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Research Article

Aligning Gross National Happiness, Sustainable Development Goals, and Traditional Ecological Knowledge: A Path to Holistic Well-being

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ABSTRACT

To promote sustainable development and holistic well-being, this article examines the connections between Traditional Ecological Knowledge (TEK), the Sustainable Development Goals (SDGs), and Gross National Happiness (GNH). GNH emphasizes environmental conservation, cultural preservation, and socioeconomic advancement, but the SDGs provide a complete framework for tackling global issues. With its roots in local and indigenous populations, TEK offers essential perspectives on environmental management and cultural preservation. By giving marginalized populations more authority, TEK integration into development plans improves biodiversity protection, guarantees the preservation of indigenous knowledge, and advances social justice. By acknowledging the interdependence of the material, spiritual, and environmental aspects of well-being, we may build resilient, inclusive, and sustainable futures.

INTRODUCTION

Humanity has changed how it views development in recent decades, realizing that traditional economic metrics cannot fully capture the complexities of environmental sustainability and human well-being (Tomislav, 2018). A growing emphasis on holistic frameworks that consider the social, economic, cultural, and environmental aspects of development has arisen in reaction to this realization (Hariram et al., 2023). Out of all these frameworks, Gross National Happiness (GNH), Sustainable Development Goals (SDGs), Traditional Ecological Knowledge (TEK) are notable for their capacity to provide thorough insights into the relationship between environmental health and human well-being.

The concept of GNH, initially introduced by the Kingdom of Bhutan, offers an alternate perspective on development to the traditional Gross (GDP)-centric Domestic Product model (Balasubramanian & Cashin, 2019). **GNH** understands that true prosperity includes spiritual, cultural, environmental, and material prosperity. To promote holistic well-being, it highlights the significance of environmentally sound practices, cultural preservation, and sustainable socioeconomic advancement (Thinley & Hartz-Karp, 2019).

Comparably, the United Nations' adoption of the SDGs in 2015 signifies a shared commitment to tackling urgent global issues like poverty, inequality, climate change, and environmental degradation (van Niekerk, 2020). The SDGs provide a road map for sustainable development that incorporates social justice, economic prosperity, and environmental sustainability. The SDGs seek to balance the demands of current and future generations while ensuring that no one is left behind by establishing targets across 17 interrelated goals (Leal Filho et al., 2019; Morton et al., 2017).

TEK provides important insights into environmental stewardship and sustainable resource management in conjunction with these global initiatives. TEK highlights the interdependence of humans and nature and the significance of living harmoniously with the environment (Mazzocchi, 2020). It is based on the wisdom and customs of indigenous and local cultures. Indigenous peoples have evolved complex knowledge systems through centuries of observation, experimentation, and adaptation. These systems provide insights for

modern sustainability initiatives (Withanage & Lakmali Gunathilaka, 2023).

Despite coming from various institutional and cultural frameworks, GNH, SDGs, and TEK, all have similar values and objectives. Fundamentally, these frameworks support a comprehensive view of well-being that acknowledges the inherent value of nature and cultural variety and expands the scope of economic development. Recognizing the mutual reliance between human communities and the environment provides avenues for more just, robust, and environmentally friendly futures for everybody. This study examines how GNH, SDGs, and TEK might operate and offers ways to incorporate these frameworks into development practices and policy. By utilizing their complementary abilities and viewpoints, we can build more fair, inclusive, and sustainable societies that put the health of people and the environment first.

MATERIALS AND METHODS

To explore the ideas of GNH, SDGs, and TEK and their potential ramifications for development practices and policy, this study used a qualitative methodology. To comprehend the theoretical background, fundamental ideas, and real-world applications of GNH, SDGs, and TEK, a thorough analysis of the literature review was carried out. Scholarly papers, policy documents, case studies, and reports from a variety of disciplinary backgrounds—including environmental science, development studies, cultural anthropology, and indigenous studies—were included in this analysis. Additionally, to find chances for integration and synergy between GNH, SDGs, and TEK in advancing holistic approaches to development, this study used a comparative analytical framework. Important themes and insights about the common values, goals, and possible contributions of these frameworks to sustainable development and wellbeing were found via a critical analysis and synthesis of the literature. The approach encompassed the examination of case studies and examples from diverse global contexts demonstrate the pragmatic use and efficacy of GNH, SDGs, and TEK in tackling present-day development obstacles. This study sought to offer practical suggestions for practitioners. policymakers, and stakeholders who were interested in integrating these frameworks into development projects by looking at real-world experiences and best practices. Overall, this qualitative methodology facilitated a nuanced understanding of the interconnectedness between environmental sustainability, human well-being, and cultural diversity, and provided insights into how GNH, SDGs, and TEK can be leveraged synergistically to promote more equitable, inclusive, and sustainable development pathways.

RESULTS AND DISCUSSION Gross National Happiness

GNH is a fundamental reinvention of societal progress against the common knowledge of GDP-centric growth models. It is not only a development philosophy (Matsuzawa, 2019; Munro, 2016). GNH was born out of the small Himalayan nation of Bhutan, which realized the limitations of using economic indicators as the exclusive means of measuring success. The idea was first presented by Jigme Singye Wangchuck, the fourth King of Bhutan, in the 1970s. He outlined a vision that puts the happiness and well-being of the people ahead of the accumulation of worldly wealth (Thinley & Hartz-Karp, 2019; Verma, 2017).

The understanding that true prosperity is multifaceted and includes not only worldly wealth but also spiritual, cultural, and environmental aspects is at the core of GNH (Hosseini, 2023; Allison, 2019). Bhutan's constitution, which requires the state to prioritize programs that advance happiness and well-being, embodies the country's dedication to GNH (Alkire, 2015). This all-encompassing method of development is based the idea that community cohesion, environmental health, and cultural heritage richness are all closely related to people's level of happiness (Masaki & Tshering, 2021).

Another fundamental tenet of GNH is cultural preservation, which emphasizes the value of preserving and honoring cultural diversity in a society becoming more homogenous (Gupta & Agarwal, 2017). Bhutan's dedication safeguarding its unique cultural history, encompassing its unique language, arts, and customs, indicates a broader acknowledgment of the significance of cultural identity in advancing personal and societal well (Debnath & Shankar, 2014; Lepeley, 2017).

The GNH framework strongly emphasizes environmental conservation because it recognizes that the sustainability and well-being of the natural world ultimately determine human prosperity (Kamei et al., 2021; Wangchuk & Tobgay, 2015). Despite the economic temptation to exploit its natural resources for short-term gain, Bhutan has made an ambitious pledge to retain at least 60% of its territory under forest cover, which exemplifies its emphasis on environmental conservation (Nepal, 2023; Feuerbacher et al., 2021).

In essence, GNH offers a comprehensive prosperity that vision of puts happiness, sustainability, and cultural vibrancy first, marking a significant break from traditional development paradigms (Kamei et al., 2021). GNH provides a strong counterargument to the limited goal of economic growth at any cost by highlighting the interdependence of material, spiritual, environmental well-being. While the world community struggles to address the pressing issues of the twenty-first century, the GNH principles provide insightful guidance on building more just, resilient, and peaceful communities for the present and the future (Sanson & Burke, 2020).

Sustainable Development Goals

The SDGs, which serve as a road map for tackling some of the most important issues facing mankind in the twenty-first century, are a historic accomplishment in international cooperation (Wu et al., 2018). The SDGs, adopted by the UN in 2015, broaden the scope of the Millennium Development Goals (MDGs) to include a wider variety of topics and stakeholders while building on their achievements and lessons learned (Leal Filho et al., 2019; Sudirman & Rifai, 2021).

The realization that piecemeal efforts cannot attain sustainable development but calls for an integrated, holistic strategy that considers the interdependence of social, economic, environmental issues is at the heart of the SDGs (Fallah Shayan et al., 2022). The 17 goals address a wide range of issues, such as the eradication of poverty, health and well-being, gender equality, clean water and sanitation, affordable and clean energy, responsible consumption and production, climate action, sustainable cities and communities, partnerships for the goals, industry, innovation, and infrastructure, reduced inequalities, life below the water, life on land, peace, justice, and strong institutions (Carlsen & Bruggemann, 2022; Halkos & Gkampoura, 2021; Fonseca et al., 2020).

The targets and indicators attached to each goal provide a precise framework for action and accountability to track progress (Nhamo et al., 2020). The SDGs are significant because they highlight the need for integrated approaches that target several aspects of development at once and acknowledge the connections between various goals (van Soest et al., 2019). For example, to be genuinely effective, attempts to reduce poverty must simultaneously address issues like gender inequality, access to healthcare and education, and environmental sustainability.

Governments, businesses, civil society, and international organizations have pledged to work toward the SDGs to create an equitable and sustainable future (Croese et al., 2020). Coordinated efforts at the local, national, and international levels are necessary to achieve the SDGs, as are creative methods of funding, technology transfer, and capacity building (Bardal et al., 2021). Apart from its significance as a framework for policy and activity, the SDGs also function as a call to action for a more comprehensive change in society (Kroll et al., 2019). The SDGs encourage people and communities everywhere to make positive changes in their lives and communities by bringing attention to the interconnection of global crises and the necessity of collective action (Fallah Shayan et al., 2022).

Traditional Ecological Knowledge

Indigenous and local communities' wisdom, insights, and experiences are embodied in TEK and passed down through the years. With its roots in close ties to the land, TEK includes a plethora of information on ecosystems, natural resources, and the cultural and spiritual value of the environment (Nepal, 2023; Aswani et al., 2018). Fundamentally, TEK reflects a deep knowledge of regional ecosystems and the complex interrelationships among various natural factors (Mackenzie et al., 2017). Many times, over many generations, direct observation, exploration, and engagement with the environment are how this knowledge is learned (Zidny et al., 2020). It includes various activities, such as conventional farming, fishing techniques, hunting and collecting methods, and medicinal plants, among others (Hag et al., 2023).

Traditional resource management methods, which have supported local and indigenous communities for generations, are also included in TEK (Kant & Anjali, 2021). These methods, which understand the need to preserve ecological balance and guarantee the long-term survival of natural resources, are frequently founded on sustainability, resilience, and adaptability. For instance, indigenous peoples have created complex land management practices that support ecosystem health and biodiversity, such as controlled burning, habitat restoration, and rotational farming (Santini & Miquelajauregui, 2022).

The understanding of nature's inherent value and the significance of preserving harmony and balance between human cultures and the natural world are fundamental to TEK (Prasetyo, 2023). The land is revered and respected in many indigenous societies as a sacred object with spiritual significance (Gumo et al., 2012; Forbes, 2001). This viewpoint promotes a strong sense of stewardship and responsibility towards the environment by directing actions and decision-making processes that give sustainability and conservation priority.

TEK is dynamic rather than static, changing due to social, cultural, and environmental shifts (McCarter & Gavin, 2014). Indigenous and local communities are developing and adapting their traditional knowledge systems to meet modern difficulties while preserving their cultural legacy as they confront rising pressures from issues like globalization, deforestation, and climate change (Chakraborty et al., 2023; Singleton et al., 2023).

The importance of **TEK** informing conservation and sustainable development initiatives has come to light more and more in recent years (Finn et al., 2017; Saylor et al., 2017). To incorporate into environmental **TEK** plans, biodiversity management conservation initiatives, and climate change adaptation strategies, governments, non-governmental organizations, and organizations are international progressively attempting to partner with indigenous and local communities (Haq et al., 2023; Rasmussen, 2023; Sinthumule, 2023; Yu & Mu, 2023; Lemi, 2019; Wyllie de Echeverria & Thornton, 2019). Policymakers and practitioners may address complex environmental and socioeconomic concerns and advance more equitable

sustainable futures by recognizing and honoring traditional knowledge, or TEK.

Synergies and Integration

GNH, SDGs, and TEK have much in common, and these connections can be used to advance sustainable development and holistic well-being.

Cultural Preservation and Community

Empowerment

Both GNH and TEK acknowledge the unique value of cultural heritage and the significance of empowering the communities in the Indigenous peoples and local communities view cultural traditions and practices as more than mere objects from the past; instead, they manifest their identities and the sense of belonging they have experienced. Acknowledging and respecting the indigenous peoples' knowledge systems and close connection to the land is necessary to incorporate TEK into development initiatives successfully. This integration goes beyond merely making gestures at the surface level; instead, it requires meaningful participation and collaboration with indigenous groups in the decision-making processes that affect their lives and the settings in which they live. Development projects have the potential to generate more cultural variety, resilience, and social cohesiveness within communities. This can be accomplished by allowing indigenous peoples to take ownership of their cultural heritage and traditional forms of practice.

Environmental Conservation and Sustainable Development

The SDGs and the GNH regard environmental sustainability as essential to comprehensive development. However, to achieve environmental sustainability, it is not enough to simply possess technological solutions or legal frameworks; instead, it is necessary to undergo a significant transformation in how people engage with the natural world. TEK provides vital insights into the sustainable management of resources conservation methods used to maintain indigenous and local communities for generations. incorporating TEK into environmental management strategies, development initiatives have the potential to leverage traditional ecological knowledge to improve biodiversity conservation, ecosystems that have been degraded, and build community resilience changes the environment. This includes acknowledging the

legitimacy of the land management practices of indigenous peoples, providing support for their efforts to preserve and restore ecosystems, and fostering partnerships between indigenous communities and external stakeholders to coordinate the management of natural resources in an environmentally responsible manner.

Equity and Social Justice

GNH and the SDGs advocate for inclusive and equitable development, which addresses social inequities and supports human dignity. However, to achieve equity and social justice, it is necessary to do more than simply redistribute economic resources; it is necessary to address the underlying causes of structural injustice and to empower marginalized communities to participate fully in decision-making processes. The intersectional concerns of social injustice, environmental degradation, and cultural marginalization can be better understood and addressed with the tools provided by TEK, which provides a valuable lens through which to do so. The empowerment of marginalized communities, amplifying their voices, and protecting their rights to land, resources, and cultural self-determination are ways development initiatives can promote social justice. This is accomplished by recognizing and respecting TEK. Fostering partnerships founded on mutual respect and trust, supporting initiatives for social and environmental justice that indigenous people lead, and advocating for policy reforms that recognize and protect the rights of indigenous peoples are all necessary steps in this process. By incorporating TEK into development methods, we will ultimately be able to foster more equitable and sustainable futures for everyone.

CONCLUSION

GNH, SDGs, and TEK linkages offer promising avenues to comprehensive well-being and sustainable development. Recognizing and using these frameworks' complementary qualities can help create more inclusive, resilient, and equitable societies worldwide. GNH and TEK emphasize indigenous knowledge and practices by preserving culture and empowering communities. Development plans incorporating TEK conserve cultural heritage, increasing cultural variety and community cohesiveness. The SDGs and GNH prioritize environmental protection and sustainable

development. Integrating TEK into environmental management techniques improves biodiversity conservation, ecosystem resilience, and community resilience to environmental changes, improving sustainability. GNH and the SDGs promote fairness and social justice. Respecting TEK empowers marginalized populations and ensures involvement in decision-making, promoting social justice. Development projects can address systemic inequalities and promote equity by defending indigenous peoples' rights and amplifying their voices. GNH, SDGs, and TEK provide a holistic development approach emphasizing people and the planet. We can build more inclusive, resilient, and sustainable futures for future generations by embracing the interconnection of material, spiritual, and environmental well-being. These principles inspire us to construct a society where all people and communities may prosper in harmony with nature as we face the complex challenges of the 21st century.

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