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A Dramatistic Analysis of Nevada's Controversy over Solar Net Metering Incentive Policies

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A DRAMATISTIC ANALYSIS OF NEVADA'S CONTROVERSY OVER SOLAR NET
METERING INCENTIVE POLICIES

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A thesis submitted in partial fulfillment
of the requirements for the

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Abstract

Utilizing a dramatistic rhetorical lens (Burke, 1945), this project examines Nevada's 2015-2017 public controversy to decide whether or not to implement solar net metering incentives. By examining communication surrounding The Public Utility Commission of Nevada (PUCN), NV Energy, and SolarCity, this thesis analyzes the underlying social orientations contained within the controversy's discourse. This thesis examines how the environment was left out of solar energy discourse in favor of economic reasoning. Nevada's solar controversy is an important component of humanity's unending conversation about our relationship to the environment and an important case study to develop our understanding of public controversy.

Keywords: net metering, dramatism, environmental communication, public controversy

Chapter One:

The Battle for Renewable Energy in the Saudi Arabia of Solar

Nevada is considered one of the sunniest states in the nation. With a large urban population in the Las Vegas desert, it is only natural that its residents and energy companies turn to solar renewable energy to reduce human society's reliance on fossil fuels. Not only has the cost of producing solar panels decreased 78% from 2009-2014 (Harris, 2015), but Nevada has also historically offered rebates and incentives to encourage the installation of this technology (Leslie, 2016). Nicknamed by former president Bill Clinton as "The Saudi Arabia of Solar" (Goldenberg, 2016, para. 3), implementing solar energy in Nevada appears both logical and beneficial.

However, in December 2015 the push for solar abruptly halted when the Public Utilities Commission of Nevada (PUCN) enacted a plan that would reduce incentive payments to customers by 76% over the subsequent 4 years (Whaley, 2015). This new plan undercut previously promised incentives and placed Nevada's confidence in solar energy at risk. The PUCN's plan was described by the *New York Times* as a "bait-and-switch" (Leslie, 2016; para. 3). As a result of the decreased incentives, major solar retailers such as SolarCity and SunRun ceased operations in the state (Whaley, 2016a). Renewable energy took a major hit.

In response to the PUCN's changes, the solar energy company SolarCity took action. It organized solar stakeholders and interested parties to form a coalition with the goal of restoring Nevadan's faith in solar energy. Described as an "alliance of business, non-profits, and concerned citizens," the Bring Back Solar Alliance (BBSA) formed and launched its Bring Back Solar Campaign in January 2016.¹ Throughout 2016, BBSA and its members communicated

¹ In Facebook (<https://www.facebook.com/bringbacksolar/>) and twitter (<https://twitter.com/bringbacksolar>)

Nevada's need to reinstate government incentives. However, they did not speak without opposition. Nevada stood witness to a discursive battle between the BBSA and a counter-campaign, Citizens for Solar and Energy Fairness (CSEF).

Backed by the electricity monopoly NV Energy, CSEF argued that incentives caused low-income families and non-solar users to pay more for their energy needs (Rothberg, 2016). In addition to the already-ongoing reduction to incentives, the counter-campaign sought to put up roadblocks to stop BBSA's attempts to mobilize Nevada to reinstate incentives. As CSEF launched a public opinion crusade in the form of television advertisements and a social media presence (Rothberg, 2016), the BBSA responded in kind (Bring Back Solar Alliance, 2016a). In the next year and six months that followed, both campaigns sought to influence public opinion and political action.

Ultimately, BBSA achieved its goals. By September 2016 existing solar customers had their incentive rates reinstated (Hidalgo, 2016). In 2017 Nevada's Governor, Brian Sandoval, legislated that incentives would return for new solar customers as well (Groom, 2017). Out of the turmoil of competing narratives about Nevada's energy future, renewable solar energy emerged as a viable technology.

Nevada's solar controversy may have been a local issue, but it can also be seen as part of the larger, global discussion of energy options and climate change mitigation. The environmental actions society deems appropriate rise out of the discourse between the public and their institutions. In particular, the discourse people use to describe energy contributes to how society frames the environment (Lakoff, 2010). This influences society's attitudes and the political actions it takes for the planet. For Nevada, the ways in which solar energy was framed between

the competing interests of BBSC and CSEF had material implications: the abolishment and then reinstatement of policies meant to combat human reliance on fossil fuels.

Climate Change and Sustainability

Environmental conversations are of paramount importance due to the overarching need for society to make urgent decisions regarding the Earth's future (Russill, 2008). The scientific community unequivocally finds the earth's climate is warming at rates that threaten human ways of life (Cook et al., 2013; Cook et al., 2016; IPCC, 2007; IPCC, 2013, IPCC 2014b). If warming continues, ecosystems will deteriorate, food systems will be disrupted, health problems will increase, and humanity will face unprecedented challenges to survive (IPCC, 2014a). Ultimately, the scientific community attributes this warming to human activity—specifically, global industrialization that began in the 1950's (IPCC, 2013). Taking seriously the looming threat of increased temperatures, we must consider how to mitigate the consequences of climate change while negotiating our own role in contributing to the problem.

Despite the urgency of climate change expressed by the scientific community, roadblocks exist. For example, President Donald Trump espouses the idea that climate change is a hoax, stating, “The concept of global warming was created by and for the Chinese in order to make U.S. manufacturing non-competitive” (Davenport, 2017, para. 3). His words precede his actions. Trump's August 15, 2017 executive order decreased federal standards for accounting for climate change and sea-level rise when building infrastructure, potentially making new infrastructure vulnerable to climatic changes (Friedman, 2017). Beyond politics, many solutions that promote cleaner energy sources (e.g., solar) challenge traditional and well-established fossil-fuel based energy systems at the base of an industrialized nation. Fossil-fuel interests have responded by re-labeling greenhouse gas emissions as beneficial commodities (Endres, Cozen, Barnett, O'Byrne,

& Peterson, 2016). They argue that carbon emissions should not be reduced; instead emissions should be treated as useful resources for the flourishing of society (Hoffman, 2002). Despite the consensus of the international scientific community (IPCC, 2013), the science behind climate change is often delegitimized, scandalized, or silenced by skeptics in religion (Bloomfield, 2017), politics (Lester, 2015), and the media (Jaspal, Nerlich, & Koteyko, 2012).

The prevalence of messages that seek to manufacture uncertainty about climate change has caused the United States to become divided on the issue. Non-scientific, politically biased, books that deny and challenge climate change science are regularly published in national bookstores across the country (Dunlap & Jacques, 2010). Religious and conservative groups continuously refer to climate science as a conspiracy created by the scientific and liberal elite (Bloomfield & Lake, 2013). Only 13% of Americans find climate change to be alarming, and 33% of Americans are disengaged, doubtful, or dismissive of it (Roser-Renouf et al., 2014). A majority of those who dismiss climate change advocate for hesitancy and caution in environmental policy-making (Roser-Renouf et al., 2014). In fostering cooperation to mitigate further climate change, messages that seek to divide opinion and prevent change can be formidable barriers.

Society faces the unenviable task of creating new ways to make the world inhabitable and sustainable in the face of these obstacles. One solution may lie in sustainability studies, an emerging field that aims to discover ways of advancing society that benefit both humanity and the environment (Lindenfield et al., 2012). To engage a sustainable orientation means using science to provide solutions to mitigate the adverse effects of climate change while still promoting advancements in technology and industry (van der Leeuw, Wick, Harlow, & Buizer, 2012). Scientists are responsible for translating their research from technical, professional

discourse to be understood by the general public. Corporations, governments, and citizens are then responsible for taking action in regards to that information. Under a sustainable orientation, the public would take scientific experts' conclusions seriously and implement new technologies and renewable energies to combat climate change. The potential for forward progress on environmental protection thus rests on collaboration by multiple public stakeholders (Autry & Kelly, 2012; Boyd, 2017; Brulle, 2010; Hoffman, 2002; Moser & Dilling, 2007; Walker, 2007).

I contend that by examining the ways in which society communicates about and for sustainability, we can better understand the consequences and implications of environmental discourse. How we cooperate is based upon our ability to overcome the multiplicity of competing messages about the environment (Paliewicz, 2016; Roper, Ganesh & Zorn, 2016). With this ideal in mind, I examine how knowledge is perceived, interpreted, and understood by Nevada as a means to illuminate how the public at large may accept or reject sustainable renewable energy implementation. We can use Nevada and the competing arguments about solar energy as an example of how climate change and sustainability is addressed and impacted by our communication practices and rhetoric—showing how language is symbolic, meaningful, and materially influential.

Communicating the Environment and Renewable Energy

Our environmental communication practices can be understood by viewing society through the lens of the public sphere. The public sphere is defined as the arena in which human social life has the capacity to form public opinions that affect society (Habermas, Lennox & Lennox, 1964). The public sphere represents a conception of open, public space where people exchange discourse about matters that prompt our attention. As individual members of the public consume information and communicate about social issues, society as a whole develops mindsets

regarding them (Cox & Pezzullo, 2016; Park, 2013). While particular mindsets and identities (e.g. pro-environment) do not determine action (Lester, 2016), the ways in which people communicate about issues are material because they serve as important drivers for political discussion and policy implementation (Boyd, 2017; Bruelle, 2010).

Language is the symbolic vehicle that drives action. Kenneth Burke (1966) has described humankind as “the symbol-using animal” (p. 3). In our efforts to make sense of the world around us, we developed languages to symbolize it—a verbalized representation of the nonverbal. But, as much as we make symbols, we also challenge them. As scientists use language to communicate a reality of anthropogenic climate change, others can use different terminologies as “a deflection of [that given] reality” (Burke, 1966, p. 45). While we can observe a world that is suffering from climate change, it is through the use of language and communication that it is socially represented. Social reality is shaped, negotiated, contested, and understood through communication, which subsequently affects the decisions society makes.

These decisions are also influenced by the resources and information that the public receives from the private and technical spheres (Goodnight, 2012). The technical sphere contains fields such as law, medicine, and science that have their own rules of discourse and standards for knowledge (Goodnight, 2012). These rules and standards create efficient ways of communicating within each sphere (Goodnight, 1987). When communicating with other technical experts, members use specific reasoning (e.g., the scientific method) and language (e.g., field-specific jargon) common to their expertise. Thus, when technical matters such as sustainability become of public concern, technical spheres must translate their forms of reasoning and jargon to be understood by public audiences (Olson & Goodnight, 1994).

Within the public sphere, messages and conversations that circulate are influenced by the rhetorical situation that calls them into being. Bitzer (1992) defines the rhetorical situation as “a context of persons, events, objects, relations, and an exigence which strongly invites utterance” (p. 4). For current environmental discourse, the exigence, “an imperfection marked by urgency” (p. 6), is the need to address the impending consequences of climate change. The coalescing elements that compromise the discourse create the rhetorical situation. Bitzer (1992) explained how the formation of rhetorical situations is natural because people are inclined to participate in the conversations about issues that matter to them and society.

Burke (1941) characterized public discourse as “unending conversations,” meaning that conversations, past and present, shape the context of rhetorical situations (p. 111). When people engage rhetorical situations, they are engaging a collective conversation that has occurred across people and time. This conversation contributes to the dynamics of the rhetorical situation and thus the appropriate responses to it. Similarly, Foucault (1977) has argued that the present is best understood from a “genealogical” approach (p. 138), which recognizes discourse as a coalescing of past discourse, histories, and current perspectives. Society’s discussions continuously develop and transform based on these intertwined factors. It is not only the discussions that occur on a national scale that impact how society views an issue. Our contemporary understanding of sustainability discourse is based upon past conversations about the climate and energy, histories and controversies, and current views on if/how society should address climate change.

Therefore, particular and localized conversations play a role in shaping the larger context of unending conversations. In Nevada, we can characterize the discourse and controversy over solar as a contest to define renewable energy as either helpful and necessary, or hurtful and dangerous. The controversy surrounding the solar incentives produced the societal and rhetorical

conditions for the acceptance of solar as a viable energy source. This acceptance was produced by the conversations Nevadans used to make sense of a controversy. Ceccarelli (2013) addressed the audiences of scientific and technological scholarship by asking, “To whom do we speak?” I ask, “To whom does the public listen?” In making decisions about sustainability and the climate, to whom does the public give trust, authority, and power? To answer these questions, we must first explore previous work about how the public comes to understand the environment when it is the audience of powerful institutions’ discourse.

For example, Foucault (1978) argued that society is broadly centered among guiding religious, political, and other powerful institutions in ways that affect how society obtains information. Because powerful institutions hold influence over society, they have the ability to influence knowledge. For example, Foucault explained institutional influences through the attempted repression of human sexuality. Historically, the very institutions that form the base of society discourage certain conceptualizations of sex. When religious institutions deemed sex a sin, and economic institutions deemed sex a distraction, public discourse about sex was scant and it was relegated to private and non-public spaces. Foucault understood that the repression of sexual talk created a society that publicly knew sexuality in terms of the limited definition in which the guiding institutions framed it.

Nonetheless, powerful institutions often communicate and contribute to the public’s understanding of issues—such as solar energy in Nevada. To conceptualize how these institutions function, I look to the work of Celeste Condit. Condit (1994) argued that modern society is marked by hegemony. Dominant groups maintain societal worldviews that are “broad based and coherent... gaining active assent from allies and passive assent from other classes or groups” (p. 206). In other In other words, society is generally in accord with the guiding

economic, political and social ideologies promoted by its guiding institutions. In America, society assents to be influenced by capitalism and live under a republic.

However, society does not forever assent to a single, unchanging hegemony. Thus, maintaining a fluid hegemony is a communicative enterprise. Societal powers maintain harmony with society by crafting their communication to identify with ebbs and flows of public ideologies and values (e.g. faith or freedom). To explain this, Condit asserted that modern society is “multivocal” (p. 211) and is thus never ubiquitously happy with hegemony. Multiple ideologies and conceptions of the world emerge within society. This creates a state of concord in which society exists among a general agreement with intuitions of power, but only so far as they strategically adapt to society’s ideological changes. Thus, She stated, “concord is neither [completely] harmonious nor inevitably fair or equitable, it is simply the best that can be done under the circumstances” (p. 210). As new social ideologies arise powerful institutions adapt their messages to changing social values and priorities in order to direct the hegemony. For example, during the debate on abortion, pro-choice advocates adapted their messages to the feminist movement that gained traction in the United States. Whereas pro-choice advocates previously focused their public discourse on the right to safe abortions, their messages changed to consider abortion as a feminist, women’s rights issue (Railsback, 1984).

In Nevada, messages about solar unfolded among corporate institutions of power. Fossil-fuel monopoly NV Energy backed the CSEF and Nevada’s major solar company, SolarCity, backed BBSC. When considering how Nevadans knew about sustainability and renewable energy, we should examine how the corporate institutions of power aimed to communicate and adhere to society’s multivocal ideologies. In this regard, we should consider how the Nevada

public understood knowledge regarding sustainability through institutional communication. We should also consider how multiple institutions arise to shape that knowledge.

To do this, we can turn to Goodnight's work on public controversy. When there are crises of legitimacy and multiple competing voices, controversies over both content and appropriate communication practices emerge. Goodnight (2012) proposed that democratic processes are fueled by argumentation, because he views discourse as marked by pragmatism, or the human desire to come to consensus through discussion and deliberation (Goodnight, 1991). If competing, oppositional messages arise, pragmatic deliberation and discussion can resolve uncertainty. The public is incited by controversy to discuss contested knowledge and seek resolution.

The different discourses contained within the Nevada solar controversy engages the public sphere's ideals of identification and partisanship (Goodnight, 2012). Members of the public navigate the competing discourses about solar energy and align themselves with the disseminated knowledge that identifies with their interests and ideologies. Partisanship occurs as these interest-based alignments form camps of competing ideologies and interpretations. Goodnight (2012) considered the public sphere ripe for contestation due to the fundamental uncertainty associated with making decisions about the future. The public will never know how politics affect it until the policies take place, but still they need to come to reasoned conclusions about the best path forward.

Science and technology continuously develop and change, offering opportunities to disseminate new information and knowledge in which people can identify and align. This controversy exemplifies two unique features of science and technology controversies, their ability to attract audiences and their normative focus (Goodnight, 2005). Goodnight (2005)

argued, “Science and technology controversies emerge from disputes that are significant enough to attract multiple adherents who generate incompatible points of view that persist and multiply over time” (p. 28). Scientific controversies emerge when there are disputes about facts and the legitimacy of science, sometimes in spite of scientific consensus. In Nevada, multiple stakeholders arose to discuss various perspectives on the validity of solar energy. Furthermore, “science and technology controversies take a normative turn in the study of legitimation crises” (Goodnight, 2005, p. 29). When the public perceives a “withholding” of resources, in this case energy, a legitimation crisis emerges for the institutions that are expected to provide these public services (Goodnight, 2005, p. 29).

Controversy theory helps us understand another dimension of how discourse influences the public’s conception of and will to knowledge. While the public does place trust in institutions of power, both public incitement and the institutions themselves can contest knowledge by engaging and participating in controversy. As conflicting messages about solar energy emerged in Nevada, the public sphere served as a site of controversy and arena for potential resolution. Public uncertainty about what knowledge should be valued in making sustainable decisions empowered multiple, oppositional interests to participate in discourse about appropriate future action.

Method

I employ Burkean dramatism to critically examine the communication used by NV Energy and SolarCity to make sense of the solar controversy. Burke (1945) presented rhetorical communication as an active, symbolic process of making public meaning of the world through language. Thus, dramatism examines situations and events as dramatic events (Burke, 1970) in which a dramatic pentad can be examined: act, agent, scene, agency and purpose. Rhetorical

scholars using this method examine how “emphasis on certain components of the pentad produce a ratio, or a preference for one aspect of a situation over others” (Bloomfield & Sangalang, p. 144). Within the context of controversies, Brummett (1979) argued that public uncertainty leaves room for people to attribute meaning for the way the things are and have become. Those attributing meaning to controversy attempt to define problems and change perceptions by emphasizing one or more of dramatism’s pentadic terms.

Burke (1945) proposed that all acts occur within their “container[s],” which he labeled as scenes (p. 3). They are the settings in which the act occurs. Communication can emphasize a scene’s “circumference” (Burke, 1970, p. 333). This is the scope of the setting that contains the act. For example, political actors may emphasize a global scene, rather than a local, campaign-focused scene during international communication (Kelley, 1988). Agents are those who perform acts and the emphasis placed within discourse about acts reflects a portrayal of the human self (Burke, 1945). Gay rights activists in the 1970’s argued that homosexuality is an innate part of the self, and not produced through actions, thereby creating discourse that emphasized the agent over the acts they perform (Brummett, 1979). As a foil to gay right’s activists, anti-gay rights discourse asserted that homosexual behavior was wrong, and people could control their actions, thus inverting the agent-act ratio to create an act-agent ratio (Brummett, 1979). In the pentad, the agency is the means by which the agent performed the act, and purpose refers to the underlying reasons why the act was performed (Burke, 1945). All parts of the pentad can be emphasized, thus changing the implications of the act and the stories told about it.

As a method, dramatism particularly concerns itself with the relationships among the pentadic elements—the observed ratios of emphasis placed on terms by the communication

(Burke, 1945). As an element of the pentad is emphasized uniquely the other elements are deemphasized. The preference reveals how the person telling the story symbolically constructs the world. Thus, dramatism becomes a *Grammar of Motives*—a systematic critical approach to understanding why and how we communicate our worldviews (Burke, 1945).

I use dramatism to uncover the social orientations and corresponding ideologies communicated by both NV Energy and SolarCity. This is because “rhetoric is called upon to clarify and define the situation by orienting issues to one or more terms of the pentad” (Brummett, 1979, p. 252). By examining orientations, dramatism reveals attitudes towards how we view the social order. Burke (1945) argued that everyone suffers from guilt, and our orientations toward life reveal how we manage that guilt. Burke (1970) explained guilt is related to social order. All people have ideas as to how society should operate, and we feel guilty when our actions (or the actions of others) don’t conform to society or society itself doesn’t operate in the ways that we want. Thus, when the social order is disrupted, we seek purification (Burke, 1965). Dramatism, viewing language as action, shows how orientations towards life influence how we use language to purify the social order. In Nevada, the solar incentive rulings created an uncertainty in the social order in which both NV Energy and SolarCity responded to create their own discursive routes to purification.

Specifically, I examine the emergent ratios in their discourse that echoed their ideologies towards the environment. For example, as BBSA described the act of restoring incentives, it emphasized the influential capabilities of individuals to change solar policy (agency). To restore solar incentives, individuals were a means to an end, needing to band together to voice their support for solar energy and sway Nevadan policymakers. Thus, BBSA emphasized the importance of public agency as the determining factor to what action Nevada would take. This

emphasis shows an agency-act ratio and reveals BBSA's pragmatic orientation towards the controversy. On the other hand, NV Energy described incentives in terms of how they negatively affected Nevada (the scene). NV Energy argued that incentives caused non-solar customers to pay higher utility bills. They communicated an act-scene ratio that argued an orientation of realism: a philosophy that suggests society evaluate actions for their positive or negative effects (Brock, 1965).

Overall, I employ dramatism to uncover the ideologies, motivations, and orientations towards social order promoted by Nevada Policymakers, SolarCity and NV Energy in the solar controversy. I aim to better understand how Nevadan Policymakers communicated and what the underlying ideologies contained within the communication implied about the controversy. Also, I aim to better understand how NV Energy and SolarCity publicly communicated specific orientations towards understanding renewable energy. Furthermore, these orientations suggest broader ideologies that suggest how the public should act in regard to renewable energy.

Thesis

I examine the discourse regarding the Nevada solar controversy because it represents the turbulent ups and downs common to environmental discourse when competing interests with different information intersect in a community. During the year and a half when solar went from inevitable to unsellable and back again, spaces for discourse and opportunities for disruptions in energy policy emerged. This dynamic controversy provides additional perspective into contemporary environmental discourse over solar energy and how the viability of sustainability is communicated. It tells us which ideologies were dominantly expressed by key stakeholders in Nevada's solar controversy, implying that these ideologies may also be expressed in similar controversies.

While the BBSA sought to sway public opinion towards policies that restored solar economic incentives, the CSEF sought to turn the public against restoring those incentives. Rhetorically examining the dynamics of this controversy allows us to gain insight into how we communicate about the environment. I argue that this controversy is one of many conversations occurring globally about the dire need to save our planet from the harm of anthropogenic climate change. This controversy was not only about the viability of solar energy, it was also about how Nevada ideologically managed the relationships among humans, the environment, and the institutional stakeholders that communicated about energy policies. In this section, I outline the arguments I will make regarding the overall communication of Nevadan policymakers, NV Energy, and SolarCity.

I make two overarching arguments. First, I argue that the scientific data and technical information presented within public controversies is inherently rhetorical. The presentations of data can be examined by how they construct dramas with underlying motivations. Second, I argue that environmental concerns within public controversy may be subsumed by other competing depictions of what is at stake. In the solar controversy, one might anticipate concern for the environment and climate change to be an important issue of contention, but the environment as conspicuously absent in discourse by multiple stakeholders in the controversy.

In my first argument, I contend that in matters of public controversy, the ways in which research and data are presented contain rhetorical dimensions and are inherently persuasive. As Nevada policymakers requested that research be done to investigate the impacts of solar incentives in the state, the results were not simply a presentation of facts. Rather, the ways in which data is presented construct dramas that are motivated by specific ideologies. These ideologies can suggest how society should operate, even if the goal of presenting data is simply

to gain knowledge of the material world. This contributes to our understanding of how matters of the environment include the presentation of material data and research. The presentation of research and data is rhetorical and implies that when society considers facts, it is also considering the ways in which the facts are presented and what ideologies they therefore promote, whether intentional or unintentional.

In my second argument, I contend that policymakers, NV Energy, and SolarCity did not construct a scene that included environmental factors. In every drama, the scene was depicted in ways that clearly included monetary factors, but not environmental ones. NV Energy and SolarCity depicted dramas where the scene was only comprised of Nevada's economy, utility bills, and the health of its solar industry. Thus, the ways in which the solar controversy was communicated reflect that concern for the environment does not always poignantly manifest in public controversy. Rather, this concern may be subsumed under other competing factors that constitute a dramatic scene.

This may reflect the "strategic desirability" of communication in the public sphere (Condit, Lynch, & Winderman, 2012, p. 392). This is the idea that persuasive communication in public settings should ground itself among culturally relevant perspectives held by society. In the solar controversy, the communication addressed American concerns with the economy, jobs, and expenditures to reflect the values and interests of Nevada energy consumers. Asen (2017) describes these interests as reflective of a neoliberal public sphere. Here, issues are defined and discussed in terms of their ability to contribute economic value to society. More importantly, neoliberalism obfuscates solutions to collaborative issues "through its strict reliance on individualism" (p. 3). Providing individuals with economic autonomy and fairness detracts from considering non-economically centered ways that society can mitigate climate change or

promoting sustainable energy. Put simply, considerations for the environment become subsumed by economic considerations.

Chapter Outline

After this introduction, chapter one revolves around the origins of the controversy, when The Public Utilities Commission of Nevada (PUCN) conducted an investigation into the effects of solar incentives in Nevada. I begin this chapter by providing relevant contextual information surrounding Nevada and its relationship with energy. This establishes how Nevada has sought-out, used, managed, and negotiated its energy needs in the past, and it provides context for why the solar incentives are part of a contemporary energy controversy. After providing this context, I examine the specific report that was produced as a result of the PUCN's investigation into solar incentives (Price, Pickrell, Kahn-Lang, Ming, & Chait, 2014). Here, I analyze the report for how it rhetorically constructed two dramas. The first corresponded to the act of maintaining solar incentives in Nevada, and the second corresponded to the act of promoting utility-scale construction of solar resources². In this chapter, I analyze how the construction of each drama reveals underlying social orientations that suggest what society should value in its creation of energy policy. I contend that the report emphasized an act: scene ratio. It focused upon the negative effects of continuing solar incentives in the first drama, and it focused upon the positive effects of utility-scale solar in the second. Thus, I contend that even research and data that is meant to provide knowledge and information, can contain ideological underpinnings that suggest how society should operate.

Chapter two focuses on two aspects of NV Energy's communication. The first aspect is the rhetorical drama constructed within the report that NV Energy provided to the PUCN

² This refers to a utility constructing large-scale solar energy generation facilities. It is contrasted against the construction of multiple rooftop solar systems.

recommending that solar incentives be reduced (NV Energy, 2013). The second aspect is the rhetorical drama constructed within the public commercials created by NV Energy's CSEF. Here I examine two commercials, "Asking" and "Can't Afford That" (Citizens for Solar and Energy Fairness, n.d.a.; Citizens for Solar and Energy Fairness, n.d.b.). In chapter two I contend that NV Energy presented an act: scene ratio in its report, and a purpose: act ratio in the CSEF commercials. Additionally, I discuss the shifting between these dramas as a rhetorical strategy based on the drama's storyteller.

Chapter three examines SolarCity's role in the controversy. Specifically, I examine how SolarCity created the BBSA to enter the solar controversy as a pseudo-grassroots organization. I examine how the BBSA constructed dramas regarding two acts. The first act was the PUCN's reduction of solar incentives. To conduct my analysis of this communication, I examine the BBSA's website as well as two videos it uploaded to social media (Bring Back Solar Alliance, n.d.a; Bring Back Solar Alliance, n.d.b; Bring Back Solar Alliance, n.d.c). The second act is the restoration of solar incentives. To analyze how BBSA communicated this act, I examine communication from BBSA's website and Twitter (Bring Back Solar Alliance, n.d.a; Bring Back Solar Alliance, n.d.c). When talking about the PUCN's decision to reduce solar incentives, BBSA emphasized the effects of the act and communicated an act: scene ratio. When discussing the restoration of solar incentives, BBSA emphasized how individual solar supporters can use their voice to influence Nevada policy and communicated an agency: scene ratio. I argue that these dramas worked together to benefit SolarCity's goal of restoring solar incentives. By condemning the reduction of solar incentives, the first drama implied the praise of the incentives' restoration. Meanwhile, the second drama emphasized the specific means by which the

restoration could occur. Both dramas de-emphasized the scene and furthermore left out the environment from consideration.

In the conclusion, I explore how a rhetorical analysis of the Nevada solar energy controversy provides an important lens for our general understanding of sustainability and renewable energy discourse. I contend that localized controversies are of particular importance because they impact the larger public sphere. As Goodnight (2012) noted, “Small controversies may appear trivial, a flash in the pan, but these may also provide disruptions, disturbances, and events that render problematic standing theoretical categories and explanations” (p. 262). While local communities clearly have a direct impact on their municipal governments, they also contribute to a larger understanding of how all environmental communication matters.

Chapter Two:

Nevada's Energy History and the Origins of the Solar Controversy

Nevada did not inherently invite human settlement. In the southern tip, unrelenting desert sunlight, limited water, and a lack of natural resources to rely upon created a barren, almost uninhabitable land. When Spanish missionaries first crossed into the area in 1540, the harsh sunlight and rocky landscape caused them to be uninterested in settlement (Bowers, 2013). While some Native American tribes occupied this land, it was relegated as a rest area for travelers on their way to California (Moehring, 2000). Yet, as Nevada's population grew, the sunlight that originally precluded occupancy would become one of its most distinct characteristics and important resources.

In this chapter of my thesis, I rhetorically analyze the communication surrounding the origins of a solar controversy in Nevada. As Nevada's solar energy industry was growing at unprecedented rates (NV Energy, 2016), State regulatory officials drastically decreased solar incentives in the state (Leslie, 2016). This caused many solar companies to stop selling in Nevada (Whaley, 2016c). As a result, two large corporations, NV Energy, the state's electricity monopoly, and SolarCity, the nation's leading solar installer, launched vigorous campaigns to sway public opinion about the incentives overhaul.

To provide the appropriate context to analyze the origins of the solar controversy, I present a brief history of the state's energy development. Understanding how Nevada has sought-out, used, managed, and negotiated its energy needs in the past provides context for how the sun and solar energy became a contemporary controversy. Then, I explain two situational factors that contributed to the solar controversy: how Nevada regulates electricity and Nevada's history of solar incentives. Lastly, I detail the origins of the solar controversy by analyzing Nevada's 2013 investigation into the costs and benefits of solar incentives.

The focus of my analysis is the results of the Nevada Public Utilities Commission's investigation (PUCN). I employ Burkean dramatism to analyze the final report, an independent 3rd party report on the costs and benefits of solar incentives. I argue that the report constructed a rhetorical drama. In this drama, the report used two emphases to suggest that reducing solar incentives was positive for Nevada. It first emphasized that the act of reducing solar incentives would benefit Nevada by lowering Nevadan's utility bills. It then emphasized that increasing the amount of solar energy the utility constructed would be a better the choice than maintaining incentives. To conclude my chapter, I assess how the drama functioned to define the benefits of solar energy in terms of money. The report weighed the least-cost intensive policies as best regardless of other factors.

Nevada's Energy History

Nevada's rich history of energy consumption and development spans from 1861 to current day. In 1861 Nevada witnessed a mining boom with the discovery of the Comstock Lode, a large deposit of silver ore within the Sierra Mountains of the Southwest United States (Moehring, 2000). This caused the area now known as Las Vegas to become a critical supply station. Located in-between two isolated mining camps, Las Vegas grew to provide food, mining supplies, and livestock to isolated mining camps. The community continued to prosper until about 1919 when the mines were mostly exhausted and surrounding operations closed (Moehring, 2000).

The dissipation of the mining boom caused Southern Nevada to reconsider its relationship with energy. Because mining could no longer sustain the area, residents needed to find alternative ways to finance and sustain the town. Thus, the residents decided to transition their energy use. Las Vegas residents sought to become an attraction destination by capitalizing

on Las Vegas' location and how often people traveled through it. The energy once used to support mining would need to be redirected and increased to support the energy tourists would use. In 1925 the City of Las Vegas lobbied the federal government to fund the paving of its roads (Moehring, 2000). This would make traveling to and through the area easier. In 1931, the city legalized gambling (Moehring, 2000). Las Vegas began to transform from a convenient supply station to a town of casinos and bustling activity.

In 1939, the Hoover Dam was built. Anticipating the dam's construction and the energy it would provide, the city grew. Las Vegas paved more roads, increased its funding for public services, and developed plans to construct more infrastructure (Burbank, 2010). When the dam was complete, it became a national tourist attraction (Burbank, 2010). By 1940, Nevada's population quadrupled from its 1920 census, largely driven by the Hoover Dam's construction and the tourism industry (Strow, 2009). Hitler's 1940 invasion of Europe spurred preemptive development across the United States, with Nevada constructing a commercial and military airport, air-training base, and magnesium production plant by 1943. The bustling industry and military training caused the state's population to swell, and from 1933 to 1943, the state's energy expenditure increased 26-fold (Brigham, 2003). Presently, Nevada still experiences increases in population growth, tourism, and energy expenditure. As of 2016, the state's electric utility, NV Energy, served over 1.2 million customers and provided the electricity needed to provide power for Nevada's 40 million annual tourists (NV Energy, n.d.).

This brief history on Nevada's energy needs is important in shaping the rhetorical context surrounding the solar controversy. This is because public controversies bring forth into the public consciousness aspects of life that are disconnected from everyday routine (Olson & Goodnight, 1994). The public does not often think about how the state obtains its energy supply. Yet, as the

solar controversy developed, the ideas surrounding how Nevada would supply its energy rose into the consciousness of public and technical realms. The arguments regarding solar energy incentives would become part of Nevada's overall history of finding ways to supply and manage energy within the state. The next section of this chapter examines the development and regulation of Nevada State solar incentives to contextualize how solar incentives originated and grew to become an issue of contention in 2014.

Nevada State Electricity Regulation and Solar Incentives

In 1997, the Public Utilities Commission of Nevada (PUCN) was formed out of the Nevada Public Service Commission ("Deregulated market," 1997). The PUCN is a regulatory body that oversees Nevada utility companies to ensure they comply with Nevada State law (State of Nevada Public Utilities Commission, n.d.b). Specifically, the PUCN recognizes NV Energy as a monopoly because it has no competition in the areas it serves. Thus, the PUCN regulates NV Energy to prevent it from taking advantage of the lack of competition. NV Energy may function without competition so long as it submits to regulatory oversight. This ensures that NV Energy provides reliable services and rates to Nevada customers (State of Nevada Public Utilities Commission, n.d.a). In summation, the PUCN allows the monopoly to make a profit, but only as long as essential utility service fees are transparent and fair based upon Nevada State standards.

To appropriately make decisions, the PUCN conducts formal, information-gathering investigations at the request of lawmakers or utilities (State of Nevada Public Utilities Commission, 2012). These investigations are formally documented and open to public access on its website. This is to ensure that all interested parties can participate and contribute to the investigation process. The solar controversy in Nevada arose from such an investigation. In 2013 the Nevada State Legislature passed a law requiring the PUCN investigate and evaluate the costs

and benefits of the State's incentive policy called "net metering" (Nevada State Legislature, 2013). Shortly after, the PUCN commissioned "an investigation to examine the cost and benefits of net-metering [incentives] in Nevada" (State of Nevada Public Utilities Commission, 2013b, p. 1).

Net-metering concerned how solar systems interacted with the existing utility system. This is because when a person installed a solar system at his or her property, the solar system only produces electricity when it receives sunlight during the day. At night, the utility company provides electricity to the home. In Nevada, if a solar system produced more energy than it used during the day, the utility company received the excess electricity and then credited the customer towards the electricity they used at night (NV Energy, n.d.b). Thus, the customer netted the benefits of producing extra electricity during the day.

The net-metering benefits in Nevada originated as a retail-based credits. This means that utility companies were required to credit customers for excess energy at the same retail rate that the customer paid for solar energy (NV Energy, n.d.b). That meant that NV Energy customers who wanted to purchase a solar system could design a system that produced excess energy during the day, so that the customer could completely offset their NV Energy electricity charges at night. This is called a net-zero benefit. In other words, NV Energy was legally required to participate in a program in which they paid solar customers for their excess energy. This is especially important because net metering policies cause electric utilities to lose the revenue that they could have charged customers. As I will explain in the following chapter, net metering's effects on NV Energy's revenue motivated the company to become a key stakeholder in Nevada solar energy policy and the solar controversy.

Overall, the variety of incentives led to the proliferation of solar energy in Nevada. This in turn prompted Nevada to evaluate net metering. When solar energy becomes prominent in a state, policy makers must consider how net metering has affected and will continue to affect the state's energy landscape (Carley & Davies, 2016). As of 2014, 12 states had commissioned studies to report the effects of their net-metering policies (Blackburn, Magee, & Rai, 2014). The Nevada legislature did the same. In 2013, it passed assembly bill 428 that required PUCN to provide its own report (Nevada State Legislature, 2013). The report, at minimum, was required to assess the costs and benefits of net-metering for the State of Nevada overall, for those who participate in net-metering, for those who do not participate in net-metering, and for Nevada utilities.

As the formal PUCN investigation into net-metering incentives began, interested parties requested that the commission consider monetary and social benefits of renewable energy as well as the reduction of carbon emissions (The Alliance for Solar Choice, 2013; Bobzien, 2013). A year later, Energy and Environmental Economics, INC. (E3), an independent organization selected by the stakeholder committee to conduct analysis, provided a comprehensive 171-page report to the PUCN (Price, Pickrell, Kahn-Lang, Ming, & Chait, 2014). This report outlined the costs and benefits of the proposed three-prong solar incentive structure. Overall, the results of the study found that prior to 2014, solar systems receiving net-metering incentives had provided a net benefit of approximately \$36 million to all Nevada electric customers. However, the report also found that maintaining net metering in the future would begin to cost electric customers money because the state was lowering its upfront, cash incentives. Net metering would also reduce the amount of solar that could be in the state by discouraging the utility from building its own solar energy plants.

The PUCN approved the report and issued a summary report to the State Legislature on September 29, 2014 (State of Nevada Public Utilities Commission, 2014a; State of Nevada Public Utilities Commission, 2014b). In the following year, the state adopted Senate Bill 374 on June 5th 2015 (State of Nevada Legislature, 2015). This legislated three new aspects of energy incentives. First, it enabled the PUCN to establish new electricity rate classes based upon whether one buys electricity or produces it with non-traditional technology (such as solar panels). This means that the PUCN could alter the amount of money that solar panel users pay for their NV Energy electricity. Second, the bill capped the amount of net metering incentives that state could have from 3% of its total electricity production to a hard limit of 235 Megawatts worth of systems. This meant that if the state produced more energy, the amount of net-metering allowed would no longer proportionally follow. Finally, the bill restricted future changes to the net-metering incentives by prohibiting the PUCN from creating incentives that would “unreasonably shift costs from customer generators [those using renewable energy] to other customers of the utility” (State of Nevada Legislature, 2015, p. 5).

Rhetorical Dramas and Technical Discourse

In our attempts to understand solar renewable energy and the role that the E3 report played in the solar energy controversy, it is important to examine how scientific research is persuasive. Goodnight (2012) argued that science is rich in controversy and public interest. He argued that the ways in which the public deliberates and chooses to utilize science changes the material conditions of the world. Scientific and technical inquiry produce the research and data that society grapples with in its deliberations. Thus, the knowledge from scientific and technical realms has rhetorical implications. In Nevada, the State Legislature determined that more

technical knowledge of net metering was needed. This would allow for policy makers to have the information necessary to potentially change Nevada energy policy.

Moreover, Wander (1976) explained that those who produce knowledge are inherently persuading their audiences to accept their methods and results. Thus, research inherently contains the rhetorical goal to persuade others in the field to accept and consider the discoveries and conclusions of the report. To summarize, scientific inquiry is innately rhetorical because it is communicated in ways that persuades others to accept the knowledge produced by inquiry.

Ceccarelli (2009) explained that all scientific texts are constructed based upon a consideration of discursive opportunities and material constraints surrounding the science. Thus, the language within scientific reports is purposely selected to promote consensus among the contextual considerations surrounding the science. Althouse (2005) linked these choices to a social construction of reality, stating, “perceptions of reality are not rooted simply in the physical world, in technical research results, or in philosophical arguments but in language itself” (p. 459).

Burke (1945) presented a framework for understanding the worldviews presented by language. He argued that all communication is symbolic action that presents life as a drama—emphasizing certain aspects of life over another. He presented dramatism as a method to examine how a speaker’s communication constructs five pentadic terms: *act* (the actions that occur), *agent* (the individual or individuals who perform actions), *scene* (the settings in which acts occur), *purpose* (the reason why actions are taken) and *agency* (through what means are actions taken).

As a speaker’s communication uniquely emphasizes one element of the pentad, other elements are deemphasized. These emphases present a ratio, “a preference for one aspect of a

situation over another” (Bloomfield & Sangalang, 2014, p. 144). Central to dramatism, preferences reflect motives, a “bundle of judgements as to how things were, how they are, and how they may be” (Burke, 1954, p. 14). Thus, human motivation consists of its preferred social orientations that suggest how society should evaluate and act within situations (Burke, 1945; Ling, 1970).

This is especially important because empirical and technical data is traditionally perceived to be free from preference or orientation. Scientists are considered “pawnbrokers of reality,” (Goode, 1969, p. 85), and the data they provide answers about nature. Focused on discovery, scientific research does not inherently promote ideologies. However, Brummett (1979) explained that language itself provides clarity to questions by orienting issues to elements of the pentad. Scientists often consider what language to use and how to speak to their audiences (Walsh, 2013). Thus, like all communication, even technical discourse is a drama.

To summarize, one way to analyze technical discourse is to examine it as dramatic construction. By employing dramatism to analyze the language used within technical reports, a rhetorical critic may discover the nuanced ways reports construct a given orientation for the treatment of an issue. Technical discourse can focus upon certain elements of the pentad and thus orient the audience towards a preferred view of the topic.

Thus, I employ Burkean dramatism to examine how the technical communication regarding solar energy presents orientations of how the technical community should perceive solar net-metering incentives. Specifically, I examine the report provided to the PUCN by E3 in 2014. It was the technical product of bureaucratic deliberation among the PUCN and energy stakeholders to produce answers in their investigation of the costs and benefits of net-metering incentives in Nevada. I focus on the report’s answers to five general questions within its

executive summary section. As I conduct my dramatic analysis, I detail what each question discussed and how the report presented the answers.

I argue that the report contained a clear pentadic ratio, *act: scene*, that, when coupled with the data within the report, functioned to suggest that society should positively evaluate the act of decreasing net-metering. I make this claim based on statements in the report that evaluated the act of providing net metering incentives based upon its outcomes in Nevada. Afterwards, the report examined a second act, the utility construction of solar energy. As the report outlined the benefits of utility-constructed solar energy, it presented information that suggested the most positive affects to the Nevada (the scene) could be realized through such utility-scaled power.

The report's information as presented through the act: scene ratio suggested that policymakers adopt a reduction in net-metering incentives. The pentadic ratio revealed a motivating ideology in which society should embrace actions that have positive results. While the report did communicate that previous net-metering produced benefits for Nevada, it also claimed that reducing incentives would be even more beneficial in the future. This can be seen through how the report introduced a second act: the construction of utility-scale solar plants. Not only would the construction of utility-scale solar would provide the most benefits to Nevada, but the continuation of the previous net-metering policies would also disincentivize the construction of utility-scale solar. Ultimately, while the report's purpose was to provide technical information about net-metering, its communication revealed a drama in which reducing net-metering was a positive act.

The Act: Scene Ratio and Net Metering

In the beginning of the report, it focused on understanding how *the act* of purchasing net-metered solar systems affected the amount Nevadans paid for energy, thus affecting the scene of

Nevada's energy landscape. Burke (1945) argued that ratios emphasizing acts reflect the social orientation of realism. This orientation suggests society should evaluate its actions based upon their consequences (Brock, 1965). In the report's act: scene ratio, net metering is implied to have impacted Nevada, and should be evaluated based upon how it would continue to impact Nevada.

The first part of the report sought to determine if purchasing net-metered solar systems affected the overall price of electricity for customers who chose to install solar panels than if they solely obtained electricity from NV Energy. To determine this, the report leveraged the price of purchasing solar energy (minus NV Energy's up-front incentives) against the cost savings accrued on electric bills using solar energy. The report determined that, prior to 2014, up-front cash incentives made purchasing a solar system cheaper than buying electricity solely from NV Energy. Buying a solar system was "cost-effective" (p. 5) and would lead to Nevadans saving money on their electric bills.

However, because Nevada was in the process of lowering the up-front cash incentives, anyone who would buy a solar system in the future would pay more money overall than if they continued to buy electricity from NV Energy. The text in section one centered upon how the act of buying solar panels would affect Nevadans:

Self-generation looks moderately more expensive than conventional utility service... [Net-metering] participants are expected to pay about \$0.02/Kilowatt-hour (kWh) more for energy they self-generate than if they would have purchased from the utility, which adds up to a net present value (NPV) of -\$135 dollars over the 25-year lifetime of the systems. (p. 6)

The information provided about costs emphasized effects upon agents by highlighting how installing solar systems increased energy bills. This is a focus upon the direct economic impact the act causes for Nevadans.

A focus on the act and its consequences deemphasized other ways of evaluating the act of purchasing net-metered solar systems. This is because ratios are “*selections* of reality... and any selection of reality must, in certain circumstances, function as a *deflection* of reality (Burke, 1945, p 59). Because the report emphasized the effects of purchasing solar panels, it did not explore how financing options (*agency*) may change the data.

The next part of the E3 report discussed how the purchase of net-metered solar systems affected non-solar customers. Specifically, the report presented information determining how the past, present, and future of solar energy and solar energy incentives impacted customer rates. The report provided three findings. First, providing solar incentives prior to 2014 significantly shifted costs from non-solar customers to solar customers. This is because NV Energy provided up-front solar incentives by increasing charges on customer utility bills. Second, by reducing net-metering incentives in the future, no electricity customer would incur costs of other electricity customers. Third, all electricity customers will benefit in the future, because Nevada has constructed enough net-metered solar energy to avoid purchasing any renewable energy needed to meet its state-mandated clean energy requirements. This would benefit non-solar customers, because otherwise all customers would collectively be charged \$36 million dollars to fund the purchase. The section concludes, “Overall, the planned reforms [to reduce net-metering incentives] significantly reduce costs to non-participants” (p. 8).

The data presented in this section deflected other ways of perceiving net-metering. It evaluated net-metering (the *act*) for how it affected Nevadans without solar energy (members of

the *scene*). An alternative emphasis could evaluate the act for how well it gives all members of the scene agency to choose between maintaining traditional electric service from NV Energy and purchasing their own solar panels. In this ratio, a positive evaluation of net-metering would focus on how freely Nevadans could choose between the two options. While the report did acknowledge agency, it was not controlling. Rather, the act of influence reducing net-metering incentives would “[reduce] the financial proposition to those who would install self-generation” (p. 8). In dramatic terms, the *act* of reducing incentives would limit individuals’ future *agency* to install solar panels.

To answer the third question, the report provided answers about how the solar energy built through net-metering increased or decreased utility bills overall. It repeated its previous findings that funding solar incentives before 2014 caused NV Energy customers to pay higher bills. The report found, “prior to 2014, NEM caused bills to increase slightly overall because utility incentives exceeded the utility costs avoided by the NEM generation” (p. 9). In other words, the utility had to charge more on its utility bills to cover the cost of incentives.

Afterwards, the report found that scaling-back the incentives would reduce the previously inflated electric bills. “For future vintages, when incentives are lower, the total bills NV Energy collects will decrease substantially” (p. 9)

These answers implied that having net-metering incentives (the *act*) led to an increase for Nevadan residents’ utility bills (an aspect the *scene*). Of importance is how the report again deemphasized the idea of agency. This section of the report concluded with a chart detailing the effects of net-metering on utility bills. It showed that average utility bills were raised for net-metered solar systems installed in 2013 (when net-metering and upfront incentives were not yet reduced). It then showed how average utility bills will be reduced as solar incentives are reduced.

Afterwards a statement contextualizing the chart is presented: “All of the bill savings accrue to those who install self-generation and these savings do not include the costs of the systems themselves” (p. 9). In other words, an individual’s choice to purchase solar energy could be costlier than the data depicts.

Overall, the act: scene ratio found in the first three sections of the report oriented readers to evaluate net-metering incentives for what net-metering had done in Nevada and what net-metering would do in Nevada in the future. While the past net-metering incentives were evaluated as positive, the data was hedged against another act, the purchase of a solar system. The report suggested that a resident who purchased a solar system could, contrary to the data, bear costs that would offset the savings on their utility bills. While the future decreases of incentives were evaluated as positive, the data did not consider the impact of choices (*agency*) that customers and policymakers could make. It did not consider that customers could finance instead of purchase a system or policymakers could keep net-metering, opting to change other incentives instead.

The Act: Scene Ratio and Utility-Constructed solar

In the last two sections, I have reviewed how the report began looking at the effects of two separate *acts*. It examined customers purchasing solar panels through net-metering incentives, and the utility company constructing its own solar panels. It evaluated these acts based upon how they benefitted Nevada. For example, the report argued that net-metering could lower state electricity costs. However, it also stated, “Overall, NEM generation moderately increases total energy costs, primarily because large-scale, utility-sited renewable generation is a lower cost resource” (p. 10). In other words, continuing net metering would actually increase

total costs. This is because the costs associated with constructing the more cost-effective large-scale utility solar energy would be directed towards the less cost-effective net-metering.

Thus, customers generating their own electricity through solar panels would be costlier to Nevadans than if the utility constructed its own solar generation facilities. The report summarizes this in the following statement: “Our forecasts predict that the cost advantage of utility-scale renewable systems outweighs the additional loss and transmission benefits of small distributed NEM [individually owned, self-generating solar] systems” (p. 11). In other words, if increasing utility-scale solar means some people will not install a net-metered solar system, that loss of individual systems is overshadowed by the benefits of the utility-scale solar. This explanation suggested the solar energy that best benefits Nevada is utility-scale—constructed, owned, and operated by NV Energy. The act of obtaining net-metered solar systems is not as effective, because it detracts from utility-scaled solar. It would shift resources away from supporting the costs of net-metering, rather than supporting the costs incurred through constructing large-scale utility solar.

The final section of the report examined if net-metering has created benefits to human health and the environment. The report stated, “There is no substantial net emissions reduction or additional health benefits attributable to NEM systems.” (p. 12). Additionally, it claimed that utility-scale solar energy generation would be better for the environment and that individual self-generation would discourage NV Energy from building solar energy facilities. The report summarizes this argument by noting:

Because customers install NEM systems when it is in their own interest,
NEM capacity is installed before NV Energy would otherwise need to build

utility-scale renewables... . This will result in less renewable generation and more emissions overall. (p. 12-13)

Thus, the report specifically framed the environmental benefits of solar energy not based upon the individual contributions of net metering or utility-scale solar. Rather, it views these acts in relation to each other, asserting that utility-scale solar produces the most environmental good. The report tells a story of an energy future where utility-scale solar would benefit Nevada because it would create more renewable generation and reduce carbon emissions. Despite net metering still providing environmental benefits, it was portrayed as harmful to Nevada because it would hinder utility-scale solar. Through this hindrance, net-metering results in less renewable generation and more carbon emissions.

Analysis and Implications of the Pentadic Ratios

My analysis of the E3 reports shows that it contained a dominant pentadic emphasis that revealed a social orientation of realism. First, the report used an *act: scene* ratio to emphasize that continuing current net metering incentives would negatively affect Nevada. Afterwards, the report added another act: the construction utility-scaled solar energy. It showed how utility-constructed solar would positively affect Nevada. Then, it explained how continuing net metering incentives had the negative effect of preventing these positive outcomes.

Overall, the use of this ratio undercuts alternative, positive evaluations of net-metering. The report suggested that reducing net-metering incentives was going to save Nevada customers money. Moreover, it doubled-down on the idea by arguing that maintaining net metering incentives would be a worse alternative than letting NV Energy construct its own solar energy. Additionally, even when portraying previous net-metering incentives as positive, the report suggested that its readers be wary that the purchase-price to obtain solar could offset its benefits.

Ultimately, the report implied that monetary value is the ultimate means to evaluate the costs and benefits of solar energy. Burke argued (1945) that all orientations suggest that we decide among choices. This is different from a focus on agency, in which choices are evaluated in comparison to each other. In realism, we choose acts that best impact other elements of the drama. The E3 report clearly framed impacts in terms of monetary values. All the data in the report was presented in terms of how net-metering incentives would save Nevadans money or make them pay more. This is most evident in the report's consideration of the environment. The report largely ignored the environment by suggesting Nevada will reduce emissions in the future regardless of the presence or lack of net-metering incentives.

Using monetary value as a barometer of successful energy policy has consequences. Primarily, it can cause a very narrow defining of the scene in a drama. All scenes have a "circumference," the defined scope where actions happen (Burke, 1978, p.333). In this report, the costs and benefits of solar energy occurred within utility bills. Other ways of valuing actions can allow for an expansion of the scene. For example, consider if the report's realism valued mitigating the harms of climate change as criteria for evaluating effects. In this drama, the circumference of the scene would be re-drawn to consider the entire planet, and Nevada's policy decisions may possibly incentivize both NV Energy and individuals to buy solar energy for environmental reasons.

Conclusion

A year after the report was issued, the Nevada Legislature seemingly agreed to the report's suggestion, as it legislated that the PUCN must develop a new net-metering policy for the state. Shortly thereafter, NV Energy issued its own report that proposed restricting net metering. In December of 2015 the solar controversy was amplified when the PUCN declared a

decrease to net-metering incentives. I argue that analyzing the E3 report contributes to our overall understanding of how society makes sense of and navigates environmental issues. It shows how the PUCN, in attempting to construct a technical, scientific report, actually produced a report with underlying dramatic motivations toward specific energy policies that privilege utility-scale solar energy over Nevada residents obtaining their own solar. This analysis holds important rhetorical implications for the rhetoric of science. Namely, it reinforces the notion that science is inherently rhetorical. When technical data is presented to provide knowledge and information, the pentadic emphases within the discourse reveals underlying persuasive motivations. Therefore, similar future analyses into the rhetorical dimensions of data presentation are valuable. They will improve our understanding of which underlying motivations are contained within the technical discourse and if any motivations prominently emerge. This ultimate will improve of understanding of the discourse and its influence on environmental and energy policy.

Chapter Three:

Ideological Shifts between NV Energy and Citizens for Solar Energy Fairness

In 2015 Nevada was the center of a solar energy controversy. On December 23, 2015, Nevada's utility regulatory body, the Public Utilities Commission of Nevada (PUCN), issued a ruling that reduced solar incentives and greatly increased the rates Nevadan residents would pay for electricity if they bought a rooftop solar system (State of Nevada Public Utilities Commission, 2015). Solar companies decried the ruling, and many ceased operations in Nevada (Whaley, 2016c). Subsequently, solar installations dropped by 92% (Muro & Sahah, 2016). With the PUCN's ruling, the future of solar expansion in Nevada was uncertain and a public battle ensued. Numerous parties used a variety of communication outlets to influence how Nevadan residents should perceive solar energy incentives. Ultimately, these communicative efforts were aimed to influence how the public would evaluate the restoration of solar incentives.

NV Energy, the state's main source of electricity for its residents, enacted a particularly large communication effort. In this chapter, I conduct a dramatisitic analysis of NV Energy's communication before and during the solar controversy. I begin by analyzing a report NV Energy presented to state policy-makers before the PUCN ruling. I argue that NV Energy constructed a drama of realism to persuade the state to reduce State incentives for solar energy. Next, I analyze two NV Energy sponsored commercials that aired after the PUCN's ruling, in the midst of the solar controversy. These commercials constructed a drama of mysticism to encourage the Nevada public to resist solar companies' request to restore solar incentives. Afterwards, I evaluate NV Energy's pre-controversy communication for what they collectively

implied about Nevada's solar controversy. I contend that both dramas communicated a narrow scene: Nevada energy policy as determined by fairness and equality in the rates that residents pay on their electricity bills. I contend that the report and commercials respectively filtered the concepts of effects and purpose through a scene marked by monetary concerns. Thus, the dramas failed to include considerations for net metering's effects on the environment. Ultimately, NV Energy's communication illustrates that corporate communication can be nuanced and multifaceted, yet still be understood through the motives that underline messages.

To begin, I provide a history of NV Energy. This provides context as to why NV Energy had high-stakes in how Nevada regulated of solar energy. Afterwards, I explain my method, dramatism. It forms the basis for my analysis of the ideological orientations towards solar energy contained within NV Energy's discourse. I analyze the pre-controversy report NV Energy provided to the PUCN because the report presented NV Energy's preference for Nevadan energy policy. Then I analyze communication that occurred during the controversy by examining two NV-Energy funded commercials that aired during the controversy.

I find that NV Energy's report to the PUCN was motivated by realism. NV Energy emphasized how energy policy would positively or negatively affect Nevada. By describing Nevadan Energy policy in narrow terms of how it affected utility bills, the realism functioned to deflect a consideration of how the State's energy policy would affect the environment. I find that the two commercials were motivated by mysticism. They emphasized how solar companies had a nefarious purpose behind wanting the restoration of solar incentives—they wanted to take money from Nevadans. By narrowly confining the restoration of solar incentives to solar companies, the mysticism functioned to deflect a consideration of what other purposes other people or groups would have in wanting to restore net metering.

A Brief History of NV Energy

I present a brief history of NV Energy to provide context for understanding the company's communication within the solar controversy and why it was heavily vested into the status of solar energy in Nevada. Furthermore, this history also provides context towards understanding NV Energy's communicative opportunities and constraints within the controversy.

NV Energy originated in 1929 as Southern Nevada Power when Las Vegas's power and telephone utility company split (Covell & Laszewski, 2014). By 1937 Southern Nevada Power serviced all of Las Vegas' electricity needs through the power generated by the Hoover Dam (Covell & Laszewski, 2014). Due to an influx of soldiers training at Nellis Air force Base during WW2, Nevada's population increased (Covell & Laszewski, 2014). As the company began to grow to meet Nevada's increasing energy needs, it substantially transformed Nevada's power infrastructure by constructing electricity generation plants and electricity transmission lines (Covell, & Laszewski, 2014). By 2008 it had changed its name to NV Energy (Covell & Laszewski, 2014). NV Energy profits regularly increased as it began to manage growing amounts of electricity. After merging with MidAmerican Energy, a subsidiary of the national conglomerate Berkshire Hathaway (Business Wire: A Berkshire Hathaway Company, 2013), NV Energy was no longer just a state utility; it became a continuously expanding energy corporation. In 2016, NV Energy provided power to 1.2 million customers and over 40 million tourists (NV Energy, n.d.a). Its annual financial reports indicate that it made 341 million dollars in net revenue (Berkshire Hathaway Energy Corporation, 2017).

As both part of a large business conglomerate and a utility, NV Energy has two basic goals: sustain profits for its shareholders and provide stable, reliable electrical services for its

customers. When an NV Energy Customer owns solar panels, the energy the panels generate impact both goals. Therefore, the solar incentives that enabled and encouraged NV Energy customers to install solar systems on their homes were policy issues of interest and concern for the utility. To understand how solar energy affects NV Energy is to understand its effects on NV Energy's basic business model. This model consists of operating and maintaining the electric grid that provides power to NV Energy customers. NV Energy generates its own electricity via power plants, the electricity travels to customers by traveling through transmission lines, and afterwards the electricity is distributed to electricity customers as they need it (Lateef & Reyes, 2017; NV Energy, n.d.b). The utility makes a profit through charging its customers for the electricity.

However, the utility does not have free reign to determine its electricity rates. As a public utility, NV Energy's profits are regulated by the state government. The Public Utilities Commission of Nevada (PUCN) determines these rates as part of a formalized, bureaucratic process that is outlined for the public on its website (State of Nevada Public Utilities Commission, 2016). While the process is complex, it centers around two guiding philosophies. First, utilities need to make enough profits to encourage capital investors to continue supporting the utility. Second, rates should be in the interest of all utility customers. Only the PUCN can approve any rate changes proposed by a utility to ensure the utility does not engage in unfair or prohibitively expensive pricing for its customers. Overall, the PUCN bases its decisions to change rates on "historical [utility] costs, not future projections" (State of Nevada Public Utilities Commission, 2016, p. 1).

Because historical costs primarily determine NV Energy's electricity rates, customer-generated solar energy was a large concern for the utility. In general, as solar customers began

generating solar energy, they used less of NV Energy's energy and paid less money to NV Energy. While solar panels had been installed in Nevada since 2004 (NV Energy, 2016b), the solar industry was expanding in an unprecedented manner. The cost to install solar panels largely decreased by about 50% between 2013 and 2015 (Solar Energy Industries Association, n.d.). In those same years, solar system installations nearly tripled in Nevada (NV Energy, 2016b).

NV Energy needed to monitor this proliferation because of how customer-owned solar energy affected how NV Energy's expected profits. First, when a utility customer installed solar panels, the solar energy produced by the panels replaced energy that would have otherwise been purchased from the utility (NV Energy, n.d.b). Therefore, as the number of customers who installed solar systems on their roofs increased, the less revenue NV Energy could make from these customers. Second, and most importantly, NV Energy operated under a state-regulated net-metering policy. Net-metering was a policy that required NV Energy to provide solar customers with electricity credits for any excess energy their solar system produced (NV Energy, n.d.b). If a customer produced more energy than they used during the day, NV Energy was required to purchase that electricity from solar customers at the same rate it charges them.

NV Energy thus had much to gain or lose in the solar controversy. When its customers chose solar energy, they paid less on their utility bills and contributed less to NV Energy's revenue. NV Energy's ability to manage its revenue and potentially adjust its rates largely hinged on the expanding solar market. If solar incentives persisted and NV Energy did not successfully change its rates, it would make less revenue for its investors. Thus, it follows that NV Energy would work vigorously to preserve its revenue stream. When the Nevada State Legislature required that the PUCN reconfigure net-metering incentives (Nevada State Legislature, 2015), NV Energy took action. Advocating on its own behalf, it presented a technical report that made a

case to restructure and reduce net-metering policies for those who had solar panels, thus limiting their accessibility and proliferation (NV Energy, 2015).

This need to protect revenue was a catalyst for the solar controversy. The PUCN based its decision to lower Nevada solar incentives by restricting net-metering upon the information provided within NV Energy's report. Thus, the first text from NV Energy I address in my rhetorical criticism is this very report.

Rhetorical Criticism

As discussed previously, I employ dramatism as my rhetorical critical method. In line with my earlier rationale, I analyze this report based upon Burke's argument that all communication is a symbolic process (1949), as well as how humans both shape and share their perceptions of the world through language (Smith & Hollihan, 2014). Because dramatism views situations as dramatic events, examining how communicators emphasize certain aspects of these events reflects how they symbolically construct them. When one aspect controls another it reveals reveals "a preference for one aspect of the situation over others" (Bloomfield & Sangalang, 2014, p.144).

NV Energy's Request to the PUCN

I center my analysis of NV Energy's report on the summary section. It provided a clear depiction of NV Energy's request to the PUCN, and it can be mapped-out onto Burke's pentad as a dramatic situation. First, NV Energy's request focused on a proposed *act*, a redesign of net-metering that would reduce net-metering solar incentives. It was labeled as NEM2, while previous net-metering incentives were labeled NEM1. NEM1 allowed customers who generated energy with their solar system to sell that energy back to the utility at the same rate that they pay for electricity. NEM2 aimed to replace NEM1 and decrease the rates for which solar customers

paid for energy. NV Energy is the agent, as they would carry out the changes if accepted by the PUCN. The *scene* is the current and future state of the Nevadan energy landscape and its residents who use electricity. This is because the redesign would change Nevada's energy circumstances through a new energy policy that would change how people could obtain and pay for energy. The *agency*, or how the act will be carried out, is through the PUCN adopting NV Energy's proposed rates and changing the law. NV Energy stated that the *purpose* was being fair to all customers of NV Energy, solar-generating and non-solar generating alike. Specifically, NV Energy wanted to stop those who did not have solar energy from paying extra on their electricity bills. They argued that NEM2 would eliminate the higher utility bills non-solar customers paid to offset the current costs of maintaining NEM1.

The controlling element of the pentad expressed in the discourse was the *act*. The summary section communicated an act: scene ratio—how NEM2 (*the act*) would shape and effect Nevada (*the scene*). The summary argued that NEM2 “reduces the shifting of costs from customer-[solar] generators to the companies' other customers... To be clear, however, customers who choose to install renewable [solar-generation] can reduce their power bill under NEM2 rules and rates” (p. 6). This communication draws attention to how the effects of NEM2 would transform the scene, benefiting both solar and non-solar customers of NV Energy. Thus, the act of changing future net-metering incentives was explained in terms of how it could transform Nevada's energy policy—how changing incentives would reduce cost-shifting, but it would still allow solar customers to pay less on their power bills.

Furthermore, the act asserted influence over the scene because NV Energy presented it in terms of how it rectified the past problems of NEM1. NV Energy stated that the previous net-metering incentive structure caused solar-customers to not pay their share of the costs needed to

manage the electricity grid. Thus, NEM1 created an environment in which non-solar customers needed to pay more on their bills to cover those forgone costs. The new structure would rectify this new, undesirable scene by increasing the fees for solar customers to prevent the cost-shift. Moreover, the plan would allow all customers to opt-into a demand charge. The demand charge would consist of charging customers more for energy during periods in which consumers use the most energy (e.g., the middle of a hot summer day) and less during periods of low energy consumption. This was meant to allow solar customers to offset their extra fees by using their own electricity during peak demand periods. This would result in using less of NV Energy's electricity. In other words, NV Energy would not be required to buy electricity back from solar customers at the same rate they sell it. Instead, NV Energy would begin charging solar customers more to produce energy during the day and less to produce energy at night. This would shift how solar was incentivized by encouraging solar customers to rely on their solar system during the day

The act's influence on the scene also extends to influencing purpose and agency. The first heading of the report's summary was, "NV Energy's Standard and Optional NEM2 Offerings Promote Customer Choice and Treat all Customer's equitably" (p. 6). This summary spells out how the energy landscape NV Energy would promote fairness and choice. For purpose, the report expressed fairness as a quality of the scene. The report framed fairness as equitable treatment of customers in which electricity rates "reflect the cost of providing electric service... to customers who install [solar panels] . . . and eliminate the unreasonable shifting of costs from customer-generators³ to other customers" (p. 6). The previous scene did not allow equitable treatment of customers. Solar customers were not charged solar rates that reflected the cost of

³ Customer-generator is a term used to signify a utility customer who generates a portion of his or her electricity through net-metered solar systems.

providing them electricity. Moreover, the report explicitly bemoaned that those without solar systems “should not have to continue to subsidize the cost of new [solar] systems moving forward” (p. 8). Thus, the report emphasized the power of the act by communicating that NEM2 had the power to transform the current scene into one where energy policy would be fair to all electricity customers.

The act also influences agency because NV Energy argued that NEM2 still allows for consumer choice within the new, fair scene. The report recognized the benefits of solar energy and thus was designed with two options for solar customers. The act was described as allowing “customer-generators the opportunity to optimize” their solar systems (p. 6). This is because NEM2 permitted customers to opt-into the optional billing structure where using less energy during high energy periods (the demand charge mentioned previously).

Overall, NV Energy’s communicated emphases reveal an underlying preference for the social orientation of realism: promoting a society that makes decisions based upon what the results of our actions are (Brock, 1965). More specifically, as a social orientation, realism contends that society should evaluate acts based upon what they do (i.e., improving the scene, promoting equality, and preserving choice). Actions and their material implications are the preferred aspects of examination in decision-making. Thus, NV Energy, by focusing upon the consequences of implementing NEM2, communicated a preference for evaluating the policy in terms of what it would accomplish for energy consumers.

Most tellingly, the executive summary began with a single page that read “narrative” (p. 2). Burke (1945) contended that dramas are social constructions of the world. They contextualize situations by creating a story. It is in the word “narrative” that NV Energy implied implementing NEM2 required understanding Nevada energy policy as a dramatic event. Dramas frame acts in

terms of who completed them, where they were completed, for what reasons, and through which means they were completed. In the narrative, NV Energy writes:

NEM2 rules and rates proposed by NV Energy establishes a foundation upon which a long-term solution that furthers Nevada's energy policy can be built. The NEM2 rules facilitate the interconnection of additional renewable distributed generation... [and] better reflect the cost of providing service to customer-generators than the NEM1 rules and rates. The NEM2 rules and rates are just, reasonable and fair to all customers (p. 6).

Thus, NV Energy's request communicated how the *act* of implementing NEM2 would direct Nevada's energy future. Positive benefits would arise from the act's ability to transform an undesirable scene of NEM1 Nevada into a fair, choice-laden energy landscape.

Implications of the Act: Scene Drama

In this act: scene ratio, the way in which NV Energy communicated the scene is important. This is because the shaping of the scene contributes to understanding what NV Energy believed NEM2 affected. Burke (1978) argued that our discourse creates a "circumference," (p. 333) a scope in which to consider the scene. In this discourse, NEM2 was to occur within Nevada. More specifically, it was to occur within the narrow scope of customer's electricity bills. This is important because a broader circumference would require the act to be evaluated for its impacts upon more scenic elements. For example, renewable energy policies will always, at some level, impact environmental health (e.g. it reduces the dependence on fossil fuels and their corresponding greenhouse gas emissions). Yet, this did not need to be addressed or considered because NEM2 was communicated in terms of a narrower circumstance of consumer interests. The scene was communicated as the energy policy that caused solar customers to pay less than non-solar customers. This explains why NEM2's environmental

benefits were not expressed. What NEM2 would do in terms of the environment was not relevant to the chosen scene. They constructed a scene in which the environment at stake was not the actual environment, but an economic one. The scene was one of utility bills, marked by the need to be reasonably priced and fair. Lakoff (2010) succinctly described this way of framing the environment: “the natural world is a resource for short-term private enrichment” (p.77). The way Nevada could harness solar energy was framed through viewing the sun as a resource that could economically benefit or hurt Nevada (based on how the sun is utilized).

Not only did the narrowly circumscribed scene cause realism to be used in specific ways, dramas rooted in realism deflected other preferences for evaluating actions. This is because ratios are “selections of reality... and any *selection* of reality must, in certain circumstances, function as a *deflection* of reality (Burke, 1945, p 59). For example, a purpose: act ratio preferences mysticism (Burke, 1949). In this preference, the purpose and intention behind an act drive how it should be evaluated. If NV Energy’s drama emphasized humanity’s purpose as stewardship of the earth, NEM2 would be evaluated for how it would fulfill that purpose. This purpose could affect how the scene is circumscribed. The environment would become a quintessential part of the scene.

The goal of a dramaturgical analysis is not necessarily an evaluation. Instead, a dramaturgical analysis functions to reveal the motives present in discourse. Yet, as I have just outlined, the NV Energy report presented a prominent act: scene ratio that overtook other ways of viewing Nevada energy policy. Thus, my evaluation of this preference is not that it is necessarily positive or negative, but that it is very restrictive, especially in its exclusion of environmental influences as part of the story of Nevada’s energy consumption.

Realism is grounded in the results of actions, and State legislators required the PUCN to take action—to create a new net-metering policy. So, it follows that NV Energy’s report focused on the results of enacting NEM2. My critique of the communication is that focusing on one action within one narrowly described scene (utility bills), created a drama that oriented stakeholders to evaluate the action of NEM2 upon utility bill rates, and not much else.

NV Energy’s Evolving Communication: Citizens for Solar and Energy Fairness

After the PUCN reviewed NV Energy’s report, it adopted a modified version of NEM2 (State of Nevada Public Utilities Commission, 2015). In this version, new solar customers would pay the extra charges proposed by NV Energy to offset non-solar customer’s costs. However, the PUCN’s ruling also applied these new charges to customers who bought solar in the past. Thus, NV Energy’s proposed distinction of keeping NEM1 rates for prior solar customers and creating NEM2 rates for new solar customers was not implemented. Public outcry was immediate and reached national news. *The New York Times* called Nevadans the victim of a “bait-and-switch” (Leslie, 2016, para. 3). Nevadans who bought solar-energy, allured by cost-reducing NEM1, were forced to pay unexpected fees after NEM2 was passed. While Nevada was not the first state to reduce net-metering incentives, it was the first to retroactively apply them (Trabish, 2016).

NV Energy, true to its narrative that it wanted a net-metering policy that treated customers fairly, addressed the controversy. NV Energy announced that their intention was never to have the retroactive rates apply. In January 2016, NV Energy issued a press release stating that they would petition the PUCN to reverse the decision to charge NEM1 customers extra fees (NV Energy, 2016a). While the PUCN would eventually agree to “grandfather” the NEM1 solar customers in September of that year, the interim period was highly controversial among the public (e.g. Weber, 2016; Whaley, 2015; Whaley, 2016b). During this time, NV Energy began

communicating in a new way. It funded over \$950,000 dollars to starting an organization that publicly communicated the dangers of subsidizing solar through net-metering policies (Rothberg, 2016a; Whaley, 2016b).

Citizens for Solar and Energy Fairness (CSEF) was a group made up of concerned “homeowners, small businesses... [and] your neighbors” (CSEF, 2016a, para. 2). As such, they expressed a belief that “solar should be sunny for everyone” (CSEF, 2016b, para. 3), but that solar companies wanted handouts and subsidies. Nevadans without rooftop solar would provide those handouts by paying more on their utility bills (CSEF, n.d.a). One CSEF spokesperson stated, “If the big rooftop solar companies get what they want, it would really hurt low-income families and punish those Nevadans who do not have solar panels” (Rothberg, 2016a, para. 3). Thus, solar would only be sunny for everyone if the public responded to NEM2 with calls to stop net-metering incentives.

CSEF communicated its messages to the public and Nevada policymakers by operating simultaneously as a grassroots campaign and a political action committee (Pyper, 2016). To communicate to the public, CSEF launched several commercials, a website, Facebook page, and Twitter.⁴ To communicate with the policymakers, CSEF enlisted the services of spokespersons from labor unions and public relation groups (Rothberg, 2016a). It was created to fully immerse itself within the solar controversy, communicating its message to policy stakeholders and the public.

Analyzing the Communication of Citizens for Solar and Energy Fairness

⁴ At the time of this writing, CSEF has purged deleted its content from these platforms. Only digital archives of the website are available. <https://solarenergyfairness.com> and its different pages are accessed through the internet archive service: WayBackMachine: <https://web.archive.org>

My analysis focuses on CSEF's public-facing communication and the ways in which it constructed a drama that framed how the public should evaluate the solar industry and public's request to restore NEM1. I argue that NV Energy created CSEF to promote its own interests in the solar controversy without presenting NV Energy as its public face. This allowed NV Energy a rhetorical affordance to promote its interests without speaking on its own behalf. Heavily funded by NV Energy, CSEF's communication was an extension of NV Energy. Yet, CSEF in no way claimed to be NV Energy. Peeples and Depoe (2014) argued that in matters of the environment and energy, corporations constantly find unique ways to make their voices heard in society. CSEF provided NV Energy an opportunity to have its voice heard through the mouthpiece of a citizen-group, rather than a corporation.

I conduct my rhetorical analysis of CSEF's communication by examining its television commercials. I identify the underlying motivations within the commercials by examining how CSEF's discourse framed the act of restoring solar incentives within a specific ideological drama. Specifically, I identify a drama that emphasized a purpose: act ratio. In this ratio, CSEF told a story of the solar companies' act of requesting the restoration of solar incentives being motivated by their hidden agenda (*the purpose*). This ratio can be identified in the commercials *Asking* and *Can't Afford That*. Both commercials found fault with the solar industry's request to restore incentives (*the act*) because they were lying about the true reason (*purpose*) they were making the request: money. The commercials emphasized a hidden, nefarious purpose—to charge Nevadan residents more money on their electricity bills to subsidize solar industry profits. Thus, the purpose: act ratio suggested that the public should negatively evaluate the solar companies request to restore incentives, because the solar companies' purpose was malevolent and unfair.

Asking (CSEF, n.d.a) subsumed the issues surrounding solar controversy under accusations that solar companies were intending to “pocket” the money of Nevadan residents. The commercial immediately focused on the nature of solar companies, showing two large buildings towering in California with cash raining down upon them. As the commercial progressed, a narrator clearly explained how the public should view the requests of solar companies:

One billion dollars in new subsidies, that’s what out-of-state companies SolarCity and SunRun are asking Nevadans to give them. *This isn’t about energy choice, it’s about money* (emphasis added). Nevadan families would be forced to pay more to subsidize their profits.

Providing incentives to solar companies was not about Nevadans having a choice in how they power their homes. Rather, it was about a desire for profits and the ability to “walk away with the cash.” Solar Companies wanted incentives because they desired profits, and that was wrong in CSEF’s story because it disadvantaged Nevadans. Through this commercial, CSEF communicated that it was wrong for out-of-state solar companies to masquerade their purpose as a desire to promote energy choice. Instead, solar companies’ hidden purpose was to exploit Nevada’s energy policies for the purposes of taking money from Nevadan families.

Can’t Afford That (CSEF, n.d.b) traded the images of money flowing from Nevadan families to solar companies for the testimony of seven “Real Nevadans.” These residents argued that solar companies had already received “tens of millions of dollars in subsidies. It’s time they make it on their own.” This implied to the audience that there was no justifiable reason for solar companies to want subsidies since they had received so many already. Then, they argued, “Why do they need subsidies from us? If they get their way, we’ll all have to pay. *This isn’t about*

choice, it's about money (emphasis added) ... That's crazy". Like *Asking, Can't Afford That* attempted to orient the audience to evaluate the solar companies request for incentives in terms of their unethical desires. In both commercials, the story CSEF told paints the solar companies' proposed purpose, promoting energy choice, as a cover for their real purpose of obtaining further subsidies and profit on the backs of Nevadans. Thus, *Can't Afford That* suggested that its audience consider the bad effects of the act, but primarily focus on the solar industry's selfish purpose to obtain more money despite the bad effects repealing NEM2 would have.

Overall, the purpose: act ratio framed the evaluation of net-metering energy policies based upon the reasons for which they are proposed. Specifically, this orientation corresponds to the ideology of mysticism (Burke, 1945), which is often constructed on religious or moral grounds (Brock, 1965; Burke, 1945). Humanity's actions are good when they align with moral goodness or divine instruction. In CSEF's drama, the solar companies request was bad because it fell in line with dishonesty and moral questionability. Thus, the CSEF commercials communicated moral goodness as the suggested evaluative framework for whether to accept or reject the act of restoring incentives.

Through this specific framework, other ways of evaluating the restoration of incentives were deemphasized. First, how the drama communicated the agent restricted how purpose could be attached to the act. Specifically, the *agent* was narrowly defined as the solar industry. Thus, the purposes attached to the act were that of the companies. An alternative depiction of agents may have included that other agents were requesting to restore incentives. For example, Senate Majority Leader Harry Reid echoed the request (Rothberg, 2016b), and polls showed overall public support for the request (Snyder, 2016). If these co-agents had been included as agents in the narrative, then their potential purposes would need to be considered and evaluated as well.

Analysis and Implications of the Two Dramas

I argue that the difference between NV Energy's report and CSEF's commercials demonstrated an ideological shift in NV Energy's dramatic portrayal of solar incentives. This forms the basis of my efforts to identify the rhetorical implications of NV Energy's communication. NV Energy communication examined two related acts—the reduction or restoration of net-metering incentives in Nevada. Yet, depending on the act in the story and the storyteller, NV Energy communicated different but compatible emphases on how society should consider the solar controversy. In NV Energy's request to reduce net-metering incentives, NV Energy was the agent, and its communicated preference for evaluating its actions was the consideration of how the act would impact Nevada (an act: scene ratio). In the CSEF commercials, solar companies were the agents, and the communicated emphasis for evaluating their actions was the purpose behind their desire for incentives (a purpose: act ratio).

There are two rhetorical implications I address. First, these distinctions illustrate how a corporation's communication selects dramas that may impact how its audiences navigate and evaluate issues of uncertainty. As I previously mentioned, particular selections of reality function to deflect other selections of reality (Burke, 1945) NV Energy's selections implied choices, and, more importantly, implied which choices not to select. NV Energy's report implied the selection of acts that have positive impacts upon the scene as it communicated realism. Much differently, CSEF's commercials implied not selecting acts backed by an immoral purpose as it communicated mysticism.

To elaborate, dramas function to present selections of reality that direct audiences to define problems and evaluate solutions based upon their respective emphases (Brummett, 1979; Knuepper, 1979; Ling 1970). Foss (2004) described this property of dramas as ideological. They

suggest “how we are perceiving [the world], the choices available to us, and the action we are likely to take” (p. 384). In other words, each drama, as it presents a preferred a social orientation, presents a preferred ideology. These ideologies were suggestive in the solar controversy because they functioned to direct how audiences should evaluate net-metering. Thus, NV Energy’s report directed positive evaluations NEM2’s by emphasizing its positive benefits unto the scene under an ideology of realism. Meanwhile, the CSEF commercials directed negative evaluation of the restoration of incentives by emphasizing its negative purpose under an ideology of mysticism.

Ultimately, examining NV Energy’s construction of two dramas shows the motivations and orientations contained within its discourse. In both dramas, NV Energy had the underlying goal of reducing net-metering incentives. However, despite this same goal, two different dramas emerged depending on the intended audience of the communication. In the technical request, NV Energy constructed a drama rooted in realism, suggesting to Nevada policymakers that passing net-metering reductions should be based upon the effects. In the CSEF commercials NV Energy constructed a drama rooted in mysticism. Directed to the public, the commercials suggested that Nevada should maintain net-metering reductions should be because it was wrong for immoral solar companies to affect society.

I argue that each drama’s pentadic emphasis reflected specific rhetorical constructions of the world that correspond to the designated audience, the PUCN and Nevada public respectively. The second implication is that the corporate construction does not only include *what to emphasize*, but also *through whom to emphasize*. NV Energy recognized that it needed to speak through different channels depending on which audience and which drama it utilized. I argue that this is related to the management of ethos (credibility). This is because ethos is earned by meeting the standards of credibility expected by the audience (Prelli, 1989). For example,

scientists often utilize technical reports to appeal to policy makers and use more informal means (e.g. interviews and internet blogs) to appear credible to the public (Walsh, 2013).

This specifically applies to how NV Energy communicated to the public and reinforces previous research that suggests corporations recognize that the public is wary of corporations communicating on their behalf regarding matters of public policy (Bsmuk, Schneider, Schwarze & Peeples, 2014; Pezzullo, 2003). For example, if the CSEF commercials were instead clearly marked as “funded by NV Energy,” NV Energy would subject themselves to the same criticism that they levied towards the solar industries—that corporations may act immorally. The communication would invite the public to evaluate NV Energy’s request to not restore incentives based upon what purposes NV Energy might have to prevent them.

NV Energy’s communication demonstrates that corporations may utilize different channels in their efforts to construct different dramas. In both its official request and commercials, NV Energy essentially argued for reduced solar incentives. Yet, NV Energy’s two dramas were spoken by different voices. First, NV Energy communicated on its own behalf to argue that the PUCN should evaluate NEM2 based on how it would impact society. As NV Energy began communicating to the public, it spoke through CSEF. Since the commercials communicated asked the public to evaluate policies based on corporate intentions, it makes sense that NV Energy did not use its own voice in these commercials. This communication tactic reflects two common corporate communication strategies: astroturfing and corporate ventriloquism (Bsmuk, Schneider, Schwarze & Peeples, 2014). Astroturfing consists of simulating a grassroots campaign that appears non-partisan but is industry-affiliated and promotes corporate goals. Corporate ventriloquism is when corporations project their voices onto citizen-based groups “to create the impression of broadly based [public] support” (Bsmuk,

Schneider, Schwarze & Peebles, 2014, p. 22). My dramatisic analysis recognizes these strategies exist and looks at the underlying ideologies within different types of corporate communication.

Conclusion

The purpose of this chapter has to been to better understand the motivations and underlining social orientations contained with NV Energy's solar controversy discourse. However, evaluation is also in order. This occurs through examining the dramas in the greater context of the solar controversy. By analyzing how the dramas existed within these contexts, I assess how these dramas contributed to how policy makers and the public could make sense of net-metering incentives. Namely, the dramas served to establish a narrow, financially centric scene that distracted from the ever-pressing need to consider how our energy policies affect our planet and climate as a whole.

As I detailed previously, each drama encouraged a specific ideology and circumscribed specific boundaries as they defined the elements of the pentad. My evaluation deems that both dramas too narrowly defined the scene as a revolving around utility bills and the monetary issues that surround them. Thus, both dramas constrained how the public and policy makers could perceive the context of situations that made up the net-metering policy. In NV Energy's report, evaluating the effects of NEM2 required understanding how NEM2 would affect utility bills. In CSEF's commercials, solar companies would be judged for their purpose towards both obtaining money and treating the earth. If the dramas constructed a more robust scene that also featured the earth's environment, effects and purposes would have expanded. The very important considerations of climate change, fossil fuel pollution, and creating a better environment were not considered in either drama because of the narrowly drawn scene.

Ultimately, society's understanding of the Nevada solar controversy hinges on its ability to recognize and carefully consider the motives contained within discursive dramas.

Corporations will continue to develop new and increasingly nuanced ways of communicating to the public and policy makers. Whether the communication originates directly from a corporation or is concealed through strategic means, each communicative act can still be seen as part of a dramatistic construction of reality. Thus, while messages may change, society can still maintain that all symbolic communication is built upon a foundation of underlying orientations. In issues of public contention, like the solar controversy, it is important to recognize that communication from various stakeholders contains differing motives and ideological orientations, which may differently constrict opportunities for public deliberation. Considering the existence of multiple dramas as multiple selections of reality allow for a greater public recognition of the multiplicity of ideas and perspectives contained within public controversy discourse.

Chapter Four:

SolarCity's Bring Back Solar Alliance: Complimentary Realism and Pragmatism

NV Energy was not the only stakeholder to launch a vigorous public advocacy campaign during Nevada's solar controversy. As NV Energy's Citizens for Solar and Energy Fairness (CSEF) was attempting to persuade the public to support decreased net metering incentives, the company SolarCity simultaneously launched the Bring Back Solar Alliance (BBSA). BBSA aimed to persuade the public that net metering incentives should be restored to their original rates. The group used a wide variety of communication channels, including a website (Bring Back Solar Alliance, n.d.a) a Facebook page,⁵ a Twitter page (Bring Back Solar Alliance, n.d.b), and organized rallies at the Las Vegas Public Utility Commission of Nevada (PUCN) office (Whaley, 2016).

In this chapter I conduct a dramatistic analysis of BBSA's public communication. The purpose of this analysis is to uncover the underlying motivations that form the base of BBSA's public appeals to bring back solar net metering. To conduct this analysis, I first provide contextual information regarding SolarCity. I examine SolarCity's origins, the factors that led to it becoming the leading solar industry in Nevada, and its involvement in creating BBSA. Then, I discuss BBSA's main goal, the restoration of previous net metering incentives, as well as how the organization sought to achieve this goal by enlisting Nevada residents to become political advocates. This context is important because it established how SolarCity became a stakeholder in the solar controversy and why it would enact efforts to shape the public's opinion of net metering. This context also illuminates why BBSA's efforts consisted of creating a large online presence and physical public presence in Nevada.

⁵The Facebook page was no longer active at the time of this writing.

After providing context, I briefly re-introduce dramatism as a rhetorical critical method for examining communication. This orients how I examine the communication of the BBSA. Specifically, I justify the rhetorical texts I have chosen for their explicit discussion of two acts: the reduction of net metering incentives, and the restoration of the net metering incentive to bring back solar. Because the act is the central term in any drama (Burke, 1945), I discuss how I have selected the texts that highlight BBSA's depiction of these two, foundational acts in the controversy and the pentadic terms that influence and are influenced by them, through an agency: act and act: scene ratio, respectively. I discuss the BBSA's website, public videos, and social media posts for how they reveal two underlying social orientations. I argue that the reduction of net metering incentives is communicated through an orientation of realism. Bringing back solar is communicated through an orientation of pragmatism. Additionally, I examine what each orientation implies about BBSA's communication within the solar controversy.

To conclude this chapter, I provide a brief discussion of how both dramas existed together. I argue that BBSA's negative depiction of the PUCN's decision to reduce net metering incentives consequently served as a way to positively depict the restoration of incentives. Because the restoration of incentives was dramatically framed as positive, the BBSA could emphasize the means to achieve the restoring net metering incentives when they discussed bringing back solar. This analysis suggests that the construction of complementary dramas occurs in public controversies as a way to socially construct issues of contention.

SolarCity: A Brief History

SolarCity is a relatively new company that was founded in California in 2006 (SolarCity, n.d.a). This was the same year the United States government issued the Federal Investment Tax Credit (ITC) for solar energy (Solar Energy Industries Association, n.d.) Administered by the

IRS, the ITC is a corporate tax credit in the sum of 30% of the total cost of solar energy projects. (United States Department of Energy, n.d.). This means that any person or corporation who pays for the cost of a solar system, receives 30% of the price of the solar system as a tax break on federal tax returns.

The ITC allowed SolarCity to capitalize on a specific business model. First, SolarCity would first find corporate investors to pay the up-front costs of constructing expensive solar systems for SolarCity customers. Then, these investors would invest hundreds of millions of dollars into the company, receive tax breaks, and eventually receive a positive return on their investments during the lifetime of the system (St. John, 2012). In this model, SolarCity would charge the customers for the power produced by the system, but not the actual price of the system. Specifically, SolarCity's business model consisted of having customers enter into a Power Purchase Agreement (PPA), in which customers would pay a lower rate for solar electricity than they would pay for electricity obtained from their respective utility companies (SolarCity, n.d.b). In general, the money gained from charging customers for solar electricity would cover operation costs and paying back investors. In this model, SolarCity also capitalized on net metering incentives, which allowed customers of SolarCity to sell excess solar power back to their utility. SolarCity found that many states' recent enactment of net metering legislation allowed their business model to flourish (Marshall, 2006).

Importantly, several states legislated the net metering incentives (Carley & Davies, 2016) that seemed to be necessary for SolarCity to operate. On average, solar systems produce 20-40% excess power during the day (Solar Energy Industries Association, n.d.). Without net metering policies, this energy is not required to be purchased by the utility. As a result, 20-40% of a solar

system's generated electricity would have no value to the customer because it is not needed to power the home and cannot be bought by the utility.

As SolarCity's business grew, it began operating in several regions across the country (SolarCity, 2016a). Hoping to attract the company to Nevada, the Nevada Governor's Office of Economic Development awarded SolarCity \$1.2 million to open an operations center in the state (Velotta, 2013). In August of 2013, SolarCity opened a headquarters in Las Vegas (Totten, 2013), and one year later, the company opened its first Nevada warehouse in Henderson (SolarCity, 2014). By May of 2015, SolarCity opened a second warehouse in North Las Vegas and retained over 1,000 Nevadan employees in total (SolarCity, 2015). Alongside SolarCity's entrance in Nevada, factors such as up-front cash incentives and the net metering policy caused Nevada to have the third most solar installations of any state in 2015 (Solar Energy Industries Association, 2015).

SolarCity was at the forefront of these efforts. While the company did not publically disclose how many solar systems it installed in Nevada, SolarCity was the leading solar provider in the country. By December of 2016, SolarCity had installed over 160,000 residential solar projects in the United States, with its second closest competitor installing 60,000 projects (Gross, 2016). SolarCity was on track increase its presence in Nevada, opening a national solar installation training center in December of 2015 (SolarCity, 2016d), just weeks before the solar energy would radically change. When the PUCN reduced net metering incentives, the installation of new solar systems dropped by 99% (Bring Back Solar Alliance, n.d.a).

SolarCity and the Nevada Solar Controversy

Despite the potential for continued growth of Nevada's solar industry, the PUCN's December 22, 2015 decision to reduce net metering incentives for all solar customers in Nevada

(State of Nevada Public Utilities Commission, 2015) drastically halted the growth of Nevada's solar industry. The reductions of net metering incentives made it economically unfeasible to sell solar in the state (Gross, 2016). As a result, many solar companies, including SolarCity, ceased their operations in Nevada (Whaley, 2016). Local and national media outlets covered the details and effects of the PUCN's decision to reduce net metering (Leslie, 2016; Weber, 2016; Whaley, 2016c). Thus, the Nevada public was subject to a solar controversy—public discussion and deliberation about if the PUCN's decision should be reversed.

While SolarCity as a company publically condemned the PUCN's decision, the focus of this chapter is on how SolarCity created the Bring Back Solar Alliance (BBSA) to communicate to the public during the solar controversy. BBSA operated as a political action committee (Rothberg, 2016), funded by over \$2 million from SolarCity (Rindels & The Associated Press, 2016), the group's lone funder (Rothberg, 2016). Despite BBSA originating from SolarCity, BBSA publically described itself on its website as “a diverse coalition of Nevada citizens and over two dozen small businesses, non-profits, and community groups” (Bring Back Solar Alliance, n.d.a, para. 1). Below this description appeared the logos of several solar companies and grassroots organizations such as The League of Women Voters and Conservatives for Energy Freedom. Overall, BBSA appeared to be an extension of SolarCity. While it was a political action committee that received its funding from SolarCity, it sought to appear as an authentic grassroots campaign by attracting several grassroots campaigns to unite underneath it. Thus, BBSA was SolarCity's public advocacy initiative.

The goal of the organization was in its name. BBSA wanted to *bring back solar* to Nevada. More specifically, the company poignantly framed the problem that it wanted to solve. The BBSA website stated:

Last December, the Public Utilities Commission placed discriminatory charges on rooftop solar customers, increasing their utility bills by 50%. In an unprecedented move, these new charges were also imposed on the 30,000 Nevadans who had already invested in solar. This rate hike wiped out the independent solar economy: rooftop solar applications have fallen 99%, putting thousands of Nevadans out of work. Our coalition is fighting to put consumers ahead of the monopoly utility company by restoring rules that allow rooftop solar to compete, protect existing rooftop solar customers, and allow Nevadans the freedom to choose clean energy. (Bring Back Solar Alliance, n.d.a, paras. 2-3)

In summary, BBSA opposed the PUCN's rate change because it destroyed the independent solar industry and felt that it favored the monopoly utility company, NV Energy. BBSA thus wanted to restore net metering incentives in Nevada and restore the solar industry's presence in the state.

Rhetorical Criticism

I employ Burkean dramatism to uncover the motivations and social orientations contained within BBSA's public-facing communication. In this analysis, I analyze how BBSA constructed dramas in its public communication of two *acts*. First, I examine how BBSA framed the PUCN's decision to reduce net metering incentives. Second, I examine how BBSA framed the restoration of solar incentives. Specifically, I detail how each act is communicated through a different dramatic ratio. The PUCN's decision is communicated through an act: scene ratio rooted in the social orientation of realism. The act of restoring solar incentives is communicated through an agency: act ratio rooted in the social orientation of pragmatism. Afterwards, I evaluate each drama for its respective implications about Nevada's public communication regarding energy policy.

The PUCN's Reduction of Net Metering Incentives

The BBSA often discussed PUCN's reduction of net metering incentives, and it specifically focused on the extra service charges the solar customers were required to pay as part of the reduction in net metering. It argued that these extra charges destroyed the solar industry in Nevada. In this section of my analysis, I examine how BBSA described the reduction to net metering incentives on its website and two of its YouTube videos, the "Bring Back Solar Kickoff Ad" (Bring Back Solar Alliance, 2016a) and "Nevada Needs to Bring Back Solar" (Bring Back Solar Alliance, 2016e). I argue that BBSA's communication emphasized the act of increasing solar rates in terms of their negative influence on the scene—the state of Nevada, Nevada's solar industry, and its residents' choice to obtain the energy they wanted.

To begin this section of my dramatic analysis, I return to BBSA's "About us" page on its website. Here I identify five pentadic terms. The *act* is PUCN's placement of "discriminatory charges on rooftop solar customers" (Bring Back Solar Alliance, n.d.a, para. 2). The act is further defined as a 50% increase in all current and future solar customers' utility bills. The *scene* is Nevada and its energy landscape. Specifically, BBSA's drama portrayed a scene in which solar energy, solar energy jobs, potential for solar energy, and energy choice are gone. However, it also described a scene in which a monopoly utility company is favored more than consumers. The *agent* committing the act is the PUCN. The *agency* through which the act occurs is the power afforded to the PUCN as a government agency to enact energy policy change. The *purpose* is not explicitly explained. However, BBSA implied that the purpose was to create a scene that benefited the monopoly utility company.

Within this drama, an *act: scene* ratio emerged. Ratios emerge when certain elements of the pentad influence others, creating "a preference for one aspect of a situation over others"

(Bloomfield & Sangalang, p. 144). As one term exerts influence over the others, the emphasis reveals how the drama symbolically constructs the world for the storyteller. In BBSA's drama, the *act* of increasing solar energy charges was viewed and evaluated in terms of how it completely transformed the *scene*; Nevada's energy policy landscape and the Nevadan residents specifically affected by the decision. This consisted of those who had solar energy who were paying more, those who worked in the solar energy sector that lost their jobs, and the solar industry that almost disappeared in Nevada.

As noted earlier, when the act is the controlling term, the corresponding social orientation is realism (Brock, 1965; Burke, 1945). This orientation evaluates the actions society takes based upon the effects of the actions. Additionally, as we have seen earlier, any emerging social orientation is a deflection of other possible social orientations.

Thus, BBSA's realism was a specific way of viewing the PUCN's rate hikes that functioned to deflect other ways of viewing the PUCN's rate hikes. BBSA's communication centered upon viewing the act in terms of how it affected Nevadan energy policy, the Nevada solar industry, and Nevada energy consumers. Different ways of evaluating the act would require the drama to emphasize another term over the act.

For example, the purpose in this drama is to preference NV Energy. If a *purpose: act* ratio emerged, than BBSA's discourse would reveal an orientation of mysticism. In this orientation, acts are evaluated by their adherence to guiding purpose, such as ethics or alignment with religious principles (Brock, 1965; Burke, 1945). Thus, the effects of increasing net metering charges would not be as important as understanding whether the increase itself aligned with a defined specific purpose. If purpose was the controlling term, then the PUCN's decision could have been described in terms of how it was influenced by its desire to bolster NV Energy.

Alternatively the PUCN's decision could be described in terms of how it fulfilled or failed to fulfill its obligations to Nevada. Therefore, the BBSA would have discussed the PUCN's purpose to "provide fair and impartial regulation of public utilities" (State of Nevada Public Utilities Commission, n.d.).

To further understand the emerging ratio of realism and its implications, I analyze two of the BBSA's social media videos that discuss the PUCN's decision. I've selected these videos because they clearly detail the PUCN's act. The first is the kickoff ad. This was a 30-second commercial which was published online shortly after the formation of the BBSA (Bring Back Solar Alliance, 2016a). BBSA's kickoff ad is important because it presented the drama in new and more specific ways than on the BBSA website. First, it expanded the scene. It began by placing the sun within the scene, "We've got almost 300 days of sun in Nevada, but we aren't allowed to use it". Here, Nevada was depicted as a state that contained a valuable resource but was unable to use it because of the PUCN's ruling. More importantly, even though the sun is part of the scene, it is not negatively affected by the act. Rather it is framed and valued as a resource for human benefit and not valuable itself.

Immediately afterwards, the agency of the act was redrawn and the act was intensified. "NV Energy just got the public utility commission to kill the nation's largest solar market". The lower rates were not created by the PUCN alone. Rather, they seem to originate from NV Energy's powerful agency and control over the PUCN. Also in this sentence, the act's impact on the scene is intensified; the act kills Nevada's solar energy market. This is important because it signifies the acts' severe effects upon the scene. The commercial concluded its description of the act by detailing how it was "taking away our freedom to choose what type of energy we want and taking away something else, thousands of jobs.

The second social media video I discuss is the video “Nevada needs to bring back solar” (Bring Back Solar Alliance, 2016e). This video is different from the commercial as it takes on a documentary-style approach towards a public protest of the decision. Within the video, several people appear in front of the PUCN’s Las Vegas headquarters to discuss the PUCN’s solar “rate hike.” The commercial first featured a solar customer, Mike, who introduced the consequences of the act. He stated that “what the public utility commission has done here has completely wiped out, has completely gone counter to federal policy.” The commercial proceeded to show two individuals who illustrated what exactly was wiped out. A solar customer, Vicki, speaks as a Nevada resident that was affected by the act. She stated, “I started hearing about this PUC⁶ decision, and all of a sudden I felt like I was losing a lot—just because I decided to put solar panels on my house.” Speaking in general terms, she represented how those who had chosen to go solar were harmed by the act. After Vicki, a solar worker named Frank continued the story. He stated, “I want to do my work. I am an engineer and that’s my passion. I want to build solar systems... solar in Las Vegas is a no brainer. It’s just ridiculous to discuss that at all.” Speaking as a solar engineer presumably out of work, Frank represented those working in the solar industry who lost their jobs. He implied that solar naturally makes sense, and even debating its existence was harmful. Thus, the PUCN decision would negatively affect a scene that included both solar customers and solar workers but did not inscribe the environment as part of the scene.

Analysis and Implications of the Act: Scene Ratio

BBSA’s drama specifically constructed a scene in which the PUCN’s decision is depicted through how it affected the solar industry. This is because the scene consisted of the following general elements: solar workers, the solar industry, and the option to purchase solar panels. By

⁶ Short for PUCN

emphasizing these elements, the drama specifically framed the act through a scene consisting the factors that contribute to Nevada's solar industry. Thus, I argue that in this act: scene ratio, the act was to be evaluated for its effects upon a narrowly drawn scene. The implications of this are that the drama created a contained, solar energy-focused scene in which energy policy acts are to be evaluated, such as the environmental landscape of Nevada.

Thus, the scene leaves out the environment. BBSA described Nevadan energy policy landscape is in terms of what exists within it—NV Energy, solar energy-producing electricity customers, and the solar industry. Thus, the scene lacks any description of how the PUCN's decision impacts environmental considerations such as fossil fuel dependency and its consequential pollution. Should the scene have been expanded, the discourse surrounding Nevada's energy policy rulings could consider the earth's well-being.

Ultimately, BBSA's discourse surrounding the PUCN's decision did not reflect the environment and environmental concerns. The PUCN's decision was communicated not an environmental decision, but rather an economic, industry-affecting decision. This has important implications for environmental communication. I contend that the dramatic emphasis within BBSA's discourse contributes to our understanding of how the environment is prioritized or deprioritized in matters of public policy.

Bringing Back Solar

In my analysis, I also examine a second act: reinstating solar incentives in Nevada. To do this, I examine the act for how it was presented across BBSA's website and Twitter account. Specifically, I examine communication that directly addressed the public regarding how solar could be brought back. I argue that BBSA, focusing on the power of Nevada residents to protest the decision and contact their senators, presented an *agency: act* ratio. This is because BBSA

communicated that the public demand of Nevada residents to bring back solar was the critical means that would enlist the PUCN and Nevada policy makers to reverse the PUCN's decision.

To begin, I describe how each element of the pentad was present in BBSA's description of bringing back solar. The *act* is the reversal of the PUCN's decision. BBSA stated that its goal was "restoring rules that allow rooftop solar to compete, protect existing solar customers, and allow Nevadans the freedom to choose clean energy" (Bring Back Solar Alliance, 2016a, para. 3). The *scene* is Nevada. Similar to the first act, the scene encompasses energy policy, individuals with solar panels, solar workers, and the solar industry. However, the scene is expanded here to involve bureaucratic proceedings. Those wanting to bring back solar were encouraged to "attend the [PUCN] hearings... and to write [their] state legislator and state representatives" (Bring Back Solar Alliance, 2016e). Thus, the scene here also involved influencing the spaces in which policymakers and the PUCN. The *purpose* is to allow for individuals to choose solar power by allowing the solar industry to exist in Nevada (Bring Back Solar Alliance, 2016a). The *agents* who can bring back solar are the members of the Nevadan public. They will bring back solar by influencing the Nevada legislators and the PUCN to reverse the previous ruling that harmed solar. *Agency* is thus expressed through the political activism and participation of individual Nevada residents. BBSA argued that individuals who supported the solar industry could not be ignored and would cause policymakers to react and thus be an extension of the public's agency. (Bring Back Solar Alliance, 2016b; Bring Back Solar Alliance 2016e). BBSA argued, "The solar rate hike limited our options. But together, we can make this right" (Bring Back Solar Alliance, 2016g). The public's agency would bring back solar.

Here, we can read BBSA's drama as promoting agency as the controlling term. Without individuals that supported solar energy using their voice to influence policymakers, restoring

solar incentives would not occur. More specifically, BBSA told a story by which other alternative means would be unsuccessful as restoring incentives. For example, the drama constructed closed-door policymaking as the means through which net metering was reduced in the first place. According to BBSA's kickoff ad, NV Energy's voice "got the public utility commission to kill the nation's largest solar market" (Bring Back Solar Alliance, 2016a). In BBSA's communication, it is the voice of solar supporters that would ultimately cause net metering to be restored, by matching NV Energy's voice with the voice of the people. One specific tweet represents this argument: "Utilities are losing the battle against solar energy, because consumers are fighting back (Bring Back Solar Alliance, 2016h). This tweet signified a contest between means, in which pro-solar consumers are using their voices to influence energy policy decisions.

To further highlight agency's role as the controlling term in BBSA's rhetoric, I examine the specific ways in which individuals within the solar community were encouraged to influence energy policy regulation through gathering in public spaces and using their voice to contact policymakers. In the video "Nevada Needs to Bring Back Solar," a solar worker provided ways for solar supporters to express their agency. He stated: "I'd like to encourage every person who is interested in solar power to *get involved* [emphasis added], to come to the hearings, to make your voice heard, to write your state legislators and representatives" (Bring Back Solar Alliance, 2016d). Here, the idea is actively using your voice (agency) as a solar supporter to influence policymakers to enact the restoration of solar.

BBSA also encouraged solar supporters to sign petitions and shared several petitions that allowed the public to urge energy policymakers to restore solar incentives. One campaign involved signing a petition requesting the Nevada Legislature to vote into law Assembly Bill 405

(AB405) (Bring Back Solar Alliance, 2016d). This was a bill signed by Governor Sandoval that would largely reverse the PUCN's decision (Groom, 2017). The promotion of this petition emphasized how the collective voice of numerous solar individuals would influence policymakers to bring back solar.

To summarize this emphasis on agency, I draw from a BBSA press release issued in September of 2016 (Bring Back Solar Alliance, 2016b). It was in response to a Nevada Supreme Court decision that struck down a potential ballot referendum that would let Nevada residents vote to restore solar incentives. BBSA reaffirmed the importance of individual's voices,

While we're disappointed that the Court ruled in such a way that the people of Nevada will not be able to vote on this issue, it clarifies the role Nevada's leadership must play in representing the majority of Nevadans... Working together with legislators, key stakeholders, and Nevada's hundreds of thousands of solar supporters, we look forward to crafting strong solar policies. (para. 1).

In this statement, the BBSA emphasized the agency of voting and speaking up. The Nevada Legislature had an obligation to honor its constituents—hundreds of thousands that actively supported solar. The discourse how the solar supporters' voices were critical components in the creation of strong solar policy.

Analysis and Implications of the Agency: Act ratio

When agency is the central term in a drama, the corresponding social orientation is pragmatism (Brock, 1965; Burke, 1945). Pragmatism emphasizes the means to an end, the ways through which results are met. Within BBSA's communication, the pragmatic orientation made public voice the essential means through which BBSA's goal could be achieved. Bringing back solar was achieved through public means. As mentioned in my discussion of realism, as dramas

construct specific selections of reality, they simultaneously deflect other selections of reality. With this in mind, BBSA's communication selected a focus of the public's participation in democracy as a means to restore solar incentives. This served to deflect a close consideration of what the act the people supported would do. Specifically, while the drama did list the positive effects of restoring solar incentives, evaluating the act was not the focus. Rather, the communication focuses on the means to achieve the desired act.

In examining pragmatism, I contend that the agency: act ratio made sense in BBSA's guiding narrative. This is because the goal of the organization was to achieve action and empower people. Thus, it follows that their underlying orientation was pragmatic, focusing on the best means to achieve the restoration of net metering incentives. The communication oriented the public towards having solar supporters express their agency, through petitions and protests, as a way to combat what BBSA viewed as a negative, detrimental, discriminatory act.

Conclusion

Ultimately, BBSA symbolically constructed the solar controversy through two complementary dramas. I contend that the drama surrounding the PUCN's decision to reduce net metering incentives oriented audiences to view the reversal of the decision as positive. By using realism to portray the PUCN's actions as negative, the reversal of the decision implied the restoration of the damaged energy policy landscape. This fed into the second drama that depicted the act of bringing back solar. Because bringing back solar was established as positive, the communication surrounding incentive restoration could focus upon the means through which to bring it back. The drama surrounding the restoration of solar incentives provided the means through which the negatively evaluated act could be reversed.

In conclusion, Burke (1945) argued that the all human communication contains dramas that reveal how we symbolically construct the world. My analysis in this chapter has detailed the unique ways BBSA communicated two mutually compatible dramas that reflected its overall orientations towards reversing net metering through empowering public action in its symbolic construction of the solar controversy. At its core, BBSA was an extension of SolarCity.

Chapter Five:

Implications of Nevada's Solar Controversy

My investigation into Nevada's solar controversy was motivated by my concerns for the environment. I conducted my research to better understand what the Nevada's solar controversy could reveal about environmental communication. I argued that even localized events are not self-contained. Rather, examining Nevada's solar controversy could contribute to a greater understanding of humanity's unending conversations about the environment and environmental policies.

As I conclude my thesis, I summarize the analysis contained within each chapter and discuss the broader implications of my research in its entirety. First, I return to my initial discussion of how institutions of power shape the public's knowledge (Condit 1994; Foucault, 1978). Then, I discuss why I chose dramatism as my rhetorical critical method. Afterwards, I draw two conclusions. First, I rely upon chapter one to discuss how policymakers seek knowledge and information to assist in the making of energy policy. I argue that the presentation of this knowledge and information is inherently rhetorical. This is because the presentation of data can be examined for how it emphasizes certain aspects of a situation. Uncovering the dramatic ratios within such presentations reveals the underlying social orientations that direct and guide public communication about and knowledge of environmental issues. This implies that the pursuit of knowledge in the realm of environmental communication is rhetorical and has implications for both the rhetoric of science and for how institutions of power make decisions regarding energy policy.

Second, I rely upon chapters two and three to discuss how the communication of powerful institutions plays an important role in public controversies. While powerful institutions

have the monetary resources to produce publicly-pervasive rhetorical texts, they do not do so uncontestedly. My examination of the NV Energy and BBSA reveals how institutional communication reflects widely accepted societal ideologies. Specifically, each dramatic construction of reality revealed motivations consistent with widely accepted concerns for economic fairness and neoliberal opportunity. This observation reveals the important role economic priorities play in issues of environmental policy. Not only does it imply that institutions engage public controversy at the intersections of societal ideologies, but it also implies that the environment can be absent even in environmental matters.

Looking at these two factors together, the public's will to knowledge exists in flux. The multifaceted rhetorical dimensions of the solar controversy suggest that the public's understanding of environmental issues ebbs and flows alongside the dramas that surround it. While institutions of power provide the public with dramas that suggest a particular construction of the material circumstances of the world, multiple competing versions of Nevada's energy landscape emerge and compete for public acceptance. I contend that the important implication here is the de-emphasis of the environment in the discourse.

I conclude my thesis by providing my final evaluation and analysis of the solar controversy. I contend that our understanding of environmental communication can be fostered by further similar evaluations of public controversy. By examining how dramas emerge in environmental discussions, we can become more attuned to the underlying motivations that influence how we socially construct matters of the environment.

Public Knowledge in Nevada's Solar Controversy

In my introduction, I argued that powerful institutions traditionally hold guiding power in society. Guiding religious, political, economic (and even electricity-providing institutions) hold some influence over society because they form important bases of our society (Condit; 1994 Foucault, 1978). Yet, this power is not absolute because society consists of multiple voices and values that powerful institutions must consider when communicating (Condit, 1994). I contend that the way institutions seek information and communicate with the public still significantly affects the public sphere. This holds especially true in public controversies, where uncertain issues are ripe for contestation (Goodnight, 2012) and institutions can enter public discourse. Thus, one of the goals of my research was to examine institutional communication for what it implied about public controversy and matters of the environment.

To do this, I conducted a Burkean dramaturgic analysis to examine the institutional communication of the PUCN, NV Energy, and SolarCity. In chapter one, I examined the results of PUCN's investigation into the impacts of net metering incentives in Nevada. In chapter two I examined both NV Energy's request to the PUCN to reduce net metering incentives as well as the commercials NV Energy funded to discourage the restoration of net metering incentives. In chapter 3, I examined how the SolarCity-funded BBSA used its website, social media videos, and its Twitter to convey two distinct actions, the PUCN's decision to reduce net metering incentives and how to restore those incentives. The purpose of my examination was to reveal underlying motivations and social orientations that formed the bases of each text. By uncovering and analyzing these orientations, I was able to assess what they implied about public communication.

I make two overarching assertions about the texts. First, when institutions seek information from the technical, scientific spheres, the presentation of such information is inherently rhetorical. As detailed in chapter one, the net metering controversy arose from Nevadan policymakers seeking to gain a more detailed knowledge of the technical aspects of the State's net metering incentive policy. I argue that the way in which the technical information reached policy makers was important. Examining the discourse of the net metering study contributes to our understanding of technical discourse in public controversy.

In the introduction of my thesis, I argued that this controversy had technical and scientific dimensions. When the PUCN investigated net metering, it sought to understand the technical complexities of how the policy affected Nevadan utility rates, customer-incurred costs to support the policy, and the environment. These effects were examined using a specific technical method, a mathematical "cost-benefit analysis" (Price, Pickrell, Kahn-Lang, Ming, & Chait, 2014, p.2). By conducting a dramaturgical analysis, I concluded that the presentation of information in this report contained a key, underlying social orientation. I came to this conclusion by examining the executive summary section of this report for how it communicated two acts: having net metering incentives in Nevada and having utility-scale solar energy in the state. For each act, the report communicated an act: scene ratio that evaluated the act for how it affected a specific scene: Nevadan utility bills. I argued that the underlying social orientation was realism, and it suggested society preference actions that have positive outcomes. Additionally, I argued that the circumscription of the scene within the drama was important because it suggested what these two acts affected.

This has important implications for the rhetoric of science. Wander (1976) asserted that communicating the results of scientific inquiry is inherently persuasive. I contend that this

persuasive dimension of scientific communication can be elucidated through a dramatistic method. This is because a dramatistic method examines the underlying social orientations that suggest what society should value. The report in my study focused upon the specific effects of net-metering incentives and utility-scaled solar. By emphasizing specific effects, namely those within a specifically constructed scene, the presentation of this scientific information was persuasive. The conclusions I drew contribute to our understanding of how scientific communication can be rhetorical and what it implies about understanding important issues in a public controversy.

Namely, I argue that this report shows how the environment can be deemphasized in matters that are inherently environmental. Nevada's energy policy decisions impact the potential for renewable, sustainable energy in a world with a finite amount of fossil fuels. However, the report did not communicate a scene that involved this consideration. The report oriented its audience to view net metering and utility-scale solar for how they monetarily affected Nevadan electricity users. Effects were viewed in terms of monetary costs and benefits. Ultimately, the report lacked a clear description of the environment and the climate as part of the scene to be examined.

From my examination of the scientific discourse within the net metering controversy, I conclude that in matters of public controversy, it is important to recognize the potential for scientific discourse to suggest what data and implications of the data are valued. Nevada policy makers sought to gather information about net metering. What they received, was a rhetorically constructed presentation of net metering. My thesis contributes to our understanding of how obtaining information does not simply fill an information deficit. Scholars have argued that receiving information about a scientific issue does not necessarily lead to a better understanding

of the science behind the issue. Some scholars have argued that this is because humans filter information through their own unique perspectives and life experiences, thus transforming how scientific information is learned and accepted (Kelley, McDonald, & Wickman, 2012; Mcfadden, 2016). I expand on this by contending that the presentation of data itself is rhetorical and thus may serve to orient its audiences to specific perceptions of what constitutes appropriate or acceptable knowledge about a subject. In Nevada, the presentation of data suggested that it was appropriate and acceptable to know how net metering effected the Nevada monetarily.

Thus, the data deflected other ways of understanding net metering, namely understanding how it affected the environment. The scientific discourse selected one way of understating net metering. It therefore deflected other ways of seeing it. I argue that it is important to recognize what aspects of the material world are selected and deflected within science communication. This especially holds true for matters in which the environment is a critical factor.

My second argument applies to public environmental controversy more broadly. I contend that as institutions communicate throughout public controversy, their communication is motivated by specific social orientations that suggest what society should value and how society should act. These motivations may adhere to societally-held values of importance, such as economic fairness, morality, and human agency within democracy. My examination of the social orientations contained within NV Energy's and SolarCity's communication revealed that the environment is not prominently displayed within the solar controversy. This implies that the environment is not always prominent in matters of environmental public controversy.

In chapter two, I examined how NV Energy communicated two acts: the reduction of net metering incentives and the restoration of these incentives. I argued that NV Energy communicated an act: scene ratio to describe how the reduction of net metering incentives would

restore economic fairness in Nevada. It would reverse net metering's effect of having solar customers shift their costs to non-solar customers. This corresponded an orientation of realism, in which society values actions that have the best outcomes. NV Energy presented a different ratio when it discussed restoration of net metering incentives. It presented a purpose: act ratio that suggested society should disavow the restoration of net metering because the solar companies had a nefarious purpose—they wanted to restore incentives so they could pocket subsidies. This corresponded to an orientation of mysticism, in which society evaluates actions based on their alignment with moral, just, or reasonable purposes.

In chapter three, I examined how SolarCity spoke through the BBSA to communicate about the PUCN's reduction of net metering incentives and the act of restoring those incentives. I argued that BBSA communicated an act: scene ratio to describe how the PUCN's reduction of net metering incentives imposed unfair charges on solar customers and killed the solar industry. Similar to NV Energy, BBSA was motivated by realism. However, BBSA argued that reducing net metering incentives was harmful, not helpful. I also argued that BBSA communicated an agency: act ratio to describe how to bring back solar. By emphasizing the means to achieve the restoration of net metering incentives, the corresponding ideology was pragmatism. This suggested that society focus upon by which means to best achieve desirable end results.

Looking at all chapters collectively, I contend that the public controversy generally constructed a scene consisting of monetary issues and not the environment. As NV Energy and SolarCity communicated net metering, each orientation had an importantly constructed scene. NV Energy communicated net metering as an act that negatively affected utility bills by shifting costs. NV Energy did not construct a scene that included environmental factors, and thus net metering's effects upon the environment were not emphasized. Likewise, SolarCity

communicated net metering as an act that negatively impacted solar customers' utility bills and hurt the economic viability of the solar industry. SolarCity also did not construct a scene that featured the environment, and thus again net metering's effects were narrowly examined.

This implies that in matters of environmental public controversy, it is possible for the economic aspects of the controversy to subsume the environment aspects. This implies that public controversy may be marked by dominant neoliberal concerns. Here, society values how the economy operates, and issues of contention are communicated in terms of the stability of economic factors (Asen, 2017). Despite the fact that Nevada's energy policies shape its relationship with the environment and contribute to the sustainable procurement of electricity, the communication contained throughout the controversy did not feature this consideration. In this regard, it is very important to recognize that the dramas contained within environmental controversies can emphasize and deemphasize different considerations of the material world. Being able to recognize what aspects are being emphasized at the expense of contributes to a better understanding how society symbolically represents environmental issues.

Concluding Remarks

Humanity continuously faces the threat of anthropogenic climate change (IPCC, 2014). The ways in which society grapples with climate change are extremely important to understand. In my examination of Nevada's solar controversy, I argued that the conversations surrounding energy policy play an important role in how society makes decisions that affect our life on this planet. These conversations are part of an "unending" discourse (Burke, 1941, p. 111). Examining our past, present, and future conversations about the environment contributes is very important. It contributes to our understanding of how society communicates and decides policy about sustainability and the environment.

In the Nevada Solar Controversy, it was the BBSA that achieved its goal: the restoration of net metering incentives. In July of 2017, Nevada Governor Brian Sandoval legislated the return of net metering incentives that would allow the solar industry to operate in Nevada (Groom, 2017). However, this result did not arise spontaneously. Rather, Nevada experienced the rise of multifaceted conversations about solar energy and net metering incentives. As various stakeholders presented their respective orientations towards the controversy, policymakers and Nevada residents were the audience to different perspectives and social orientations regarding the issue.

As scholars aim to better understand the environment, I return to the words of Goodnight (2012): “Small controversies may appear trivial, a flash in the pan, but these may also provide disruptions, disturbances, and events that render problematic standing theoretical categories and explanations” (p. 262). Examining Nevada’s solar controversy allows us to improve our theoretical understanding of environmental communication. In hopes of further increasing our ideas of environmental discourse and controversy, I propose studying additional localized controversies for how they may emphasize or mask the environment. For example, by the beginning of 2016, over 10 states investigated their respective net metering policies (Muro & Saha). Similar studies could examine which ideologies are expressed within these investigations as well as if any disputes bridged over into the public sphere. This can improve our understanding of what ideologies influence our renewable energy policies and at what moments these policies become palpable to the public.

To conclude, I reiterate that *all* environmental communication contributes to our understanding of how society operates in relation to the earth. My thesis highlights how the

examination of rhetorically constructed dramas in environmental communication a useful tool
for better understanding humanity's stewardship of the planet.

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