York: Scribner, 1958.
- _____. *New Testament and Mythology*. Philadelphia: Fortress, 1984.
- Calvin, John. *Institutes of the Christian Religion*. Philadelphia: Westminster, 1955.
- Elwell, Walter A., ed. *Evangelical Dictionary of Theology*, 2d ed. Grand Rapids: Baker Academic, 2001.
- Geivett, Douglas R., and Gary R. Habermas, ed. *In Defense of Miracles*. Downers Grove, Illinois: InterVarsity, 1997.
- Green, Brian. *The Elegant Universe*. New York: Norton, 1999.
- Hanby, Michael. *Augustine and Modernity*. New York: Routledge, 2003.
- Heltzel, Peter. "Interpreting the Book of Nature in the Protestant Tradition." *Journal of Faith and Science Exchange* 4 (2000): 223-239.
- Kant, Immanuel. *Critique of Pure Reason*, trans. J.M.D. Meiklejohn London: George Bell, 1878.
- Klinefelter, Donald S. "God and Rationality: A Critique of the Theology of Thomas F. Torrance." *The Journal of Religion* 53 (January 1973): 117-35.
- Kuhn, Thomas S. *The Structure of Scientific Revolutions*, 2d ed. Chicago: University of Chicago, 1996.

- Lewis, Clive Staples. *Miracles*. San Francisco: HarperCollins, 1996.
- Maxwell, James Clerk. *A Dynamical Theory of the Electromagnetic Field*. Edinburgh: Scottish Academic, 1982.
- Morrison, John Douglas. *Knowledge of the Self-Revealing God in the Thought of Thomas Forsyth Torrance*. New York: Peter Lang, 1997.
- Nash, Ronald H. *Christianity and the Hellenistic World*. Grand Rapids: Zondervan, 1984.
- Newton, Isaac. "Fundamental Principles of Natural Philosophy," *Newton's Philosophy of Nature*. ed. H.S. Thayer New York: Hafner, 1953.
- New American Standard Bible*. Grand Rapids: Zondervan, 1995.
- Polanyi, Michael. *The Tacit Dimension*. Garden City, New York: Anchor, 1967.
- Stump, Eleonore. "Revelation and Biblical Exegesis: Augustine, Aquinas, and Swinburne." *Reason and the Christian Religion: Essays in Honour of Richard Swinburne*. Oxford: Clarion, 1994.
- Swinburne, Richard. *The Concept of Miracle*. London: Macmillan, 1970.
- Swinburne, Richard. *The Resurrection of God Incarnate*. Oxford, Clarendon, 2003.
- Thayer, H.S. *Newton's Philosophy of Nature*. New York: Hafner, 1953.
- Torrance, Thomas Forsyth. *Christian Theology and Scientific Culture*, (Queen's University, Belfast, Lectures 1980). New York: Oxford University Press, 1980.
- _____. *God and Rationality*. Oxford: Oxford University Press, 1971.
- _____. "The Relation of the Incarnation to Space in Nicene Theology" *The Ecumenical World of Orthodox Civilization*. Paris: Mouton, 1974.
- _____. *The Ground and Grammar of Theology* (James W. Richard Lectures, University of Virginia.) Charlottesville: University of Virginia Press, 1980.
- _____. *Theological Science*. New York: Oxford University Press, 1969.
- _____. *Reality and Evangelical Theology*. Philadelphia: Westminster Press, 1982.
- _____. *Reality and Scientific Theology*. Edinburgh: Scottish Academic Press, 1985.
- _____. *Space, Time and Incarnation*. New York: Oxford University, 1969.