### **ELIJAH PREWITT-DAVIS**

Mount St. Joseph University

# THE SOLAR NUN: THE PROPHETIC ACTION AND THOUGHT OF SR. PAULA GONZALEZ, S.C.

Gimmick ecology will save no one. For Christians, as for all peoples, healing the earth must be tied to a deep spiritual awakening. Changes in practice will endure only if tied to changes in thinking. - Sr. Paula Gonzalez, S.C.

Mount St. Joseph University is located on the West Side of Cincinnati in a small Catholic and working class neighborhood known as Delhi. The residents are outspoken and have a propensity for yard signage: "An unborn life is a life" "Read the Bible, come to Jesus" "Back the Blue" "Hate does not live here" "Sustainability is community" "Protect the Ohio River Watershed," and my favorite, "FU Biden", which after hearing about Biden's approval of the Mountain Valley Pipeline, I had a strong propensity to agree with. I often think that this signage offers a nice little snapshot of the wide array of Catholic views. When I first came to Mount St. Joe, learning about this neighborhood became an education unto itself. I was teaching a class on religion and environmental justice, and as part of this class and through my own interests, I was connecting with the people of the neighborhood and colleagues who were committed to environmental justice and trying to understand what it looked like in this place. One refrain always resounded: Did you know Sr. Paula? Talking to a colleague in the sciences: Did you know Sr. Paula? At an organizing meeting on the Rights of Nature: Did you know Sr. Paula? At a permaculture nursery: Did you know Sr. Paula?" This question was asked by nearly every person I talked to about environmental justice in and around Mount St. Joseph University. I had better get to know her I decided, if only to have something to talk about.

As it turns out, I found a lot to talk about. Known as the "Solar Nun" due to her constant reminders that "all energy comes from the sun" as well as the solar panel powered golf cart she

designed and drove around campus, Sr. Paula Gonzalaz, S.C. is often described as "a force of nature" and "ahead of her time." 1 Sr. Paula spent over forty-five years advocating, organizing, designing and speaking about renewable energy, and living a life committed to healing the earth and creating a sustainable future. Her accomplishments are many, including being an active participant in the United Nations Earth Summit in 1992 held in Rio de Janeiro, being a founding member of the multi-religious renewable energy advocacy group Ohio Interfaith Power and Light as well as many of its offshoot programs, and an active member of the Committee of Concerned Scientists. She gave over 1800 speeches and presentations on eco-spirituality and sustainable living, ran retreats, and in perhaps my favorite anecdote, lobbied the Vatican to allow the Sisters of Charity to practice green burials, of which upon her death in 2016, she was the first. In 1982, she began having yard sales to raise money and gather supplies for converting a 1500 square foot chicken coop on the Sisters of Charity motherhouse grounds into a superinsulated passive solar home that came to be known as La Casa del Sol, where she lived for the next twenty years. Out of this, she began designing and promoting DIY renewable energy projects, and gave workshops to teach others to do the same. Ten years later, she began raising funds and gathering supplies to build a new structure and organization known as EarthConnection. Still active and standing today, EarthConnection's mission states: "Aware of the interconnectedness of all of Creation, we seek to integrate spirituality and sustainability through programs in sustainable agriculture, alternative energies, ecojustice, and ecospirituality."2

#### Earth Home

The watershed moment in her life came in 1969 when the famous photo now known as *Earthrise* was published in Life Magazine. Taken by astronaut Bill Anders of the Apollo 8 mission, the photo shows Earth rising over the dark side of the moon, only one third visible, and suspended within the darkness of the infinite universe. Lacking the fabricated national boundaries of most globes, *Earthrise* revealed to many the planet Earth, as it was — the one and only fragile home of humanity in the vast darkness of limitless space. For Sr. Paula, this created both within her and many others, a deep sense of *planetary* and *global* belonging, and pushed her to bring others to understand themselves "as global

<sup>&</sup>lt;sup>1</sup> These statements have been repeated by various Sisters of Charity that I have conversed with on my walks on the Motherhouse grounds.

<sup>&</sup>lt;sup>2</sup> *About Earthconnection*. EarthConnection. (n.d.). https://www.scearthconnection.org/about-ec/

or planetary citizens on a small planet in the midst of an immense cosmos."3

Sr. Paula experienced and understood these photos as both a scientist and a committed woman religious, tellingly calling the photos "revelation according to NASA." 4 She held a Ph.D. in cellular physiology and taught biology at Mount St. Joseph from 1965-1980, moving on from her teaching career only to pursue full time ecological ministry and activism. Sr. Paula gawked at the distinctions often made between religion and science. The Earthrise image had both scientific and spiritual significance, she held, and the insights provided by science ought to have a profound effect on any religious practice that we earthlings might engage in. As she wrote, "A spirit of genuine love and concern for our planetary home is being inspired by insights from both science and spirituality. We are invited to reinvasion the role of the human family in the story of the universe, in order that we may ensure the continuation of humanity as part of creation's long story. Yet all is not well." 5 Industrialism and rampant consumerism have ravished the planets resources and put its fragile eco-systems and the stable temperature that allowed humans to evolve in extreme danger. *Earthrise* highlighted the fragility of our one and only home and removed the borders and boundaries that often mark our cultural notions of family and nation. For Sr. Paula, this photo of our fragile planet personified what the scientific world was starting to discover about the intricate and complex ways that the Earth's ecosystems functioned. As Sr. Paula was working within the Catholic intellectual tradition of Natural theology, a new understanding of Creation likewise necessitated a new way of "imaging the divine."

Her love for the earth was the love of a home place. The words spoken at her green interment capture the beauty of this love and the theology that came to animate it: "Into the beauty of mother earth, we release you. Into the freedom of wind and sunshine, into the dance of the stars and planets. We release you into the next part of our spiritual journey as you walk hand in hand with

<sup>&</sup>lt;sup>3</sup> Sr. Paula Gonzalez, "An Eco-Prophetic Parish?" in *Embracing the Earth: Catholic Approaches to Ecology* (Maryknoll NY: Orbis Books, 1995), 214 Sr. Mary Bookser Barkley, Sr. CJ and Elizabeth Barkley also recounted the effect that this story had on Sr. Paula.

<sup>&</sup>lt;sup>4</sup> Sr. Paula Gonzalaz, "Reading the Signs of the Times" 1987 Seton Lectures. Vancouver, B.C. 47.37. MSVU Library and Archives. https://www.youtube.com/watch?v=h9RvQR-zyVI&t=10s

<sup>&</sup>lt;sup>5</sup> Family here connotes not only the cultural notion of kin and relation, but likewise the wider relation of the human family hominid. Gonzalaz, "An Eco Prophetic Parish?" 214.

your creator God. We release you to go safely, go dancing, go joyfully home."

#### Earth Praxis

What impresses me most about Sr. Paula is the ways in which her planetary thinking was always understood and practiced localy. In late August of 1982, Sr. Paula brought together volunteers for the first planning meeting of what came to be known as La Casa del Sol, The House of the Sun. Her aim was to convert a 1500 square foot chicken coop into a super insulated, passive solar powered home that she and Sr. Mary Bookser, S.C. could live in cheaply, efficiently, and sustainably. Over the course of 3 years, her team of 35 volunteers held yard sales, collected recycled materials, and worked on the structure that she had designed. When Sr. Paula entered La Casa Del Sol in a low-cost home building contest by Mother Earth News, they thought it unfair to allow her to compete because all of the material had been recycled. They ran a feature article on the house instead. As Sr. Paula explained to them: "The 1,500 square foot, super-insulated, passive-solar house that Sister Mary Bookser and I now live in cost less than \$10 per square foot to build. What's more, our allelectric residence used less than 500 kwh of power (and a few constructions scraps in the wood stove in February of this year."6 This is all the more impressive given the grey and cloudy winters that make up the majority of Ohio's winter days. La Casa del Sol's design was tested by a cloudy negative twenty-degree day in March 1985. Without supplemental heat, the house stayed at fifty degrees. Speaking about her interest in designing and building efficient structures and renewable energy, Sr. Paula said: "What might happen if instead of fighting (all the way up to Nuclear War) to extend 'the good ol' days of the petroleum era, we began to tap our endless creativity and imagination to design the 'better new days'?"7 She was after a new way to live, and while it was one thing to speak and teach about it, she knew, also that she had to enact it.

For Sr. Paula, La Casa del Sol was an experiment with a new way to live in line with Earth and with God, which for her was already a loose distinction. "The endless creativity and imagination" that gave birth to La Casa del Sol with the hope of imagining a new world and a new way to live was an expression of God's creative processes. Humans were part of the natural

<sup>6 &</sup>quot;La Casa del Sol: A Passive Solar House," Mother Earth News Editors, May 1, 1986 Accessed, 2/26/24 https://www.motherearthnews.com/sustainable-living/greenhomes/passive-solar-house-zmaz86mjzgoe/

<sup>&</sup>lt;sup>7</sup> "La Casa del Sol – A Passive Solar House," *Mother Earth News*, May 1, 1986, https://www.motherearthnews.com/sustainable-living/green-homes/passive-solar-house-zmaz86mjzgoe/.

world, and God intended for humans to live within it, not Lord over it as the petroleum era, and much of Christian history and theology, had assumed.

## **Empirical Myths**

In his landmark essay, "The Historical Roots of the Ecological Crises" the historian Lynn White chronicled the development of Western ideas about humanities relationship with the Earth. The genius of White's analysis came not from his criticisms of Christianity, but from the way he showed how industrial science and technology were indebted to Christian theology and had itself continued the assertion of humanities dominion over the Earth. By the late 13th century, theologians had begun studying the natural world as a means of decoding the mind of God. The thinking went something like this: the mind of God remains a mystery to humanity. But God created the world, so if we study the creation, we can come to know something about the creator, that is, the Truth, capital T. Industrial science thus repeats the theological assertion of humanities supremacy over Creation, viewing the material world as lifeless matter for our own use with no regard for its living systems, while at the same time providing humanity with the industrial technology to deform Creation into capital and further human domination and control.

As a Scientist and Woman Religious, Sr. Paula was working against both of these grains. Sr. Paula's thinking and activism was inseparable from her scientific understanding of the material realities of the Earth. As she wrote: "In nature, everything is connected to everything else. Thus, interdependence is the rule. Ecologically speaking, community is the fundamental pattern of all ecosystems — deserts, mountains, oceans, forests, rivers." Drawing on the work of the Geo-Theologian Thomas Berry and inspired by (and indeed a part of) eco-feminist liberation theology, Sr. Paula sifted through the Catholic intellectual tradition for insights that could connect human beings to what she felt was an undeniable empirical fact of the natural world — the rule of interdependence.

She wrote articles and encouraged her students to "Celebrate Darwin" for helping humans see "the marvelous creativity of God" and showing human beings their proper place in creation. Why this may be old hat to many reading this, I would like to remind you that she was saying this as early as the 1980s. And while she wrote the articles in 2009 in honor of Darwin's 200th

<sup>&</sup>lt;sup>8</sup> Gonzalez, "An Eco Prophetic Parish?" 215.

<sup>&</sup>lt;sup>9</sup> Sr. Paula Gonzalez, "I'd Like to Say: We Should Celebrate Darwin" *St. Anthony Messenger* Nov. 2009. Pgs. 25-28 see also Sr. Paula Gonzalez, "Evolution and the Catholic Church" *Catholic Update*, March 2012.

birthday, I cannot help but think that perhaps the greater impetus for her vocal celebration of Darwin at this time was in fact the opening of the Creation Museum in 2007. The creation Museum is located about an hour south of Mount St. Joseph University in Petersburg, Kentucky and still draws large crowds. Many of my students are still shocked, and often angered, by her celebration of Darwin and her theological fusing of the biological sciences and Catholicism. In this way, Sr. Paula has become a staple in my introductory classes and still gets students talking and thinking.

In nearly all of her writings, Sr. Paula reiterates the evolutionary understanding of the origins of life on Earth with mythological tenacity. "Nearly four billion years ago" her empirically sound myth begins "the first living cells evolved 'simple' unicellular creatures (similar to today's bacteria) which were able to nourish themselves from the rich variety of chemicals characteristic of the Earth's early turbulence." Mutations and temperature changes on this turbulent earth lead to the first "ecological communities and the growing web of interrelationships." Fast forward to around 700 million years ago, and multicellular organisms appeared for about 100 million years, but then 80-90 percent of them went extinct during a severe ice age. After 1-3 pages of precise empirical detail, Sr. Paula finally gets to humans: "Only in the last 2.1 million years has the genus Homo been present. Modern homo sapiens 40,000 years!" For Sr. Paula, this massively complex empirical myth has profound theological implications. First, it shows us that human beings "are not just connected to 'nature.' We are an integral part of it—formed from the very air, water, and soil of our finite planet and energized by the sun."10 Secondly, what this reveals is that creation was not a onetime event that happened in some distant past, but a process that continues to this very day. As she wrote, "No longer is the universe seen as finished, with the sun, stars, and planets in unchanging orbits, but as an expanding process of which we are part. Scientifically, it has become quite clear that God has chosen an evolutionary mode of expressing divine mystery."11

Yet, with the advent of industrial technologies, humans have developed the ability to manipulate and control many of the Earth's processes "plundering the soil, air, and water in a devastating manner." So not only is the old hierarchical model

<sup>&</sup>lt;sup>10</sup> Paula Gonzalez, "Developing an Ethic for Sustainable Community: An Action Oriented Response" in *Earth at Risk: An Environmental Dialogue Between Religion and Science* Donald B. Conroy & Rodney L. Peterson, ed. Amherst, NY: Humanity Books, 2000. Pgs. 267-269.

<sup>11</sup> Our Father

<sup>&</sup>lt;sup>12</sup> Paula Gonzalez, "Developing an Ethic for Sustainable Community" 269.

not scientifically or theologically sound, the devastation that it has led to amounts to a sin against the continual processes of God's creation. And it is here that Sr. Paula becomes the nun with the ruler, ready and willing to wack our knuckles over what we are doing to the Earth, for the domination of nature is an "ecological sin" a complete disruption of the creative process of God. Like a prophet, Sr. Paula has no interest in mincing words. Our dominating attitude toward nature coupled with unrepentant consumption practices has created "an evolutionary moment perhaps as crucial as those which saw the emergence of early life, of photosynthesis, of heterotrophy and of sexual reproduction—the major milestones of life on Earth!" 13

# Changing the Model

As the anthropologist of religion Sarah McFarland Taylor has shown in her book *Green Sisters: A Spiritual Ecology*, the opportunities opened by Vatican 2 created a wellspring of Catholic Sisters all over North America who turned their attention to the Earth and it's healing. Along with this came the proliferation of Eco-Feminist Liberation theologies. Theology, these woman argued, had too often concerned itself with orthodoxy or "right belief" in a usually powerful male God. Aiming to correct this, Eco-Feminist Liberation theology concerned itself with "Ortho-Praxis" or "right practices," calling on humans to enact the creative work of God as witnessed in Creation. An early proponent of the Gaia Hypothesis, Sr. Paula sought to "change the model" from a triangular hierarchic and anthropocentric view of creation as a singular past event, to a circular view of "creation as a process" that honors the natural cycle of death and re-birth and the equal interdependence of all creatures.<sup>14</sup> The only way to avert catastrophe is to listen to the Earth and listen deeply to the lessons it has to teach us. And what the Earth teaches is that the hierarchical model only leads to devastation because it denies the human place within the natural world and fails to acknowledge its deep interdependency. All liberation movements in human history have sought to change the dominant model of business as usual, she held, just as liberation theology listened the community of the oppressed to provide the model for liberation, it was Creation itself that provided the model for ecological liberation. To model our lives off the Earth means to change the model to the pattern that is most commonly repeated in nature: the circle. "In the living world" She wrote "one pattern is repeated again and again, and its shape is roundness. Cycling is the key to life in the divine

<sup>13</sup> Ibid.

<sup>14</sup> Paula Gonzalez, "An Eco Prophetic Parish?" 218

design, so the circle is a very successful model that we might strive to use in designing new human institutions." <sup>15</sup>

Both in her ecological activism and in the theology that animated it, Sr. Paula is best understood as acting squarely within the Eco Liberationist tradition. What distinguishes her within this tradition is her expert level understanding of biological processes that came with her scientific mind. In terms of the Gaia hypothesis, for instance, she approached it with both enthusiasm and hope for its possibility to offer us a new model and understanding of the Earth, but did also caution, "Even the manner in which I describe this hypothesis is currently a matter of debate within the scientific community." <sup>16</sup> This caution likewise included a footnote to a scientific journal on the Gaia hypothesis.

Her mixture of the enthusiasm and hope of the faithful and the discerning exactitude of her scientific mind pushes me to imagine Sr. Paula as a sort of Natural Liberation Theologian and activist. As mentioned earlier, the tradition of Natural Theology held that God could be known and understood via its Creation. One comes to know the mind of the architect by studying the buildings they created. Staying true to the method of this deep Catholic Intellectual Tradition but now influenced by Liberation Theology, Sr. Paula uses her knowledge of the natural world as a means of coming to know God's intention for our life – a life that for her springs forth from the Earth and is part of it, dependent on it, and in relation with it. What intrigues me about Sr. Paula is the way in which her method itself seeks to subvert and change the model of theological inquiry: the Catholic tradition does not dictate the human place or practices toward the natural world; it is the natural world that dictates the human place and Christian practice. There are resources in the tradition, to be sure, but it is not the tradition that is going to change the Earth. It is the Earth that is going to change the tradition. For it is through Creation that "the Eternal Artist speaks, sings, dances, energizes our times – and thus makes everything sacred. The very process of cosmic life is an embodiment of God's word."17

# Learning from the Earth

In thinking through the theme of this special issue with Sr. Paula, I have come to two conclusions as to how Sr. Paula might answer the questions posed about environmental justice. "In what

<sup>15</sup> Ibid, 219.

<sup>&</sup>lt;sup>16</sup> Paula Gonzalez, "Learning from the Earth: The Key to Sustainable Development" in *Ecology and Religion: Scientists Speak* John E. Carol and Keith Warner OFM eds.. (Quincy, IL Fransiscan Press 1998), 242.

<sup>&</sup>lt;sup>17</sup> Paula Gonzalez, "An Eco Prophetic Parish?", 216.

specific ways do these traditions both inform and compel specific policies as well as ethical practices that constitute the spectrum of social action that counts as "environmental justice"."

First, Sr. Paula would say, we have to participate in the act of creation while at the same time limiting our role in its destruction. We have to think imaginatively and creatively about new sources of energy, and we have to enact those in our own lives even as we seek change on a broader scale. We also have to be mindful of our own role in the crises. Facing down such a huge problem as environmental justice cannot be an excuse for disregarding what the individual can do. For Sr. Paula, environmental justice entailed an active participation in the Earth's creative processes through creative thinking and an active attempt to live in step with these processes as possible. The example she set in and around her community in this regard is immeasurable. This influence still folds out of Earth Connection even today. Last year, Earth Connection grew 800 pounds of vegetables in their community garden that were then shared with the community. This is a direct continuation of Sr. Paula's commitment to Creation and to the poor. Because of the cost of eating organically it is out of reach for many poor people, Sr. Paula saw a need to grow your own. Otherwise, "eating organically is rather luxurious."18

Secondly, and here I think is the key point, the very assumption that human traditions can answer the question of environmental justice might itself need to be tempered. Humans are late comers to creation, and it is from creation that her tradition tells her to look for answers. If we are going to do the environment justice, the environment itself can provide the model. Asking the question of this conference in her own way, Sr. Paula asks: "Where might we learn a new model that would ensure true freedom for all members of the earth community?" She follows in the spirit of the Natural Theology of Aquinas precisely by challenging the letter, and answers: "By turning to nature and seeing ourselves as part of it. Here we find a deeper understanding of what the divine architect is calling us to become." The key to environmental justice will be learned from the Earth.

<sup>&</sup>lt;sup>18</sup> As paraphrased and quoted in Sarah McFarland Taylor, *Green Sisters: A Spiritual Ecology*, Cambridge MA: Harvard University Press, 2007. 170.

<sup>19</sup> Paula Gonzalez, "An Eco Prophetic Parish?" 218.