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Process Theism, Environmental Ethics, and a Christian Theology of Ecology

One of the most prominent and, I would contend, the most important topics in contemporary Christian theology is the relation of religion to science. I am not referring here to the misguided debates currently being conducted in our public school systems over the issue of creationism vs. evolution. Instead, I refer to role of religion in contributing to a sound environmental ethic through which to alleviate the ecological crisis with which our world is currently faced. Of course, before I proceed further, some explanation is required since one cannot simply casually drop a term like ecological crisis without providing some clarification concerning how it is being used. In fact, the descriptive term “ecological” has become a household expression in our contemporary culture and is far too often flippantly tossed around without a proper explanation of its intended meaning and, thus, the need for clarification.

First of all, by “ecological”, which is a referent to the scientific discipline of ecology, I mean that branch of science which studies the interconnectedness and relationship of all things contained within the natural world. We are all a part of individual ecosystems which are, in turn, nested in larger ecosystems, which are all contained within the Earth ecosystem, which comprises the ecological systems of our entire planet. The characteristics of these ecosystems, whether large or small, cannot simply be calculated by studying the individual entities of that individual system, but, instead, the relationship of the whole transcends the function of the individual components of the system, and thus, the common phrase to describe the ecosystem

concept, “the whole is greater than the sum of its parts.” For a more authoritative definition, the late Eugene Odum, the so called “father of modern ecology,” offered the following:

The term *ecology* is derived from the Greek root “oikos” meaning “house,” combined with the root “logy,” meaning “the science of” or “the study of.” Thus, literally ecology is the study of the earth’s “households” including the plants, animals, microorganisms, and people that live together as interdependent components. Because ecology is concerned not only with organisms but with energy flows and material cycles on the lands, in the oceans, in the air, and in fresh waters, ecology can be viewed as the “study of the structure and function of nature”—it is understood that mankind is a part of nature. (Odum 1).

In terms of ecological crisis, I am referring here not merely to environmental degradation, which is not a new phenomenon for humanity. Instead, I refer to the unique crisis, which has emerged over roughly the past 60-70 years of human history, perpetuated by a combination of factors, including overpopulation, overconsumption, excessive production of greenhouse gases, mass pollution, and the lack of regard for the functions of natural systems, all of which are characteristic of modern, technological, and industrialized societies. In this paper, I do not intend to exhaustively explicate this crisis; I accept the above claims of our environmental dilemma as a given. I assert this with the confidence that the scientific evidence to support my claims is convincing if not overwhelmingly so. However, the following statement from Frank Golley, an ecologist at the University of Georgia, will help to place my comments into perspective: “Before 1940 there were viable human sustainable systems in natural landscapes all over the earth. After 1950 these systems were assaulted by the dominant societies and destroyed almost everywhere. Today even the remnant natural landscapes are being destroyed to provide resources for a human population that is growing out of control” (Golley 24). It should be noted that ecological science has shown that our planet is extremely resilient and capable of overcoming and adapting to major disruption. In addition, there is nothing inherently wrong

with modernity, technology, or industrialization. However, if these factors are combined with exponential population growth and a lack of education concerning how our ecological systems function, we could be pushing the resiliency of the Earth system, in as much as it can continue to support life, to its breaking point.

With this in mind and before moving on to my explication of the manner in which I believe Christian theology can contribute to the alleviation of this crisis, it is necessary to examine the nature of the relationship between Christian religion and science. In his text, *Religion and Science*, Ian Barbour offers four possibilities concerning the actualization of this relationship. These possibilities are Conflict, Separation, Dialogue, and Integration. The first of these can be immediately rejected. The idea that the theological statements of the Bible imply scientific claims or that the empirical sciences alone can either prove or disprove the legitimacy of religion is completely untenable. The Separation or compartmentalization option is an improvement upon the Conflict option in that the two methods of inquiry are not diametrically opposed to each other. Instead, as Barbour points out, “Each has its own distinctive domain and its characteristic methods that can be justified on its own terms” (Barbour 84). This has been a popular view among those who have sought to retain the traditional claims of religion along with current scientific claims, while simultaneously retaining each method’s autonomy. For example, Karl Barth’s Neo-Orthodoxy took seriously the criticisms of Kant concerning rational arguments for the existence of God and rejected all attempts at natural theology as futile, while maintaining that God is known solely through revelation. The possibility of phenomena such as the traditional conception of divine miracles is retained since making such a claim is deemed an essential theological assertion and, consequently, one that does not infringe upon scientific inquiry. However, despite the fact that the autonomy of each respective discipline is maintained,

Barbour finds this view equally unacceptable: “We do not experience life as neatly divided into separate compartments; we experience it in wholeness and interconnectedness before we develop particular disciplines to study different aspects of it” (Barbour 89). I could not agree with Barbour more on this point. If reality is one, then there is no justification for separating it into component parts in order to retain traditionally held views. We would be inflicting a delusion upon our sense of what is real in that this view attempts to create a world view in which reality is dual when the act of living itself does not support such an assumption. According to David Griffin, it is possible for some to “participate fully in both communities, without holding one worldview on Sunday and another on working days” (Griffin xxii). As I will argue later, the separation of these two disciplines in order to make a place for the unilateral intervention of God through supernatural acts will ultimately hinder the establishment of an effective ecologically credible Christian theology.

The last two options listed by Barbour, dialogue and integration, differ, I believe, more in degree than in their essential function concerning the relationship between religion and science. Consequently, I will not deal with them separately but will instead bypass an explication of the former in order to address the integration option, which I contend is necessary for the implementation of a theology, which can provide the most sound environmental ethic. Of course, this does not mean that the two disciplines are synonymous. On the contrary, as Griffin points out, science and Christian theology “are and will remain very different enterprises, focusing on different aspects of the total truth” (Griffin xxii). They are different modes of inquiry; however, as I will argue later, the criteria by which they are validated does not have to be. One example, listed by Barbour, of this integration approach is process philosophy, which he refers to as a “systematic synthesis” in which “both science and religion contribute to the

development of an inclusive metaphysics” (Barbour 98). It is my contention that process theism is the most viable metaphysical framework available through which to establish a Christian theology of ecology, which will be compatible with the ecological concepts mentioned above and will subsequently perpetuate the most effective environmental ethic concerning Christian theology’s role in the abatement of the aforementioned ecological crisis.

Process thought is a product of the legacy of the metaphysical framework established by Alfred North Whitehead. In this essay, I do not intend to provide an exhaustive explication of the unique concepts of God that have emerged from his work. My concern here is to develop a Christian theology of ecology with the aid of process categories, and since Whitehead did not deal explicitly with this, my explication will focus on some of those theologians, who, having been influenced by him, have subsequently taken up this cause. My purpose here is to build upon the scholarship that has been informed by the metaphysical principles put forth by Whitehead and his successors in order to show how this framework is compatible with formulating a theology that is environmentally ethical as well as ecological. However, before moving further into my assessment of process theism, it is necessary to make a very important distinction, which will be integral to my subsequent argument.

In light of my preceding comments concerning the nature of ecological science, I contend that there is a distinct difference, which is all too often overlooked, between an ecological theology and an environmentally ethical theology. For instance, there has been much media coverage recently concerning the development of an evangelical Christian environmental ethic. This ethic is based on the assumption that we should protect our environment as it is God’s gift to us, while maintaining a rather anthropocentric view that, we alone, as members of humanity, are created in God’s image. In other words, we should be good stewards of God’s creation while

retaining hope, as the apex of that creation, for the future soteriological fulfillment, which is seen as the ultimate goal of human existence. While the goal is sustaining the integrity of the natural world, this particular approach is not compatible with an ecological worldview. Golley claims that “Environmental ethics teaches that environmental destruction is wrong and points toward relationship and sustainability” (Golley 24). The evangelical ethic would be compatible with this definition but would not meet the criteria established by ecology concerning humanity’s relationship and connectedness with the other components of our ecological system. Therefore, an environmentally ethical theology will have the goal of protecting our natural systems from environmental degradation, but will not necessarily be ecological concerning its explanation of the human species’ relationship to that environment. On the other hand, an ecological theology, while maintaining the uniqueness of humanity, will focus on humankind’s kinship to the natural world in contrast to our separation from that world. In other words, we are not separate but are a part of the whole. Consequently, an ecological theology will always be environmentally ethical but an environmentally ethical theology will not always be ecological in nature. Before moving on, it is necessary to mention that I do not wish to completely negate the effectiveness of versions of the stewardship model such as the aforementioned evangelical ethic. In contrast to much of the history of Western philosophy and theology, this is a step in the right direction. However, it is not the most effective means by which to establish an efficient and sound environmental ethic, which is simultaneously ecologically credible.

Process theism provides an alternative metaphysical framework to those traditionally associated with theistic theology by providing a system through which theology and the natural sciences are mutual partners working toward the pursuit of the greatest possible knowledge of truth. They are distinct but inseparably related in relation to this search for knowledge.

According to Barbour, Whitehead's framework "is ecological in holding that every entity is constituted by its relationships. It is evolutionary in accepting a long history of continuous change in which no absolute lines can be drawn between successive forms of life" (Barbour, *Nature* 131). Although process thinkers accept that humanity is unique in nature for having developed "reflective self consciousness," human kind is still seen to be "continuous with the rest of nature" having arrived at this point in our history through the evolutionary process (Barbour, *Religion* 104). In that sense, we can speak of ourselves as being the only remaining species to possess this level of consciousness, but we must accept that we are not the only unique creatures in the created order and thus we cannot speak of ourselves as standing outside of that order. In their book, *The liberation of life*, Charles Birch and John Cobb, Jr. assert the following:

One response to the implications of evolutionary theory is a bifurcation of reality that tries to create a protected sphere for the human wholly separate from the rest of nature. It has profound effects on human self-understanding which we find incredibly damaging. We take evolutionary history seriously in the effort to understand humanity, its future, its relations to other living things and to the life that is inwardly experienced.  
(Birch and Cobb 3)

Despite our uniqueness in possessing our high level of consciousness, we are still members of our natural environment.

This does not imply that we are solely determined by our lot in a determined evolutionary history or that, as the Deists claimed, God set the natural world in motion and is no longer a part of its function. In other words, God is neither a strict determinist nor a divine clock maker. On the contrary, God is connected to the natural order acting with every event. As Barbour asserts, "Process metaphysics understands every new event to be jointly the product of the entity's past, its own action, and the action of God" (Barbour, *Religion* 104). Consequently, while God is present in the actualization of each event, God is never the sole determining cause in any one actualization: "God is present in the unfolding of every event but never exclusively determines

the outcome. This is a God of persuasion rather than coercion” (Barbour, *Nature* 34). Through this persuasion, according to Whitehead, God is the source of all novelty as God provides each actual entity with what he referred to as its “initial aim”: “Thus an originality in the temporal world is conditioned, though not determined, by an initial subjective aim supplied by the ground of all order and of all originality” (Whitehead 108). As I will explicate further later in this essay, the God of process theism has necessary, metaphysical limitations. This is not the “God of the gaps” who unilaterally intervenes in the natural order at various points in history. Nevertheless, as Dr. William L. Power, my major professor at The University of Georgia, pointed out in the paper he presented to our department in February 2006, we can still “arrive at the hypothesis of God as the ultimate source, center, and end of faith” (Power 10). God is present in all aspects of life and, as such, is the ground of human faith in the significance of life, but God does not definitively dictate the realization of any of these aspects.

Obviously, the process conception of God is a departure from the way God has traditionally been perceived. Against classical philosophical theism, the God of process thought is not impassable but is free to affect and *be affected* by the world and not omniscient since God has no foreknowledge of that which will occur in the future. God is also not, as this term is classically defined, omnipotent in that all power does not reside solely with God; instead, as Barbour states, God “elicits the self-creation of individual entities, thereby allowing for freedom and novelty as well as order and structure” (Barbour, *Religion* 104). Also, the process God differs from the Biblical conception of God in that the former acts not upon the world through unilateral intervention but with the world providing the initial aim for every “actual occasion,” to use Whitehead’s terminology. In addition, the Biblical God, while acting within the world, necessarily exists apart from it. Process theists maintain that, while God is distinct from the

world, God is necessarily related to *some* world. In other words, God cannot exist alone as both the God of classical philosophical theism and Biblical theism can. In relation to pantheism, while the created order is a part of God, God and the world are distinct, and, therefore, the One and the many are not synonymous as they are in pantheism. In Barbour's words, "God transcends the world but is immanent in the world in a specific way in the structure of each event" (Barbour, *Religion* 104).

In brief, while God and our world are not identical, the latter is included in the former and is necessarily inseparable from that Source of creativity, which we refer to as God. As a result, we experience this creative presence as acting *with us* in our world and not *on us* from outside of it. In *Is It Too Late? A Theology of Ecology*, Cobb has this to say concerning this issue:

The creative action of God which concerns us is the creation that takes place now, moment by moment, in our environment and in ourselves. In each moment God confronts the totality of the past with new possibilities. How the world responds, whether in acceptance or rejection of these possibilities, God does not determine. God creates by persuasion in and through the free decisions of the creatures. To believe in God is to trust this creative work amongst and within us, to adapt ourselves to it, to attend to it as it operates in all creatures, to sensitize ourselves to it as it works in us, and to respond to its call to new risks. (Cobb 77)

This is not a God who will inspire a this world/other world dichotomy or a God who is to be found by escaping the world in which we find ourselves. This is also not a God who is found exclusively in sacred space or in a sacred text. Instead, as Dr. Power has reminded me often, this is a God who is always present to and with us and, additionally, a God who can inspire the ecological theology for which I am arguing here.

The requisite criteria for this ecologically credible theology could be applied equally to all forms of theism; however, since my primary concern here is to develop a Christian theology of ecology, it is necessary to establish some additional, specific criteria. Any Christian theology

must retain a certain continuity with that foundational witness, which is recorded in the writings of the New Testament. However, contemporary theology, while being inextricably linked to that earliest recorded witness through the Christian tradition, is not bound to the interpretations of those early Christian communities. In other words, we are connected to the Biblical expressions of faith by heritage but not in terms of interpretation. Schubert Ogden, in reference to these double criteria concerning “the adequacy of theological statements,” states that all theological pronouncements must be both *appropriate* and *credible* (Ogden, *On Theology* 4-5). He claims that a theological statement must be appropriate “in the sense that it represents the same understanding of faith as is expressed in the ‘datum discourse’ of normative Christian witness” and though “this does not mean that reflective understanding may employ no concepts or assertions other than those of its datum discourse, it does imply that the development of its conceptuality should never lose touch with the symbolism it is supposed to interpret” (Ogden, *On Theology* 4-5). Therefore, any subsequent theology must be in continuity not in isolation, distinct but not separable, from that which has come before us.

In addition, Ogden also insists that all theology must be credible “in that it meets the relevant conditions of truth universally established with human existence” (Ogden 5). Accordingly, theologians must be informed by all aspects of human understanding judging credibility by the critical criteria of reason and experience. If we do not understand reality to be fragmented or compartmentalized, we must not attempt to understand it as such. Of course, theology must exist on its own and cannot be seen as merely an amalgam of various methods of human inquiry. However, if theology is truly going to speak to contemporary humankind, it must be informed by these various disciplines. Autonomy of each discipline will be maintained but theology, being that mode of inquiry which seeks to describe and explain ultimate reality,

must necessarily be open to the possibility of being influenced by all modes of acquired knowledge. If theology fails to do so, it will fail to fulfill its purpose of defining the meaning and significance of human existence. According to Ogden, “the scope of theology’s practical discipline is as broad as the whole of human culture, and it properly considers every form of human activity as potentially bearing the contemporary witness of faith” (Ogden 14).

Consequently, process theism is open to the ecological model, which I have described above, in that process theists see the necessity of making contemporary theology relate to all aspects of human reason and experience.

Therefore, process theists are willing to ask those difficult questions, which may lead to a reinterpretation of our traditional conception of ourselves as inherently superior members of the created order. As Cobb writes in his preface to *Is It Too Late?*, “Such rethinking will be neither comfortable nor easy. Our most fundamental picture of ourselves as human beings in relation to God and to a nonhuman environment will be at stake” (Cobb 4). However, only that religion, which has accepted its truth as final, will be threatened by this way of thinking. Ecological theology must stand at what Ogden refers to as the second “pole” of Christian theology informed by but not dependent upon past interpretations of Christian theology for contemporary expressions of the traditional faith. It must be committed to what Dr. Power referred to, in his discussion of the work of C. S. Peirce, as a “scientific metaphysics.” This will be a metaphysical framework that, along with all other modes of epistemological inquiry, will rely on the scientific method, broadly conceived, for justification. Entailed is a commitment to fallibilism in that subsequent evidence may prove our previous assertions to be mistaken. It most certainly is not an uncritical commitment to tradition, supernatural revelation, blind faith, or mystery.

Ultimately, mystery will remain but theologians who remain true to these dual criteria will not rest assured that it will remain as it is currently perceived.

At this point, I would like to briefly discuss an article published in 1967 by Lynn White, Jr. entitled “The Historical Roots of Our Ecologic Crisis.” This may seem like a bit of a digression; however, those familiar with environmental theology know that this article, in many ways, provided the impetus for all subsequent discourse concerning Christian theology’s relationship to the natural world. In short, White’s thesis was that Christianity bore the greatest culpability for the perpetuation of an anthropocentric attitude toward nature, which, when applied to the merging of modern science and technology, accounts for the modern ecological crisis. In White’s words, “Our science and technology have grown out of Christian attitudes toward man’s relation to nature which are almost universally held not only by Christians and neo-Christians but also by those who fondly regard themselves as post-Christians” (White 12). The scholarly response to White’s article from those supportive and non-supportive of Christian tradition has been extensive and many, regardless of viewpoint concerning Christianity, have come to the conclusion that White may have overestimated the significance of Christianity’s contribution to our current crisis. For instance, Barbour claims that “White seems to have oversimplified a complex historical phenomenon” in that he attributed too much of the blame to Christianity alone without considering other sources such as the sharp distinction in Greco-Roman thought between humankind and nature and the rise of industrialization, which may be equally as culpable for the anthropocentric views, which contributed to the disregard of the intrinsic value of the natural world (Barbour, *Ethics* 75). Barbour also points out that White failed to recognize that “extensive environmental damage occurred in non-Christian countries at many periods in history” (Barbour 75). Nevertheless, despite the shortcomings of his argument,

White was most definitely correct in identifying the anthropocentric tendencies, which have been prevalent in past and present Christian tradition.

In the space that I have here, I do not intend to exhaustively examine the merits and weaknesses of White's argument. I am most concerned with the response to White's argument considering the fact that his influence still reverberates today and is at least implicit in all of the subsequent scholarship concerning this subject. There have been a number of different responses to White's argument, but I will focus on two which followed from White's following conclusion: "More science and more technology are not going to get us out of the present ecologic crisis until we find a new religion, or rethink our old one" (White 12). The subsequent discussion will help to further explicate process theism in its relationship to environmentally ethical theology and its potential for establishing a Christian theology of ecology.

The first response involves those who believed that White went too far in devaluing the Western religious tradition and subsequently sought to reevaluate the Biblical text in order to explicate those aspects therein which are conducive to an environmentally ethical theology, a method, which Barbour refers to as the "stewardship motif" (Barbour, *Ethics* 77-78). A representative example of this type of attempt to recover environmentally sound themes from the Biblical text is H. Paul Santmire's *The Travail of Nature: The Ambiguous Ecological Promise of Christian Theology*. Santmire admits that White does identify some positive examples, such as St. Francis, concerning the Christian tradition's view of humanity's place in the natural order. However, he believes that the final conclusion of those who identify this "minority tradition" is inevitably the same: "Yet even when such fragments of value are identified, the underlying point of view remains the same: overall, the Western theological tradition is ecologically bankrupt"

(Santmire 2). Consequently, his intention is to recover the elements from the Biblical text, which will contradict this claim.

He does so by identifying two theological motifs in the Biblical narrative, which are built upon root metaphors, which he describes as the “*interface* between the most original experiential moments of the religious life and the secondary levels of mythological-theological reflection and speculation” (Santmire 15). For further clarification, he states that “a theological motif is the name we can give to a habitual employment of one or more root metaphors” (Santmire 15). He lists three root metaphors (the metaphors of ascent, fecundity, and migration to a good land), which serve to form what he refers to as the “spiritual” and “ecological” motifs.

According to Santmire, the spiritual motif “is predicated on a vision of the human spirit rising above nature in order to ascend to a supramundane communion with God and thenceforth to obey the will of that God in the midst of the ambiguities of mundane history” (Santmire 9). This spiritual motif is built upon the root metaphor of ascent, which depends on what Santmire describes as “the experience of the overwhelming mountain” (Santmire 16). This metaphor of ascent is characterized by an attempt “to ascend the overwhelming mountain with my sights fixed firmly on the ethereal reaches above. The way up the mountain is then my way to seek transcendence, far removed from the mundane things of the earth below” (Santmire 18). In other words, Santmire’s spiritual motif, which comes to be through the perpetuation of the metaphor of ascent, seeks an escape from the natural world. That which is ultimate, the greatest good, lies not in that which we can observe but in that which lies beyond in the heavenly realm of God. Consequently, according to Santmire, the consequences of the manifestation of this spiritual theological motif are such that “nature tends always to be interpreted or validated (if it is validated) finally in terms of spirit” (Santmire 9).

The second theological motif, which he refers to as the “ecological motif,” “is predicated on a vision of the human spirit’s rootedness in the world of nature and on the desire of self-consciously embodied selves to celebrate God’s presence in, with, and under the whole biophysical order as the context in which the life of obedience to God is to be pursued” (Santmire 9). This motif is formed by a combination of the root metaphors of fecundity and migration to a good land. Like the metaphor of ascent, the metaphor of fecundity is characterized by its relationship to the experience of the overwhelming mountain. However, unlike the former, one’s goal in relationship to the metaphor of fecundity is “to rise to a vantage point where I can begin to apprehend the earth’s vastness and mystery and beauty” (Santmire 18). Therefore, by combining these two metaphors, Santmire describes a situation in which transcendence and immanence are perfectly combined. The goodness of nature is explicitly affirmed by the migration to a good land since, according to Santmire, this implies that “one can never lose one’s rootedness in the world of nature” (Santmire 26). In addition, the transcendence of God is maintained through the metaphor of fecundity. A combination of these two leads to the achievement of a theological motif, which is, according to Santmire, “ecological.”

Santmire sees both the teachings of Jesus as they are represented in the New Testament and the theology of Paul “as bringing together the influence of the metaphor of migration to a good land and the metaphor of fecundity, in terms of apocalyptic expectation” (Santmire 203). In other words, he sees the “ecological” motif being realized in the apocalyptic language of “the coming new heavens and the new earth, or in the integration and unification of the whole creation under the cosmic rule of Christ” (Santmire 210). As his subtitle implies, he does recognize that this “ecological” promise is ambiguous; however, for him, Christian theologians

have the duty to interpret Scripture in light of these environmental themes and not in relation to the detachment implied by the spiritual motif.

While Santmire's work is most definitely necessary and must be commended, it is not sufficient to address our current environmental crisis. In his explication, he claims that process theologians such as Cobb and Birch have indirectly affirmed White's assumption that the "biblical-classical theological tradition in the West" is ecologically bankrupt: "Notwithstanding many references to the Bible and to some classical theologians in their works...these process thinkers have not been primarily concerned to identify the substantive continuity of their argumentation with the received theological tradition" (Santmire 6). I believe that Santmire's criticism is unfounded here. Concerning these issues, there is a certain departure with received tradition for most process theists, but all theology must be ever willing to make just such a departure in order to remain applicable to our contemporary experience. In this case, a departure is necessary. This is so because, in my opinion, any attempt to read an ecological awareness into the foundational Christian text and most of Christian tradition, which includes figures such as St. Francis, is anachronistic. Ecological science and our modern ecological crisis are contemporary. Therefore, we can speak of the affirmation of the goodness of the creation witnessed to in the Biblical text and subsequent tradition but we cannot speak of an ecological theology. As is the case with many of our other modern problems, our ancient, sacred texts have no advice for us concerning the current ecological crisis. Thus, we must look for new answers while not forgetting that rich heritage, which stands before us.

Consequently, Santmire's "ecological" motif is not "ecological" at all. Standing alone, this Biblical motif has nothing to say concerning our modern crisis. In terms of Ogden's criteria for Christian theology, Santmire's work is appropriate and, as such, can form the basis for the

development of an ecological theology, but that theology must be established at the second pole, based in our contemporary reason and experience, if it is to be credible. Our present world view simply does not warrant the eschatological expectation upon which Santmire's "ecological" motif is predicated. As Cobb so clearly expresses, "The Old Testament found hope in the anticipated interventions of a transcendent God. The New Testament looked forward to the apocalyptic end of an unacceptable history. Few of us can live with these visions of reality, and their collapse in the last three centuries seems to have removed the grounds of hope for many people" (Cobb 81). In other words, there is no determined Omega point in history. There will inevitably be an end to life on our planet when our sun fails to provide sustenance suitable for supporting life. It is possible, and maybe even likely, that humanity's end will precede this event. However, this cannot be known definitively. Not even God can know what the future will hold because it is marked by contingency. The future is characterized by an unrealized potential. Consequently, if we accept these criteria, we must admit, with Birch and Cobb, that "faith in Life [referred to here by Birch and Cobb as synonymous with God] means more the confidence that Life is not finally defeated than the belief that we can state accurately the form of its victory" (Birch and Cobb 201). As a result, adherence to a scientific metaphysics necessarily separates us from the expectations of much of the tradition, which has preceded us. However, we can see ourselves in continuity with that tradition and, like Santmire, recover those themes, which can aid in promoting an environmental ethic through the affirmation of the goodness of the natural world. Subsequently, however, we must necessarily move beyond the interpretation of Biblical theism and much of Christian tradition in terms of our relationship to the non-human world if we hope to develop a theology that can be credible within the ecological environment of which we are inevitably a part.

Another reaction to White's argument involves those who, in the wake of its influence, accepted White's criticisms as, for the most part, a given and basically rejected the possibility of Christian theology contributing to the cause of maintaining environmental integrity. Many, who have taken this view, when speaking of the role of religion in the ecological crisis, look to non-Western world views to provide the contribution, which will come from the Western world. Among these are the so-called "Deep ecology" philosophers Bill Devall and George Sessions. In his article "The Deep Ecology Movement," using the paradigmatic language of Thomas Kuhn, the former writes of the "dominant paradigm in North America" in which the natural world "is only a storehouse of resources which should be 'developed' to satisfy ever increasing numbers of humans and ever increasing demands of humans" (Devall 472). In order to suggest an alternative to this environmentally destructive paradigm, Devall offers possible sources for a shift in paradigm, a paradigm of deep ecology. This new paradigm, he claims, "is premised on a gestalt of person-in-nature. The person is not above or outside of nature. The person is a part of creation on-going" (Devall 473). I will deal here only with those options, which pertain to religion.

Prominent among the options listed as sources that can potentially contribute to this new paradigm are Eastern and Native American traditions. He also refers to that aforementioned "minority tradition" among Western religious and philosophical traditions. Among these, he seems to favor the pantheistic philosophy of Spinoza (Devall 473-474). In presenting the nature of paradigms as described by Kuhn, Devall is very aware that a paradigm shift is often very difficult to enact due to the fact that any inconsistency is often met with "an attempt to explain away the inconsistency" and, in certain instances, is only perpetuated after a period of crisis

ensues (Devall 472). However, he seems to fail to recognize the difficulty in replacing what *is* a Western paradigm with largely non-Western ideas and religious practices.

For example, regarding the alleviation of the current ecological crisis, how can one expect the religious contribution of the West, a paradigm largely shaped by the Judeo-Christian tradition, to be defined predominantly by an Eastern religious world view? I accept it as a given that, when dealing with the relationship of religion and science, an ecumenical perspective is necessary. However, would a paradigm shift not be expedited if the current religious paradigm is reformed as opposed to discarding it altogether? We can be enriched by the contributions of other traditions without accepting those traditions as a replacement of our own. Barbour shares a similar sentiment: “It seems to me more promising to use the insights we gain from the East to help us recover neglected strands of our own heritage” (Barbour, *Ethics* 74). By uncritically adopting Eastern religious traditions as a priori better than those from the West, we would also be accepting the problems and shortcomings of those traditions. For example, Barbour points out that Eastern traditions “have had less to say about social justice” than Western traditions (Barbour 74). The most feasible option through which to perpetuate a new paradigm is to reform the current paradigm with which those of the West are most familiar while accepting that we can learn and improve upon our own through dialogue with those from other traditions. Speaking pragmatically, if these ideas for a new paradigm cannot trickle down and inform those who do not make a living by thinking about these issues, this academic discourse will remain just that and will never reach the stage of practical implementation. The majority of the people will have to relate to these new issues if they are to be enacted in every day life, and as Barbour accurately recognizes, “most Westerners are not familiar with these religions” (Barbour, *Ethics* 74).

Concerning Native American traditions, we can most certainly be edified by aspects of their relationship with the natural world. According to Cobb, Native Americans’ “respect for the world and their effort to live in harmony with it could guide our responses to the ecological crisis” (Cobb 27). However, adopting a Native American world view, which, as both Barbour (*Nature* 130) and Cobb (28) claim, has been, at times, romanticized, would be catastrophic. In Cobb’s words,

If we were so foolish as to attempt a return to a primitive world the vast majority of us would have to die...With the bear and the buffalo, and the wild turkey and the beaver almost gone, and the fish in many rivers killed by pollution, the American land could not support even the pre-Columbian Indian population if we lived as they did—and that was a tiny population in comparison with our own. (Cobb 27)

Cobb’s point is clear. An effective Western ecological ethic is not going to come primarily from a non-Western tradition or from a romanticized view of our past. Consequently, it is necessary to heed White’s latter suggestion to reinterpret one of our existent traditions.

While Whitehead is listed as a member of that “minority tradition” in the West, which is seen as potentially contributing to a new Western paradigm, these Deep Ecologists clearly have disdain for those, Cobb is mentioned specifically, who seek to put forth an ecologically sound Christian theology based on Whiteheadian metaphysics. In an appendix to *Deep Ecology* co-authored by Devall and Sessions, the latter states the following:

But many of these theorists, who also happen to be Christian theists, when applying Whiteheadian process metaphysics to the problems of environmental ethics, argue that, in their estimation, humans have the greatest degree and highest quality of sentience...hence humans have the highest value and the most rights in Nature. (Devall and Sessions 236)

This criticism is, in some sense, justified in that some Christian process theists seem to grant credence to this criticism in their affirmation of the importance of Christian tradition. For instance, Barbour, at one point, speaks of “the life and death of Christ” as the “supreme examples of the power of God’s love and participation in the life of the world” (Barbour, *Nature*

34-35). This statement seems to imply some sort of unilateral intervention on the part of God and is most certainly not an ecologically credible theological statement. The life and death of Jesus can most certainly be seen as examples of the actualization of God's loving aims; however, words such as "supreme" attribute an intention to God that is not there for most Christian process theists.

However, in defense of Barbour and other process theologians cited here, I think that Sessions has overemphasized the justification for these claims. If taken in the context of the broad scope of the works of those such as Barbour and Cobb, these criticisms are unfounded. In my opinion, philosophers such as Sessions and Devall have fallen into a misunderstanding based on the preconceived notion that all Christian theology is inherently anthropocentric. In fact, there is an alternative distinction, a distinction that Sessions seems to have overlooked in his indictment of Christian process theologians, to be made between what Barbour calls the "biocentric ethics" (Barbour, *Ethics* 63) of those such as Sessions and Devall and anthropocentrism.

According to Barbour, "a biocentric ethics...says that we should choose whatever actions further the welfare of the ecosystem as a whole, regardless of the interests of individuals" (Barbour, *Nature* 131). On the other hand, process thought insists that "we need a principle of discrimination when the welfare of different forms of life conflict" (Barbour, *Ethics* 70). In other words, the ecosystem as a whole cannot be seen as the center of value against the individual members, which make up the ecosystem. This would be a devaluation of the life of individuals. It would also not take into account the fact that individuals enjoy different levels of experience. For example, Barbour states that "there is a great difference between the richness of experience of a person and that of a mosquito, so they are not of equal intrinsic value" (Barbour,

*Religion* 291). According to Barbour, process thought overcomes this problem by simultaneously leading us “to work for the welfare of all forms of life” while suggesting “priorities when the needs of human and nonhuman life conflict” (Barbour, *Nature* 131). As a result, humanity retains value within an ecological worldview while avoiding anthropocentrism.

For those who would claim that this distinction does not exempt process theism from a criticism of anthropocentrism, a simple example will suffice. My tenth grade driver’s education instructor provided the following scenario for our class. The hypothetical “you” is travelling in one lane, while ahead there is a car in the left lane as well as a large eighteen wheel truck passing in the lane in which you are currently traveling. The driver of the truck does not have time to merge back into his own lane before he collides with your car. However, you do have time to make a decision, either right or left, to exit the roadway and safely avoid the collision. On the right hand side, there is a young mother pushing her baby in a stroller, on the left is a deer peacefully eating grass on the side of the road. My instructor paused for effect before concluding, “The deer dies!” Of course, no one wants to advocate the senseless killing of animal life; however, we are deluding ourselves if we think that, in our actual environment, decisions like this will not be necessary, and when faced with them, we will inevitably, at least hopefully, opt for humanity over nonhuman life. Any claim to the contrary falls into the category of that type of academic philosophy that, as Hume realized, must forever remain in the philosopher’s study due to the fact that one inevitably must act otherwise when faced with the environment in which one lives.

Some qualification is necessary concerning the criteria for what constitutes the aforementioned conflict. Here, I have referred to it as a situation in which a decision must be made concerning whether human or nonhuman life will be preserved. I do not have the adequate

space here to completely develop this; however, it will suffice to say that human comfort, “progress,” or “development” does not constitute a conflict that would justify the deliberate destruction of the individual occasions of experience, which make up the ecosystem. Process theists do realize that it is best to opt on the side of the ecosystem since neglect of the integrity of entities of the ecosystem will also lead to the loss of individual lives. However there are situations in which the intrinsic value of individual lives (and this could include nonhuman life as well) takes precedence over the intrinsic value of the naturally occurring functions of the ecosystem as a whole. In Barbour’s words, “ecological integrity is a precondition of life and therefore of other values, but it cannot serve as a definition of all value” (Barbour, *Ethics* 63).

It is important to note that process theologians are not simply trying to bend, so to speak, Christianity in order to make it compatible with modern science. On the contrary, Process theism is the logical result of process metaphysics, which is judged on the criteria of reason and experience and informed by all branches of human inquiry. Some will be reticent to accept this view of God since it is such an aberration, in places, from the omnipotent, omniscient, personal, and loving conception of God. However, as Barbour asserts, process theologians hold “that limitations of divine knowledge and power arise from metaphysical necessity” (Barbour, *Nature* 112). God is limited in that God can only provide, through persuasion, that initial aim, which individual occasions of experience must either accept or reject. These momentary experiential events are held by all forms of life including the cells of our body (Cobb 65). Essentially, as Griffin writes, a mechanistic-materialistic view of the natural world in which “the ultimate units of the world, being enduring events of matter, could exert only efficient causation—that is, causation on other things” is ruled out in favor of Whiteheadian actual occasions. In these occasions, each “event arises from the totality of causal influences on it from the past” but

subsequently “completes itself by deciding exactly how to respond to those influences in light of its own aims” which are derived from the persuasive powers of God (Griffin 84). In essence, the world is less like a machine than an organism and entities in our world are forever in the process of becoming, influenced by their past, the current environment in which they exist, and the guidance of the “order” and “novelty” of God, which “are but the instruments of his subjective aim” (Whitehead 88) for each “actual occasion” or “entity,” which are, for Whitehead, “the final real things of which the world is made up,” momentary “drops of experience, complex and interdependent” (Whitehead 18).

As a result, the process God can still be seen as purposeful, personal and loving. God is personal in the sense that, according to Birch and Cobb, “Life [referred to here again as synonymous with God] provides a specific purpose for each entity in each moment.” Accordingly, God is loving in that the “gift of Life to each living thing is tailored to its particular needs and possibilities” (Birch and Cobb 198). However, this is not synonymous with the personal and loving attributes of God which usually come to mind for those of us who have been acculturated within a Judeo-Christian worldview. While God is purposeful, “Life does not aim specifically at the creation of human beings. It has no one goal for the course of evolution on our planet” (Birch and Cobb 197). In other words, God does not favor humanity over the rest of the created order, but instead “favours all living things, and precisely for that reason does not take sides in our inevitably competitive existence” (Birch and Cobb 198).

Although it will necessarily differ from the God of classical theism, this neo-classical conception of God will be more compatible with our contemporary experience, which stands at the second pole of Christian theology. Consequently, we must allow our current context to shape our conception of God accepting that what has come before may have to be reinterpreted in light

of new evidence. Birch and Cobb claim that “To trust in Life is to allow the challenging and threatening elements in our world to share in constituting our experience.” We must accept that this trust cannot mean “that one trusts Life to support one’s present projects and guarantee one’s success!” (Birch and Cobb 182). Our conception of God will necessarily have to change but the view, which will emerge, will be more compatible with our lived experience and will be, in addition, ecological in scope. Our future will not be certain but we will be able to contribute to shaping what this future will be in that, according to process theism, all of the created order has a creative role in the divine drama. We have the freedom to choose how we react to the aims presented to us by God, and, ultimately, this reaction will be an integral contribution, whether positive or negative, to the condition of the world in which we live.

Of course, there will inevitably be those who will reject the view that religion, and particularly theistic religion, can contribute to the abatement of our current ecological crisis. Since my purpose is not to provide a complete explication of the justification for the process God, I will not deal explicitly with these people here, although they must be taken seriously. Let me just offer this. The views expressed here are based on exhaustive scholarship, which has led process theists to believe that the existence of a self-existent and Necessary Being is the most plausible explanation for what we can garner from our reason and experience. It is necessary to state that the God of process is not an a priori God. In fact, Whitehead did not go looking for God. In his article, “Process Theism,” Donald Viney notes that in his rejection of scientific materialism, Whitehead was surprised to find that his conclusions led him to the belief “that philosophy’s categories require reference to God” (Viney 19). In brief, for process theists, God is the most logical explanation for, to reiterate Dr. Power’s statement, “the source, center and final end” of the reality, which we are able to perceive.

At this point, it is necessary to offer some analysis, albeit brief, of the implications of process thought concerning divine revelation. In short, process metaphysics, as has been shown, affirms the ever present divine activity in the world while rejecting unilateral supernatural acts in favor of a worldview, which is more ecologically credible. Ogden distinguishes between two types of revelation. He refers to what he calls “original revelation” as the “original event that is constitutive not only of Christian existence but also of human existence in general or as such” (Ogden, *On Theology* 25). In other words, it is God’s constant presence and ubiquitous action in the world, which is available to all creatures at all times and places. In addition, “special revelation” consists of original revelation being “re-presented to us through explicit concepts and symbols,” which are a product of our interpretation of that original, universal revelation (Ogden 40). That supernatural theism, which has been passed down through theistic tradition, is one such *interpretation* of original revelation and, as such, should be considered special revelation. However, it should by no means be taken to be synonymous with historical fact in our modern sense of these words. Consequently, theological phenomena such as the virgin birth, the resurrection of the body, or the literal word of God dictated through messengers from the divine have theological significance but no significance whatsoever in terms of their relation to historical fact or biological miracle.

In fact, many process theists see the problem of supernaturalism as one of the greatest problems facing the pursuit of knowledge concerning the nature of God. Ogden claims “that the major obstacle to real progress in dealing with the problem of God is the supernaturalistic theism of the metaphysical tradition” (Ogden, *The Reality* 19). Cobb offers a similar sentiment with the following comment: “It is my hope that we can rescue the word *God* from the oppressive and repressive and unreal connotations it has come to have for so many people. Perhaps we can give

it new meaning, at once more Christian and more universal, at once more personal and more natural” (Cobb 76). The God of classical theism is not dead but necessarily understood in a different way in order to meet our present experience at the second pole of Christian theology.

In the final analysis, for the greatest possible environmental ethic, which is an ecological ethic, in relation to religion, and specifically, Christian theology, to be realized, claims of supernaturalism must be relinquished. In addition, the distinction between revealed, when understood as supernatural, and natural theology must also be eliminated in favor of what can most appropriately be referred to as an ecological theology, based in scientific metaphysics. Therefore, following the lead of those who have been cited here, we must put our faith in the reality, which we perceive as being derived from and existing within God in this world and not create, as our ultimate goal, that which lies outside of this world and beyond the boundaries of our reason and experience. According to Birch and Cobb, “The human calling is to respond to Life here and now so that life on this planet may be liberated from the forces of death that now threaten it” (Birch and Cobb 202). This call will be committed to the possibility that our current conceptions of the source for the meaning and significance of life may need correction. However, this is the most plausible explanation, based on a thorough subjection of all available evidence to the criteria of reason and experience, and those of us who adhere to these criteria will appeal to no other authority in order to affirm theological credibility, whether it be mystery, tradition, paper, or papal. Inevitably, more traditional theologians will find this view too liberal and many philosophers, who are still heavily influenced by the positivist legacies of Hume and Kant, will find it too conservative, if not a waste of time. Therefore, we, who seek to overcome the polarizing distinctions that unfortunately still exist between religion and science while still

daring to speak of God, will have to walk that difficult via media between two extremes.

However, it is usually the case that the truth lies somewhere in the gray area.

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