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Synthesis, part of a Special Feature on <u>Beyond the Assessment on the Diverse Values of Nature: Hidden gems, Biases, Frontiers, Challenges, and Insights</u>

The role of religion in shaping the values of nature



ABSTRACT. Environmental discourse frequently understands the values of nature as being instrumental, intrinsic, or relational and measured in biophysical, sociocultural, or monetary terms. Yet these specific values and value indicators are underpinned by worldviews, knowledge systems, and broad values that orient people towards nature in different ways and can be shared (or diverge) across spatiotemporal and social scales. The Intergovernmental Platform on Biodiversity and Ecosystem Services (IPBES) Values Assessment emphasized the need for decision-making to embrace a plural-values approach that encompasses these diverse meanings of value to catalyze outcomes based on sustainability-aligned broad values like care, unity, reciprocity, and justice. Navigating these diverse values also highlights the salience of religion and its complexity in real-world scenarios as a force that shapes how people conceive the values of nature. For example, proposed modes of plural-value deliberation to reform institutions and shift social norms toward justice and sustainability need to be able to bridge sacred-secular policy divides. This article evaluates how religion interacts with nature's values by building upon reviews conducted for the IPBES Values Assessment. We present different conceptualizations of religion and explore how these relate to various understandings of social-ecological change. Further, we delineate how religion interacts with values based on three interrelated forms of agency: personal, social, and more-than-human processes. Upon this foundation, we discuss how to better engage religion in environmental policy and research, considering four modes of mobilizing sustainability-aligned values: (1) enabling, (2) including, (3) reflecting, and (4) shifting values and two analytical axes regarding religion's (1) social scale (individual versus collective) and (2) dynamic continuum (religion as stable versus changeable). Our assessment provides conceptual and practical tools to help consider religion in the processes and practices that shape, reinforce, or impede sustainability-aligned values for more inclusive and effective conservation decision-making.

Key Words: faith; institutions; plural values; sacred; secular, sustainability; valuation

INTRODUCTION

The importance of incorporating the multiple values of nature to achieve more just and sustainable conservation outcomes has been recognized in international environmental and development agreements (e.g., UN 2015, CBD 2022, IPBES 2022). However, implementing this paradigm of conservation faces conceptual and practical challenges to be inclusive of deeply held worldviews, knowledge systems, and broad values (Raymond et al. 2023). To date, public decision-making has largely prioritized subsets of nature's values (e.g., market-based, individual, short-term instrumental values; Pascual et al. 2023). Likewise, mainstream conservation has mostly used an ecocentric worldview and scientific knowledge to promote natural protected areas, which have focused on ecological considerations without accounting for (or at the expense of) Indigenous peoples and local communities (IP&LCs) and the cultures, histories, and identities they represent across a spectrum of geographical contexts (IPBES 2022). Similarly, the National Biodiversity Strategies and Action Plans (NBSAPs) associated with the implementation of the Convention for Biological Diversity have been shown to be monitoring instruments that do not sufficiently engage IP&LCs (Climate Focus and Parabukas 2023) and are heavily oriented toward worldviews that are based on scientific knowledge systems and prioritize intrinsic and instrumental values assessed with biophysical and monetary indicators (Anderson et al. 2022, Murali et al. 2024). Attending more seriously to perspectives of local communities and cultures therefore necessitates careful critique of prominent conservation concepts like wilderness areas (or its modern expression as rewilding; Drenthen 2018). Furthermore, this may require reformulation of the peoplenature relationship within conservation discourse and policy, and interrogation of how the very notion of nature is conceived and managed (Mouysett 2023). Indeed, much has been written on nature as a contested concept (Viveiros de Castro 1998, Descola 2013), with many human languages lacking an equivalent of the English word "nature" (Ducarme et al. 2021).

The CBD's recent Kunming-Montreal Global Biodiversity Framework (GBF) reaffirms the need to move toward consolidating a paradigm shift toward accommodation of local perspectives. Specifically, the GBF commits to develop conservation approaches that achieve the agreement's biodiversity goals (e.g., Target 3 of conserving 30% of the planet by 2030) via inclusive and participatory social processes that recognize IP&LC rights and territories and therefore must engage heterogeneous value systems (CBD 2022). To address these conceptual, practical, and ethical challenges, the Intergovernmental Science–Policy Platform on Biodiversity and Ecosystem Services (IPBES) Methodological Assessment of the Diverse Values and Valuation of Nature (i.e., Values Assessment; Anderson et al. 2022) synthesized multiple conceptions of values of nature from various perspectives and disciplinary traditions. Values of nature were defined as representations of what people and society care about in relation to nature, recognizing that the term "nature" means different things to different people depending on context

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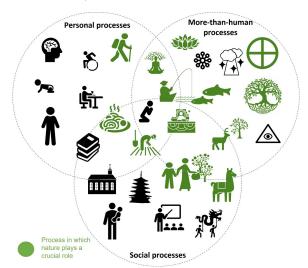
(Anderson et al. 2022: 8). The *Values Assessment* introduced an inclusive typology of various meanings (or layers) of value, including (1) worldviews and knowledge systems, (2) broad values, (3) specific values, and (4) value indicators (Anderson et al. 2022). The typology's goal is to aid scientists and practitioners in navigating plural-values scenarios, rather than implementing an exhaustive list of value categories (Raymond et al. 2023). Engaging multiple values necessitates using this typology to navigate real-world situations and acting at multiple leverage points of transformative change including (1) recognizing diverse values, (2) incorporating them into decisions, (3) reforming institutions to better account for values plurality, and (4) shifting social norms to better align with justice and sustainability (Pascual et al. 2023).

In this context, religion emerges as an important area of research and practice that touches upon all these typology layers and leverage points. Approximately 88% of the global human population identifies with a religious group (ARDA 2023), but religion is an under-explored aspect of conservation and receives little explicit attention in environmental policy. Religion thus provides a useful (indeed necessary) lens to understand the dynamic social and social-ecological processes that shape values at individual and collective levels (Anderson et al. 2022). Additionally, religion can be understood as an integrative framework that unites the various vertical value layers (i.e., between worldviews and knowledge systems, broad values, specific values, and value indicators; Raymond et al. 2023). Indeed, religion has the potential to be highly relevant to meet the calls (e.g., UN Agenda 2030, GBF, etc.) for societies to unleash, prioritize, and mobilize sustainability-aligned values (sensu Pascual et al. 2023). Yet, religious beliefs, traditions, and institutional structures can and do constrain effective action on environmental sustainability in many contexts (Veldman 2014, Wilkins 2022, Koehrsen et al. 2023). In short, there is an acute need to pay attention to both the evident and subtle forces that support (or hinder) sustainability-aligned values, including power dynamics between social actors (Arias-Arévalo et al. 2023) and other slow variables that can be unacknowledged because they are deeply embedded in cultural phenomena, such as religion (Chapin et al. 2009).

We explore how religion relates to values in the context of just and sustainable conservation. Pascual et al. (2023) argued that the dual crises of biodiversity loss and climate change constitute a values crisis; we also affirm they are a spiritual crisis (Jenkins et al. 2009, Rowson 2017). At their heart, these challenges are about what is perceived to be important and how we should be in the world (Ives et al. 2020). Therefore, as a domain of inquiry and practice, many aspects of religion could help facilitate a pluralvalues approach to environmental management given that many religions foster and cultivate sustainability-aligned broad values, such as temperance, justice, and compassion, that articulate nature's specific values beyond instrumental means to human ends (Grim and Tucker 2014). These values can be related to diverse epistemologies, with what constitutes authoritative knowledge typically transcending empirical, scientific knowledge to encompass sources such as scripture or divine revelation or tacit, spiritually discerned wisdom. Yet, given such plurality of values and knowledge, religious expressions also can hinder or undermine biodiversity conservation by, for example, promoting strong anthropocentric worldviews rooted in beliefs of human exceptionalism and domination or sometimes anti-scientific sentiments (e.g., Zaleha and Szasz 2014). Religion's diverse and complex dynamics can be understood partially in terms of its institutional dimensions (i.e., relating to informal norms and formal rules, and structures; Vatn 2016), which influence not only the expectations and restrictions on people—nature relationships but also how values are expressed on both individual and collective scales.

We assess how religion intersects with the values of nature. Our goal is to support efforts to incorporate nature's multiple values into processes of decision-making and practice and to inform future research to meaningfully, effectively, and ethically engage religious actors and religiously embedded values. When discussing nature, we begin from the definition adopted by IPBES, namely "the natural world with an emphasis on the diversity of living organisms and their interactions among themselves and with their environment" (Diaz et al. 2015:4) and explore how religious perspectives shape the meanings associated with the concept. First, we present religion as a complex, multifaceted, and contested sociocultural phenomenon that has significant relevance to the multilayered value concepts presented in the IPBES Values Assessment (Raymond et al. 2023). Then we explore the personal, social, and more-than-human processes by which religion influences values of nature (Fig. 1). This framework (adapted from Anderson et al. 2022) also demonstrates how ecological elements and interactions relate to these processes. Finally, based on four pathways for sustainability transformations (Horcea-Milcu et al. 2023), we conclude with guidance on how religion might be explicitly considered in the mobilization of transformative change by enabling, including, shifting, and reflecting nature's multiple values.

Fig. 1. This paper's analytical framework considers three overlapping types of agency by which religion can shape the multiple values of nature (i.e., living organisms and their interactions with their environment; Diaz et al. 2015): personal, social, and more-than-human processes. The latter category recognizes the agency of both natural and supernatural elements and phenomena in many religious traditions. Icons in green denote explicit social-ecological interactions (i.e., peoplenature encounters).



CONCEPTUALIZING RELIGION

The relationship between religion and values is a complex and dynamic one (Ives and Kidwell 2019). This complexity has been at the forefront of sociological analysis for the past century, exemplified by Max Weber famously refusing to define religion in undertaking analysis of it, instead arguing that one can only define it after it has been studied (Weber 1963). Where definitions are attempted in the literature, there is a lack of consensus, and they are regularly contested. The historical definition of the word "religion" has also been in an ongoing process of shifting from exclusive to encompassing meanings. To give two examples, in medieval Europe, religious was originally a vocational term applied to monks and not a reference to belief (Markus 1970). In this context, monks were termed religious, whereas priests, given how they were working in secular society, were termed secular. This characterisation waned as monastic life became increasingly uncommon and marginal across Europe. As European anthropologists increasingly made contact with other cultural groups, the term religion was again used to refer to instances of supposed particularity, with the ongoing assumption that Euro-American cultures were not religious (Nongbri 2013). There have been two interrelated challenges to these ways of defining religion in exclusive ways. First, post-colonial theorists have extended the critique of geographical dichotomy to highlight the presence of religion in their own societies, particularly demonstrating the ways that Christianity can be religious in the same ways as Hinduism or Buddhism. Second, post-secular theorists have challenged categorisations of world religions (Asad 2003, Mahmood 2013, Taylor 2009), observing how religion also functions in covert (implicit religion), non-elite (folk religion), and everyday (informal and non-structured) contexts. Given that attempts to "define religion is an act of power," it is unsurprising that ongoing contestation of those narrow definitions have continued to "provoke counter-definitions" (Aldridge 2007:17).

There also has been a move away from rigid, quantitatively defined approaches to studying religion. For example, where sociologists in the mid-20th century wrote of religion in decline, scholars have more recently observed that the forms and expressions of religion have moved away from those that were being measured (e.g., participation in weekly worship services in Christian churches), toward a more diverse variety of practices and traditions (see Kidwell 2019 for a review). These new (or resurging) forms of religion can remain embedded in existing religious movements such as the dramatic surge in global Pentecostalism (a Christian denomination) or the All World Gayatri Pariwar (a Hindu denomination) and also result in new religious movements, such as eco-paganism (Berger 2009). However, religion has become increasingly less exclusively organized in the context of organizations and formal institutions, as evidenced by the growing interest in mindfulness, spirituality, and the paranormal (Koger 2015), as well as forms of vicarious religion, in which those supporters do not themselves actively participate (Davie 2007). As Davie (2007:24) suggested, "religious professionals ... are expected to uphold certain standards of behavior, not least, traditional representations of family life. People who are not themselves participants in church life want the church's representatives to embody a certain social and moral order, maintaining a way of living that has long since ceased to be the norm in the population as a whole."

Religion can be expressed concurrently and in ways that have complex interactions across scales (Kidwell 2020). In some cases, religion may be situated within a structured organization (i.e., formal institution), especially in as much as these have been characterized by political scientists as "functionally specialized arenas" that are "governed by distinctive logics" (Scott 2014:11). Other anthropology-based definitions portray religion in the context of informal institutions with "a set of interwoven folkways, mores and laws built around one or more functions" (Scott 2014:11). Seen in this way, religion may materialize in practices and processes that are separate from formal political and governmental organs, yet it can nonetheless have a functional role in regulating social life via norms and expectations within a given cultural or regional context. In short, religion can serve a regulative function in both formal and informal ways (i.e., it is an institution as per Vatn 2016). As such, religious institutions can interface with, but do not perfectly overlap, organs of governmental or structured organizations. To give two examples, the EKD (the Lutheran church in Germany) and the Church of Scotland (a Presbyterian denomination) both serve a quasigovernmental function but have their own organizational cultures and may overlap regionally with other adjacent religious institutions, which do not have this form of public sanction (Kidwell 2020). Governmental linkage can be overt, as in the case of the church in Germany where the government collects church tax, or more discrete, as in Scotland, where the church is one of many bodies consulted during the crafting of public policy. Some religious organizations can also exist at massive scales, which push the boundaries of institutions. An example of this is the World Council of Churches, which coordinates action in a paraorganizational way across a variety of disparate Christian denominations (Kidwell 2020). There are also some ways that religion functions outside of these definitions. Both personal and collective expressions of religion and belief can enable experimentation, consolidation, and enforcement of particular social values in deliberate contestation to the official set of established values. Religion can also have an influence or effect that defies functionalist definitions but which may nonetheless have an important role to play in policy formulation and engagement by various publics.

In the context of varied understandings of religion, we do not attempt to delineate religious from nonreligious. Religion can be taken to mean a particular set of institutional structures, formal rules and informal social norms (Vatn 2016) associated with certain metaphysical supernatural beliefs, or elements of culture that resemble religion (e.g., rituals, myths, and beliefs of immaterial spiritual realities). In this section, we have attempted to preserve rather than resolve this conceptual ambiguity. We prefer to take a post-secular approach that looks at nature through the lens of religion to surface and identify unique and distinct insights on values of nature. In a similar way, Stacey (2014:2) argues that a religious perspective provides "access to the cosmic ideas, ontological assumptions, epistemic assertions, existential feelings, and moral ideals that make some ways of perceiving the world meaningful and others meaningless."

Religion is caught up in the formulation of the values of nature at many scales and can traverse scale (Kidwell 2020). This can be in clear ways (e.g., religion can generate and sustain forms of altruism and compassion), but with the turn in values research toward concepts like life frames (O'Conner and Kenter 2019), scholars have also begun to emphasize the ways that the dynamism of religion can itself have an impact on environmental value formation and expression. Furthermore, religion can also serve as a kind of magnet or glue inasmuch as it intersects with and unites various other value-related concepts, such as social practices and norms (cf. Gould et al. 2023). Some of these relationships can be complex (e.g., hybridization processes and fuzzy boundaries between domains; sensu Himes et al. 2024), opening up opportunities for navigating between different disciplines and knowledge traditions. As Aldridge (2007:41) writes: "The experience of being a Jew, or a Hindu, or a Mormon is often more about practices (e.g., doing things) than beliefs (e.g., believing things): about abstaining from pork, or beef, or tea, coffee and cola drinks." Therefore, in any discussion of values in the context of religion, it is important to remain connected to various approaches and concepts that help understand religion-values links, including from social psychology (e.g., beliefs, and attitudes, and social practices), sociology (e.g., communities and organizations), anthropology (e.g., human behavior and historical approaches to the appreciation of religious movements), and philosophical and theological notions (e.g., ethics, worldviews, and the divine). Seen this way, and in the face of this breadth of scholarship and perspectives, it becomes evident that religion's relationship to values has far-reaching implications for human behaviors that can impact biodiversity in different ways.

HOW RELIGION CAN SHAPE THE VALUES OF NATURE

We consider the relevance of personal, social, and more-thanhuman forms of agency in the context of religion's influence on values (Fig. 1). These three dimensions are explored, and their relationships with natural elements and processes (i.e., peoplenature encounters) are highlighted. Within and across these processes, value formation and change span a range of expressions that are sometimes predictable (and sometimes not) and can be understood as slow or fast, automatic or effortful, and disruptive or accommodating to existing worldviews. Following Raymond et al. (2023), we aim for an inclusive account of the interface of religion and the values of nature, and inclusiveness will necessitate some elucidation of these spectra.

Personal processes

Research has shown that people's values and ethical orientations can and do shift and evolve over the course of their lives. By extension, value formation processes and the process of assuming a particular religious identity can follow predictable patterns but can also proceed in unexpected ways and paces (e.g., religious conversion can occur in a wide variety of ways; Rambo 1993). Plus, changes in values can be both automatic and effortful (Bardi and Goodwin 2011, Kendal and Raymond 2019). By extension, formation of values and religious identity can be predictable but can proceed in unexpected and dramatic ways (e.g., a disruptive conversion to a new worldview, or as even sometimes radical iterations within a particular worldview).

Catalysts and facilitators for change to values can come from religion through ongoing religious practices such as prayer, study, meditation, liturgy, or activities of worship. These practices are intended in some way to form or shape religious followers toward holiness, virtue, enlightenment, or other desirable states. In many ways, these practices may influence individuals' personal broad values. Both automatic and effortful value change are evident in religious experiences of and encounters with nature as well. Automatic change might be observed in personally transformative spiritual and religious experiences, such as feeling a sense of the divine in spectacular wild terrain, the contemplation of aesthetic beauty, or a sense of the transcendent in the behavior of wildlife (Cooper et al. 2016). A famous (at least in the Global North) example of this process is Aldo Leopold's account of a spiritual conversion. In the story, he tells of shooting a wolf as part of his duties as a wildlife manager, thinking at the time it was the best way to conserve the landscape. However, when he saw the green flame extinguish in the eyes of this mother, whose pups he realized were nearby, he came to realize "that there was something new to me in those eyes—something known only to her and to the mountain" (Leopold 1949:129). As narrated decades later, this more-than-human process (or people-nature encounter) catalyzed a deep ecocentrism within Leopold and guided his environmental activism from that time onwards. Automatic and effortful value change also can occur when these types of spiritual and aesthetic encounters of nature are deliberately sought out and practiced routinely or via rituals. Such practices can cultivate relational values like a sense of identification with the natural world, reciprocity, and gratitude for nature.

Social processes

Various social processes can be identified in religion's relationship to values. One important phenomenon is the transmission of beliefs (and values) within families (Hoge et al. 1982, Flor and Knapp 2001). Scholarship theorizes the underpinning mechanisms and explanations for such transmission (or lack thereof; Paloutzian and Park 2005). For example, sociologists have proposed three key family socialization processes that contribute to value transmission: (1) inheritance of status, (2) social learning and role modeling, and (3) parental affection and affirmation. The last is especially relevant for intergenerational religious continuity (Boyatzis et al. 2006). Similarly, psychology scholarship has long highlighted how religion and values can be transmitted intentionally through education and schooling (Piaget 1952). Around the world, many educational establishments are run by or affiliated with religious organizations and therefore play a large role in the inflection, transmission, and persistence of certain broad values. Both informal familial and formal educational structures are fascinating in the context of value change, as well, as they combine both intentional formation/ change (e.g., on the part of teachers) and automatic change (e.g., adoption of metaphysical beliefs about the existence of god through family contexts).

Another social process through which religion influences values is via group composition changes. This can occur through immigration and emigration (Kendal and Raymond 2019), resulting in "the emergence of more variegated and complex religious landscapes in many countries" (Kong 2010:355). Cosmopolitan urban settings display this trend as a function of globalisation and openings for new forms of ideological pluralism and social diversity. This shift in the social context of religions and beliefs in many places is creating a more pluralistic heterogeneity of religiously informed values, creating the opportunity for more people to come into contact with alternative faith expressions. Beyond simply increasing diversity, such processes often lead people to hybridize religious traditions or

construct their own belief systems (Aldridge 2007). Religion has been shown to be central to immigrants' sense of identity and culture because religious gatherings and celebrations and customs help to embed a sense of cultural unity (Ebaugh and Chafetz 2000). Furthermore, with accelerating rates of migration due to environmental change (e.g., natural disasters, the climate crisis) in many parts of the world (Kaczan and Orgill-Meyer 2020), international links between diaspora communities and countries of origin can make climate change feel close to home and invite religiously motivated responses, as has been observed, for example, among British Pakistani Muslims (Ogunbode et al. 2023).

In the context of organized religions, there is significant debate within the literature around whether or not a greening of religion is underway. Some scholars have suggested that strengthened ecological language and discourse within religious teachings and public statements represent a move toward environmental values within world religions (Chaplin 2016), and that there is significant potential among religious organizations to mobilize global environmental stewardship (Hitzhusen and Tucker 2013). Yet, some scholars within religion and ecology question whether optimistic descriptions of this greening are in fact more broadly representative. It can be the case that such rhetoric and action come from a small community of highly visible and vocal actors, and excessive attention to this minority may ignore other diverging values and behaviors within those same organizations (Nita 2016, Taylor et al. 2016, Taylor 2019, Kidwell 2020). Additionally, greening of religious values may occur outside formal religious structural boundaries and within new religious movements, as seen in the new hybridization of beliefs or movements toward dark green religious expressions that include forms of nature-based spirituality that are not always associated with formal religions (Taylor 2010). Feminist scholars have observed that greening can also emerge from informal and everyday forms of religion (Bowman and Valk 2014), and still other scholars observe that the greening dynamic can be reversed and instrumentalized, such that environmental concerns are seen as a way of legitimizing religious engagement in secular for a rather than being inherent to the religious organization's values (Koehrsen and Huber 2021). For environmental values research, these challenges highlight the importance of analyzing the values articulated from and within organizational cultures as heterogeneous and the relationship between religion and values as bi-directional.

Finally, the embodied nature of religious practice within social contexts means that ecological elements are incorporated into collective social-ecological processes (e.g., rituals and shared religious activities) that shape shared or common values. Scholarship on religion highlights the importance of these encounter-based practices and rituals that include natural elements (Grim and Tucker 2014). For example, in many religious traditions, ceremonies frequently adopt nature motifs and incorporate natural elements (e.g., species, rivers, mountains) into celebrations, feasts, and holidays, especially when these relate to seasons, agricultural cycles, and local components of biodiversity (Jenkins et al. 2017). Christianity, for example, incorporates nature regularly through the sacraments of bread and wine in the Eucharist and in ritual collaboration with agricultural festivals, such as planting and harvest. Forms of engagement with wild

nature have also emerged, as seen in new movements like the Forest Church and Mossy Church, which deliberately embed liturgical Christian practice in natural settings (Stanley 2020). Similar observations have been made about a variety of religious traditions, including Islam (Koehrsen 2021). Such encounterbased processes that enable values for nature to emerge have led to powerful motivations for conservation (e.g., as seen in the protection of sacred groves; Mgumia and Oba 2003). The crucial role of more-than-human elements in these socially-mediated encounters points to the difficulty of separating social and more-than-human processes and emphasizes that people—nature encounters are found in all three types of agency (Fig. 1).

More-than-human processes

An integrated, socio-constructivist perspective helps recognize inherent relationships among individuals, groups, and environments (Berkes et al. 2008, Bieling et al. 2014). Whereas one might want to simply dissolve distinctions between these now-blurry categories, we take a pragmatic approach that seeks to appreciate how preserving an abstract account of divisions between personal, social, and more-than-human dimensions can be useful as a heuristic to help make sense of and compare religious beliefs and experiences. Taken together, value formation/change in religious contexts can extend from an exclusive focus on human concerns and experiences through to collaboration with more-than-human animals, plants, and landscapes (Whatmore 2006, Abram 2012) and, indeed, the supernatural.

On the one hand, more-than-human processes refer to how many religious traditions invoke the divine as a source of value beyond human-centered origins (Gustafson 1983). This perspective has sometimes been described as emphasizing a theocentric ethic (or theocentric values of nature) that focuses on god(s) rather than the needs of humanity or of nature (Hoffman and Sandelands 2005). Because religious perspectives commonly invoke metaphysical beliefs that embrace non-empirical, intangible, and spiritual realities, we can say that there are some commonalities between these Western religious traditions and the worldviews of some IP&LCs. As such, this category is explicitly beyond the human realm, and it conceptually includes religious traditions (and their worldviews and knowledge systems) that do not distinguish between natural and supernatural. Here, nature could also be considered a source of value in this more-than-human category and not only god or supernatural beings and forces. Indeed, this perspective is relevant for many Indigenous spiritualities, animism and neo-pagan movements, where nature cannot be separated ontologically from either humans or spiritual realities.

IMPLICATIONS FOR POLICY AND PRACTICE

For environmental governance, it is crucial to recognize that religions and religious belief systems can challenge underlying secular ontological, epistemological, and axiological assumptions that often influence policy development and decision-making. For example, the sacredness of a forest does not sit neatly with expected utility theory, which underpins many policy approaches for managing ecosystem services (Dasgupta 2021). When seeking to work with religion to engage sustainability-aligned values and navigate diversity, assumptions related to the conceptualization of religion influences how such values are elicited and mobilized in particular decision contexts and sociocultural settings.

Table 1. Guidance for navigating the intersection of religion and values can be obtained from insights regarding how to consider four modes of mobilizing sustainability-aligned values (enabling, including, shifting, reflecting; Horcea-Milcu et al. 2023) in the context of two analytical axes that elucidate the spectrum of ways religion can be conceived in decision-making: (1) social scale: individual versus collective levels or (2) dynamism: stable, fixed structures versus changeable, socially-constructed processes. Opportunities and challenges for values mobilization are identified for each analytical domain.

Social scale	Dynamism	
	Religion as stable	Religion as changeable
Individual	Opportunity: include voices of diverse actors in decisions to enable authentic expression of religious values and worldviews. Challenge: religiously-shaped broad values can be incommensurate with other values adopted in decision-making, which can stifle the enablement of governance processes that encompass epistemic plurality.	Opportunity: create contexts for <i>reflection</i> on values guiding life choices through personal religious practice. Challenge: individuals require a degree of self-awareness, emotional, and psychological security and openness to effectively engage in <i>reflection</i> .
Collective	Opportunity: enable policy contexts to have religious groups present. Challenge: religious representatives may not reflect diverse views of groups and may hide power asymmetries, compromising inclusion of marginalised voices.	Opportunity: convene spaces for dialogue and deliberation to shift values held by groups through encounters with others. Challenge: need to manage deliberative spaces that enable values to be expressed openly and without judgment to allow values to shift.

Horcea-Milcu et al. (2023) outlined four modes of mobilizing values for transformations toward justice and sustainability: enabling (i.e., removing barriers to sustainability-aligned values from being expressed or enacted), including (i.e., overcoming marginalization of individuals and their values), shifting (i.e., changing the values held by individuals and groups), and reflecting (i.e., making transparent the values used in decisionmaking and creating spaces for deliberation). Here, we consider how religion interfaces with these alternatives for mobilizing nature's multiple values. We demonstrate how perceptions about the scale and dynamism of religion shape decision contexts and influence how religiously shaped values can (or should) be mobilized. An expansive view of religion recognizes that it exists both at individual scales and among collective groups (Haluza-DeLay 2014), and that religion encompasses both stability and coherence (i.e., through received codified traditions) and fluidity, dynamism, and hybridization. Thus, religion can be understood across two analytical axes (Table 1). The first is the social scale, spanning from the individual to the collective. This spectrum recognizes that religion can be addressed at a granular, personal level, allowing actors to articulate authentically how religious beliefs and values are uniquely held and expressed, or at the group level where religious beliefs, values, and worldviews are held and enacted collectively. The second axis relates to the dynamism of religion in particular contexts. At one end, religion may be considered as a stable phenomenon (e.g., formal, codified organizations) and at the other changeable (i.e., malleable as a social construction). If religion is understood as encompassing a fixed set of beliefs and values, policy actors may define the challenge of value mobilization as a translational one, whereas approaching religion as changeable opens the door to processbased deliberative modes of engagement.

This heuristic framework is not intended to be prescriptive, but it can help decision-makers reflect upon the concrete ways that religion is brought into arenas of policy and practice for nature conservation and sustainability. By intentionally moving from one quadrant to another, decision-makers can question previously uninterrogated assumptions about religious forms and

expressions within particular contexts, engage religious actors who may have been overlooked, and consider new forms of action that may more effectively achieve conservation outcomes.

The merit of the framework can be seen when applied to specific examples. Here, we offer a suite of recent developments related to religion and describe how they connect to the framework. There are inter- or multi-religious organizations that seek to enable articulation of religious perspectives and associated values more generally within secular policy-making arenas. These include the United Nations Environment Programme's (UNEP) Faith for Earth Initiative, which has produced documents, such as Faith for Earth: A Call to Action (UNEP 2020), to identify the relevance of religion as a source of sustainability-aligned values. UNEP has also facilitated the *inclusion* of faith actors at the 28th Convention of the Parties (COP28) for the United Nations Framework Convention on Climate Change (UNFCCC) under the mechanism of an Interfaith Coordination Group on Climate Change with 40 collaborating faith-based organizations (FBOs) and multi-stakeholder partnerships, and, for the first time, at a UNFCCC established a Faith Pavillion in the conference's Blue Zone (UNEP 2023). Similarly, the World Wide Fund for Nature's Beliefs and Values Programme and the Parliament of the World's Religions' Climate Action Initiative (https://parliamentofreligions. org/climate-action/) have enabled religious organizations to express their values related to sustainability in global fora. In the biodiversity realm, the Interfaith Rainforest Initiative (https:// www.interfaithrainforest.org/) acts as a platform for religious leaders to work hand-in-hand with Indigenous peoples, governments, civil society organizations, and businesses to protect rainforests, thereby opening a space for (i.e., better including) expression of religious motivations and resources for sustainability.

However, engagement with large, formalized organizations as a proxy for religion can mask internal complexities and certain values. These complexities include multi-actor and multi-scale interactions between religious organizations operating at a macro-scale and collectives and individuals at micro-scales (Koehrsen and Huber 2021). Religious leaders rarely can reflect

the full range of values and beliefs of adherents; so, when they are used as the focal point for engagement with those organizations, it can frustrate attempts to interface with the full diversity of values in a given context (leading to incomplete inclusion). For example, when Pope Francis published the widely disseminated encyclical Laudato Si (2015), which espoused an ethic of environmental care and stewardship, the relevance of the Catholic Church to biodiversity conservation efforts was elevated. However, in places like the United States it also had a polarizing effect for many Catholic believers (Li et al. 2016). Similarly, the Dalai Lama has been an outspoken proponent of environmental care for many years, even addressing the 1992 Rio Earth Summit. Here, too, engagement with Buddhist and Taoist communities in Asia at the macro scale through a leader can also hide complexities, which can be seen on closer investigation of particular practices. For example, the practice by persons seeking to cultivate good karma of releasing animals held in captivity into local habitats for merit or luck (Wasserman et al. 2019), which often results in introducing non-native and potentially invasive species. Similarly, not all Christian leaders represent end times beliefs held by some evangelical Christians that can stifle environmental action (Skrimshire 2014, Nche 2020). So, whereas such engagement with high-profile religious leaders is helpful for enabling inclusion of religious perspectives in otherwise secular discourses and decision-contexts, they rarely include the full diversity of voices. Perhaps most notably, these examples do not engage comprehensive processes of reflection or shifting values. This fact can become pernicious when religious leaders also abuse their platform to wield power in oppressive ways, which is a greater risk in societies where there is historically less of a division (or there is currently an erosion of the divide) between religion and politics.

When religion is approached as a social phenomenon that must be understood at fine levels of granularity (i.e., expressed uniquely in the lives of individuals and communities), alternative modes of value mobilization can emerge. Guidelines have been written for how to effectively and ethically *include* faith-based perspectives in conservation in ways that are particular to religious traditions that are specific to local communities (Society for Conservation Biology 2018; see the Society for Conservation Biology's Religion and Conservation Working Group). Similar guidelines have been developed by the International Union for the Conservation of Nature (IUCN) for incorporating cultural and spiritual values of nature into biodiversity management and governance (Groves, 2021).

On the other hand, when religion is approached as changeable, rather than as a stable set of codified beliefs and values, participatory modes of engagement can be pursued that allow for deliberation and *reflection* on values. A practical expression of the need for such work can be seen in the complex intersection between traditional beliefs and new Christian ideas in many parts of Africa. For example, McPherson et al. (2016) documented how traditional religious beliefs in Ghana have enabled the protection of nature through taboos against hunting at certain times and protection of sacred groves, but also how sacred values of hunting can conflict with new conservation management. Processes of communication about and *reflection* on religious values, as they interact with new developments (e.g., conservation), are thus vital to find effective grassroots solutions. Care must be exercised,

however, to not simplistically advocate for maintenance of unmodified traditional belief systems, given the complexity and dynamism of religious change. Instead, including local voices can enable sustainability-aligned values to emerge in new ways. Again, McPherson et al. (2016) mention the example of how wider support for traditional conservation practices, such as taboos against harming monkeys, has enabled Christian converts to reembrace traditional values without a conflict of conscience and to weave these together with their new religious identities.

Another illustration of *reflection* on existing values to enable value *shifts* can be seen in Vancouver, where the Mother Tree Local Leaders Program has been set up by Sierra Club of British Columbia in partnership between local Indigenous leaders and progressive Christian churches. A recognition of the importance of environmental stewardship among church communities led them to approach Indigenous leaders in a spirit of humility to learn from and perceive sustainability issues through a different worldview. This participatory process allows for greater activation of latent sustainability-aligned values (rooted in diverse Christian traditions), as well as *shifting* values through relationship and exchange with other religious and spiritual perspectives.

In combination with the *enable-include-reflect-shift* typology, accounting for a priori assumptions about religion across the two dimensions of its social scale (individual-collective) and dynamism (stable-changeable) is helpful not only for understanding effective practice, but also for dealing with how expression of religious values is inevitably shaped by power dynamics across multiple actors and scales. To comprehend how religion and religious belief can mobilize values, it is essential to scrutinize how discourses and social structures interplay in these contexts to emphasize or exclude particular worldviews, knowledge systems, and broad values. In particular, discursive power is seen in the utilization of discourses, narratives, and knowledge production to construct, shape, or disregard values (in its multifaceted meanings; Arias-Arévalo et al. 2023). For its part, structural power encompasses the historically specific sociocultural, political, and economic systems that perpetuate hierarchies among social groups, influencing the recognition or neglect of certain values and worldviews. Recognizing how power interplays with religion provides important insights into both the constraining and enabling aspects of religion as it shapes (or does not shape) sustainability-aligned values.

CONCLUSION

Throughout this assessment of how religion intersects with the values of nature, we have shown that religion is a complex process that has been studied by a range of disciplines (e.g., psychology, anthropology, theology, philosophy). Furthermore, it has formal and informal dimensions and relates to people—nature relationships in various ways. To organize this analysis, we used the discrete categorisation of personal, social, and more-than-human forms of agency to identify three core ways that religion can intersect with values, particularly at the deeper levels of worldviews, knowledge systems, and broad values. However, it is important to account for the fuzzy boundaries (sensu Himes et al. 2023) between these mechanisms, disciplinary perspectives, and the multiple layers of the values typology itself (i.e., worldviews and knowledge systems, broad values, specific values, and values indicators; Raymond et al. 2023). We consider this

conceptual and practical flexibility to be key for scientists and decision-makers; this is why we use the metaphor of navigating diversity rather than merely categorizing it. In particular, we suggest that it would behoove both conservation science and practice to engage religion as an important aspect of real-world plural-values scenarios. Using a dynamic understanding of religion, it is possible to have the analytical capacity to assess and choose from a range of options (e.g., enabling including, shifting, and reflecting values) in efforts to achieve more just and sustainable conservation outcomes.

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