

Sustainable Dynamics: A Framework for Creative Collaborations for Sustainable Development in Bali, Indonesia

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ABSTRACTS

Communities respond to sustainable development in diverse ways. Using local wisdom and resources and accessing global networks, community members work together to sustain their economic and social wellbeing and regenerate their natural ecosystems. The Sustainable Dynamics Model captures the processes with which interdependent actors and stakeholders leverage each other's forces and capabilities to achieve their visions of a sustainable community. This exploratory study that aims to introduce and define the Sustainable Dynamics Model emanated from an observational case study of a sustainable community-based ecotourism project through the Asian Productivity Organization Workshop on Agritourism Development and Marketing in Bali, Indonesia. Later on, it evolved into interdisciplinary action research seeking to integrate sustainability solutions initiated by various stakeholders to the local community's vision of a global

banjar (community). Focus group discussion and workshops, interviews and case studies propelled the gathering of information on the processes of implementing these solutions from local and international stakeholders. The main lesson that emerged from these local initiatives is that achieving social, economic and ecological balance within the community depends on the dynamics of the actors and stakeholders participating in the collaboration. Developing a sustainable community requires human-level (*self*) transformation: personal wellness and creative autonomy leading towards the creation of opportunities for social, economic, and environmental transformation.

Keywords — sustainable development; sustainable dynamics framework; creative collaborations; action research; sustainable solutions; community-based sustainability initiatives; Bali, Indonesia

INTRODUCTION

Our collective ability to sustain as one humanity has been given much emphasis in global development agenda over the last three decades. This focus toward sustainability signals a recognition of the interconnectedness of all life on Earth—a transformation in consciousness that may have been triggered by our very first view of our planet from space. This vantage point has allowed us ‘see and study the Earth as an organism whose health depends on the health of all its parts’ (UN WCED, 1987). We inhabit a planet where everything and everyone is inevitably connected (Curran, 2009).

Although sustainability means different things to different people, sustainable development has served as the main organizing principle of sustainability in living systems. The Brundtland Report definition of sustainable development: *‘development that meets the needs of the present without compromising the ability of future generations to meet their own needs’* (UN WCED 1987), provided a pathway for sustainable actions at the global, national and sub-national levels. Since 1987, world leaders in business, government, and civil society have laid down plans to accelerate sustainable development especially in the developing world.

In 1992, Agenda 21 was crafted in Rio de Janeiro, Brazil, to provide a framework for integrating the economic, social, and environmental dimensions of development into national and sub-national plans of action. Back then, sustainability efforts worldwide gravitated towards the preservation of natural ecosystems (i.e., sustainable land and water use and biodiversity conservation)

because of its overriding impact on human well-being (Curran, 2009). The social and economic dimensions of sustainable development focused on the issues of the developing world—maintaining a more sustainable level of the population, with consideration to poverty reduction, changing patterns of consumption, health promotion, and sustainable human settlements (UNCED, 1992). Given the international consensus achieved in Rio, sustainable development seemed to have gained the same stature as human rights, which deserved universal recognition. National commitments to the Agenda 21 reflected in the formulation of national agendas, signified the value of sustainable development as a universal goal towards which the global community should move.

The Government of Indonesia considered the completion of its national Agenda 21 in 1996 as an outstanding achievement in advancing sustainable development (UNDESA, 2007). Its Agenda contained recommendations to achieve sustainable development in every development sector by 2020. In 1993, Indonesia's commitments to the Earth Summit in Rio were mainstreamed to its national policy through the sixth Five-Year Development Plan or the REPELITA VI that encompassed sustainable development in sectoral, regional, and land use planning, with special focus on environmental policies covering the areas of waste management, conservation and rehabilitation of natural resources, institutional and human resource development, and community participation (UNDESA, 2007). While environmental policy was strong, the primary challenge was on the people's participation which was considered to be the weakest aspect of Indonesia's strategies to achieve sustainable development, with local governments left without much knowledge of Agenda 21 (UNDESA, 2007). This urged for much needed integration of the Agenda into sectoral and regional plans as well as consultative processes to communicate the Agenda to the public in order to encourage participation of the community in the achievement of sustainable development goals (UNDESA, 2007).

Owing to its reputation as an international tourism destination, the island of Bali had been a locus of analysis for sustainable tourism projects for four decades. While the rest of Indonesia and other parts of the world have yet to localize the Agenda 21, the Bali Sustainable Development Project which started as early as 1987, was adapted into a five-year development plan in 1989 *'to encourage vigorous economic development in Bali, while also ensuring and enhancing traditional cultural values and protecting the integrity of the natural environment'* (Pickel-Chevalier & Budarma, 2016). As a result, the Sustainable Development Strategy for Bali submitted to the Government of Bali in 1992 proved to be useful in the preparation of a medium-term development plan for the Province

in the succeeding planning period (Pickel-Chevalier & Budarma 2016).

People's participation emerged a crucial issue in achieving sustainable development. Until today, individual and community initiatives remain to be a dynamic terrain for understanding human-nature interactions that provide clues as to how people view sustainability and how they participate individually and collectively in sustainable practices. Sustainable community-based initiatives are embedded in specific cultural contexts, which may challenge the 'universality' of sustainable development, as we know it. Pickel-Chevalier (2014, as cited in Pickel-Chevalier & Budarma 2016) argued that the prevailing definition of sustainable development which is founded on '*Western concept of nature*' as external to the individual human being, would be '*difficult to impose*' on unique local cultures as exemplified in the case of Bali (Pickel-Chevalier & Budarma, 2016).

The dominant understanding of sustainable development, especially among state actors, follows a top-down approach, with the flow of knowledge moving through a linear direction from the international level down to local communities. This knowledge informs and guides development plans formulated by experts and implemented in the form of development projects. This implies that sustainable development framework has to be universally accepted; its applicability cutting across all societies. Despite the seeming universality of the goals of sustainable development—reducing poverty, conserving natural resources, and promoting human wellbeing, among others—the results will depend largely on the diverse ways by which people perceive and integrate sustainability into their daily lives, and equally in the ways by which they organize collective action to develop sustainably.

Since the inauguration of the Brundtland Report and the ratification of Agenda 21 by majority of nations, '*local-level solutions derived from community initiatives*' took center stage in the implementation of sustainable development (Leach, Mearns, Scoones 1997). The community-based approach, which espoused co-management structures or sharing of responsibilities in managing natural resources, guided policies and programs in the developing world, but several decades of implementation revealed the shortfalls of the approach in meeting expected results. Articles focused on community-based sustainable development (in Africa) published in the Institute of Development Studies Bulletin in 1997 (vol 28 no 4) suggested that these were due to the '*flawed assumptions of community and environment*'. Instead of assuming communities involved in sustainable development initiatives as '*homogeneous and consensual*'; environments as '*stable and universally-valued*'; and the relationship existing between them as '*potentially*

harmonious', Leah, Mearns, and Scoones (1997) suggested that community-based sustainable development should start to tackle *conflict*, embrace *'social and ecological heterogeneity'*, and *'work from an understanding of institutional diversity and dynamics'*.

Thus the need to study the different ways through which communities sustain. While it is important to be constantly informed of policies and guidelines from the national and international levels, emerging local initiatives have to be documented and improved by researchers and practitioners alike. Although they may be embedded in specific cultural contexts, one cannot discount the possibility of these narratives to resonate across cultures. Another purpose of documenting initiatives at the grassroots level is to harness their potential to influence decisions and actions across institutions, if not inspire individuals to initiate projects and build collaborative networks for people to work together to sustain and strengthen their communities. It is for this reason that community-based sustainable development has been chosen as a locus of this study, aside from the fact that the researcher-practitioners have been actively involved in actual projects to co-develop sustainable communities with local partners and stakeholders.

This paper emanated from an observational case study of a sustainable community-based agro/ecotourism project through the Asian Productivity Organization 2013 Workshop on Agrotourism Development and Marketing in Bali, Indonesia. It focused on the development and marketing of agrotourism to increase the income of farming households. The Indonesian Ministry of Agriculture showcased Sekar Bumi Farm to international trainees as an agrotourism model. While the case study served to evaluate Sekar Bumi Farm based on the elements of agrotourism (i.e., agricultural activity, access, and accommodation, active involvement of tourists), it offered a different perspective on agro/ecotourism—an effective tool for cultural preservation and ecological regeneration, as well as an affective tool for people development.

During the time of the case study in 2013, Sekar Bumi Farm has been with an NGO called WOW Bali on the Cultural Wealth Collaboration Project, which uses the so-called Sustainable Dynamics Framework to explain how agrotourism satisfied not only the economic bottomline, but also the social and environmental goals of sustainable development. To fully understand the case of Sekar Bumi and WOW Bali, one needed to go beyond the framework of agrotourism and into an in depth study of its unique model of community-based sustainable development. This inevitably required working and learning together with the community.

FRAMEWORK

Conceptual basis of the research

In many disciplines, sustainability and sustainable development emerged as buzzwords in the late 1970s and 80s (Beatley & Manning, 1997). Charles Kidd (1992), who chronicled the emergence and evolution of the term *sustainability*, traced the roots of the word from varied yet inter-related concepts of population growth rate, resource use, and environmental pressure, all of which helped define the concept of ‘*carrying capacity*’. In biology and ecology, *carrying capacity* means that a given ecosystem or environment can sustain a certain maximum level of population beyond which the collapse of species is expected (Beatley & Manning, 1997). In addition to carrying capacity, Kidd (1992) identified the five other roots of sustainability, namely, ‘*resource/ environment root, biosphere root, critique of technology root, no growth/ slow growth root, and ecodevelopment root*’.

The concept of *ecodevelopment* was the precursor of the concept of *sustainable development* (Ascher & Mirovitskaya, eds., 2002). In 1975, ecodevelopment was proposed as a ‘*planning concept for international development by the United Nations Environment Programme (UNEP)*’ wherein economic goals should not only be formulated based on the ‘*potentials of the local and regional ecosystem*’, but should also utilize technology and institution that are appropriate with the local culture and environment. Ecodevelopment served to ‘*reorient prevailing strategies of economic development towards meeting the basic needs of low income populations in developing countries and to strengthen economic independence*’ (Ascher & Mirovitskaya, eds., 2002). The United Nations (UN) has maintained the two concepts, needs and limits in defining sustainable development. Needs pertain to the basic needs of people living in poverty who should be given priority in sustainable development agenda, while the concept of limitations is concerned with technological and social conditions that affect the ‘*environment’s ability to meet present and future needs*’ (IISD, 2017).

Jabareen (2008) published a paper in Environment, Development and Sustainability that reviewed multidisciplinary literature on sustainable development. The result of which revealed that a ‘*comprehensive theoretical framework for understanding sustainable development and its complexities*’ is lacking. His earlier publication focused on a theoretical synthesis of sustainable development through a conceptual analysis through which seven domains of sustainable development: ethical, material, social, spatial, political, management, and the visionary domains (Jabareen, 2006).

While it is important to revisit all the above-mentioned domains, this study on *Sustainable Dynamics* relates mostly to two areas: integrative management and visionary. Integrative management, according to Jabareen (2008), covers the social, economic, and environmental aspects and the holistic integration of which is important to planning and management for sustainable development. The visionary (utopian) domain revolves around sustainable development goals, envisioning

a perfect society in which justice prevails, the people are perfectly content, the people live and flourish in harmony with nature, and life moves along smoothly, without abuses or shortages (Jabareen, 2008). This utopia transcends the primary ecological concerns of sustainability to incorporate political and social concepts such as solidarity, spirituality, and the equal allocation of resources.

With the varied roots and multiple meanings of sustainability, a single definition is elusive. Kidd (1992) proposed that those who wish to analyze sustainability should clearly describe it, rather than aim for a single definition. On the same note, the study of Jabareen (2008) showed the vague, inoperative definitions of sustainable development. Aside from these, he also pointed out the concept's lack of clear 'emotional commitment', and its contradictions, and the confusion surrounding the topic. These concerns regarding the definition of either sustainability and sustainable development leave enough room for reinterpretation and appropriation of sustainable development in varied contexts. The 'Sustainable Dynamics Framework' of creative collaboration at the community level may have been borne out of such flexibility.

While this study recognizes the official *sustainable development* definition of the United Nation, '*development that meets the needs of the present without compromising the ability of future generations to meet their own needs*' (UN WCED 1987), what is proposed here is that local communities develop their own definitions of sustainability and sustainable development, and thus respond to sustainable development challenges in diverse ways. By looking into the case of the Sustainable Dynamics Framework and the creative collaborations developed in Bali, Indonesia, this study aims to find out how a local community initiative defined what it means to be sustainable, how it has operationalized its own concept of sustainability through local action, and how it has evolved over time.

Conceptual foundations of the Sustainable Dynamics Framework *Evolutionary Design of Sustainable Human Development*

Although most of the projects and collaborations of WOW Bali were inspired by the Balinese, the organization's adherence to evolutionary design systems allows it to consciously fuse 21st century learning methodologies from the west with ancient cultural practices in Bali. The 'Sustainable Dynamics Framework', which espouses systemic, holistic, interdisciplinary, and participatory (SHIP) approaches toward sustainable development, exemplifies how WOW Bali applied evolutionary design. In this framework, one is required to consider a community as a system that is composed of interdependent parts and is capable of being influenced by its surrounding environment. For any sustainability solution to be effective, it should first be a systemic solution. This principle had its roots in systems science. According to Laszlo (2003),

the normative component of the systems sciences is considered within an evolutionary framework that presents holism as a methodology for understanding the dynamics of complex "real-world" (ontological) systems, and suggests action imperatives for their viable and sustainable design over time.

Systemic and Holistic Design

For a system to sustain, it has to be able to cope with the fast pace of its changing environment. Beddoe and others (2009) offered a view of the evolutionary process from a cultural context. They explained evolutionary process as a collective of '*worldviews, institutions, and technologies*' that '*follows rules analogous to those governing the evolution of organisms*'. Relative to the global problem of environmental sustainability being tackled at the international level, they explained that the reason our present 'socio-ecological regime' is not serving the interest of the vast majority of the population is due to our failure to adapt our worldviews, institutions, and technologies to the changing environmental condition (Beddoe *et al.*, 2009). They proposed '*an integrated set of worldviews, institutions, and technologies to stimulate and seed this evolutionary redesign of the current socio-ecological regime to achieve global sustainability*'. Further, an '*evolutionary redesign*' calls for innovative practices that necessarily weave a new narrative in sustainable development, which can be manifested in emerging movements that seek to change the current economic system characterized by 'excess, control, and exploitation' with one that values '*biophysical constraints,*

preferring decentralization, and supporting mutuality' (Mommaerts, White & Roberts, 2014).

In our attempt to “fix the problem” in the ecological system, our contemporary understanding of sustainable development has largely been concentrated on solutions and technologies. The environmental discourse surrounding sustainable development had shifted in recent years towards narratives underscoring the roles humans play in the decline as well as in the restoration of the world's ecosystems. Philipp Gassner (2014), for example, expressed a need to redirect the challenge of biodiversity loss beyond the ‘green’ surface and ‘focus on humans’. After all, the unprecedented extinctions of different species have been attributed to human activities.

One such attempt was exemplified through the relatively new perspective of *environmental humanities* ushering potentials in the area of conservation in ways that leave enough room for rethinking the nature-culture dichotomy. In the environmental humanities, the ‘*questions of meaning, value, ethics, justice and the politics of knowledge production*’ interface with the ‘*more-than-human environment*’; the blurring of line between these categorizations places us in a position of ‘*participants in lively ecologies of meaning and value, entangled within rich patterns of cultural and historical diversity*’, thereby shaping our identities and relationships (Van Dooren, 2014).

A holistic view of sustainability takes into consideration all dimensions of sustainable development—economic, social, and environmental. However, a holistic view of sustainability should also consider the holistic development of the individual human being as the core component of any social system. Sirageldin (2009) provided a ‘*guiding philosophy*’ for a ‘*human development strategy*’: one that balances between ‘*self-knowledge*’ based on the ‘*internal understanding of human nature*’ and ‘*empiricism*’ which pertains to the ‘*dynamic interactions of humans with their external environment*’. Attaining ‘*balance and harmony*’ should be the goal of sustainable human development, for this will eventually bring about an ‘*enhanced quality of human life as well as effective institutions and sustainable environment*’ (Sirageldin, 2009).

Interdisciplinary and Participatory in Approach

An interdisciplinary approach is necessary for any attempt at constituting or applying the concept of sustainable development. One has to rely on the expert knowledge of people from different specialized fields in order to get a full grasp of the issues and challenges of sustainability. The emerging field of sustainability

science recognized a need to develop a set of *'transdisciplinary methods and models to provide integrated understanding of closely-coupled human-environment systems'* (Kates, 2010). Bender (2012) expressed the importance of interdisciplinary approach in understanding human-environment inter-relatedness and complexity: it has the ability to *'weave together the skills and knowledge developed by single disciplines'*. An interdisciplinary approach in sustainable development alludes to a perfect case of human diversity: multiplicity of perspectives brings about various ways of looking at things.

The integration of the concept of participation recognizes that every single component of a community or system has a role to play in sustainable development. At the mainstream level, there exists no consensus as to a common definition or established ways on how to attain participation (Bass, Dalal-Clayton & Pretty, 1995; Tufte & Mefalopulos, 2009). While the use of the concept is largely dependent on the perspective being used, there is a common understanding of participation—*'involvement of ordinary people in a development process leading to change'* (Tufte & Mefalopulos, 2009). The social movement perspective considers participation as an *'empowering process'* while the institutional perspective looks at participation as a means to attain a pre-determined goal (Tufte & Mefalopulos, 2009). Agenda 21 also underscored the enabling and facilitating roles of the government in setting the conditions for community-based participation to prosper on the ground (UNCED, 1992).

Holistic Participation via Human Wellness

What underlies a collective view of participation is the basic understanding that holistic participatory approach begins at the level of the individual human being. One's ability to fully participate in any activity or process that affects his/her development is a function of his/her wellness.

Wellness, defined by the World Health Organization, is the *'optimum state of health of individuals or groups'* and is focused on two points: the fulfillment of the individual's physical, social, spiritual, and economic potential, and the performance of the different roles the individual is expected to play whether within the context of the family, community, or organization to which he/she belongs. One can trace the reason for lack of dynamic participation within a community or a system from one's state of wellness or wellbeing. When one is unwell, say physically ill, his/her capacity to perform duties at work may be negatively affected. Similarly, an individual's lack of economic power, i.e., condition of extreme poverty, debilitates the human person in ways that prevent him/her from fulfilling basic human needs. In creating strategies for participation,

therefore, governments need to look into the basic level of health and wellbeing of the individuals and groups within the system.

Regenerative Development

Regenerative designs applied in sustainable development could find its roots in landscape and environmental designs for developing human settlements. Lyle (1994) defined regenerative system with the ability *‘for continuous replacement, through its own functional processes, of the energy and materials used in its operation’*. He proposed its application not only in the area of landscape design: *‘we can apply it to the earth as a whole’*, especially with the pressing need to reverse the *‘degenerative trend’* that threatens the Earth’s ability to support life. He seemed hopeful in saying that regenerative systems, given their bases on natural processes, can play a pivotal role among the wide array of approaches and solutions. Lyle (1994) also echoed what many others have been voicing out for so long: that the relationship existing between human and nature is at the core of today’s environmental problem and that technology alone cannot possibly solve it.

Eisenberg and Reed (2003) posited that designing regenerative systems requires a better understanding of how our human systems can engage with the inherently regenerative natural systems in relevant and healthy interconnected fashion. They simplistically settled with two principles that could allow us to attain planetary wellbeing in the shortest time possible: first, that *‘natural systems have the self-organizing capability to heal themselves – if we let them’* and second, that *‘we are nature’*. They hit it point blank by saying that,

[w]e are more likely to achieve large improvements if we participate with nature on its own terms. Even the consideration of nature as a model is a concept that prescribes a perceived boundary, regenerative design requires that we participate with nature in a mutually beneficial relationship. This means instead of trying to stabilize natural systems by brute force and the creation of “manageable uniformity” (Lyle), we must identify the key systems (living and geologic) involved in a “place” and understand what permits these systems to maintain viability over time and allows them to evolve in relation to each other (a continuous birth, life, death cycle). In other words, long-term stabilization of both human and natural systems results from the seeming messiness of complex system diversity and an acknowledgment of slow change over time (an evolutionary construct) (Eisenberg & Reed, 2003).

OBJECTIVES OF THE STUDY

This exploratory study aimed to introduce and define the Sustainable Dynamics Framework which is a community-based sustainable development framework developed through a collaboration of various cultural creatives in Bali, Indonesia. For WOW Bali, it serves many different purposes. It is important to note that the study was brought to life as an integral part of the community's active learning processes and was used as a means of documenting the evolution of the local initiatives in attempt to connect with other stakeholders both local and abroad. While WOW Bali has existed to help the local community deepen collective knowledge and practice in implementing sustainable projects through research, it also affirms the Balinese cultural tradition for its uniqueness and adaptability to other cultures, making Bali a leading international destination.

Unlike traditional research projects, this study does not end with the research per se; the researchers aim to make a lasting contribution to the community. The Sustainable Dynamics Model of creative collaborations has been instrumental to the realization of the “Global *Banjar*” vision of the community. To achieve this requires a framework that can integrate the sustainability practices of traditional cultures into the social fabric of mainstream cultures. Tourism in Bali facilitated this process, as it paved the way for WOW Bali to connect with a wide range of experts and practitioners in different fields through the years—from health and wellness, design communications, creative arts, media, alternative education, environmental science, agriculture, architecture, development, governance, tourism—in its pursuit of a holistic and dynamic model of tourism that can fuse traditional and modern methodologies that works for the community.

Specifically, the study fulfills two purposes:

- 1) To demonstrate a way of integrating local Balinese wellness traditions and creative autonomy into modern dynamic wellness practices; and
- 2) To show how the community stakeholders have worked together to facilitate social change towards sustainable development.

Moreover, as WOW Bali's efforts are increasingly being recognized in different parts of Southeast Asia, a systemic, holistic, interdisciplinary, and participatory framework for sustainable development to guide potential international collaborations becomes imperative. This paper provides an outline of Sustainable Dynamics, which, although inspired by the Balinese philosophy, can be inclusive and adaptive to other cultures. Only such framework can enable

the transformation of sustainable communities that are able to withstand the challenges of the 21st century.

METHODOLOGY

Research Design

What are the elements of the Sustainable Dynamics Framework and how have these been applied in the collaborative sustainable development projects of WOW Bali International Initiative in Bali? These are the questions this study aims to answer. To be able to fully explore the subject, qualitative research through a case study design using action research approach was applied in actual community-based sustainable development projects initiated by the community in Bali, Indonesia starting in March 2014. In writing the findings of the

What started as an observational case study in 2013 evolved into a participatory action research (PAR), which is a participative and collaborative method that involves action, evaluation and critical reflection as bases for changes in implementation (Koshy, 2010) of community-based projects into which WOW Bali International Initiative had been involved. To answer the first research question, the study provided documentations and descriptive narrative accounts of activities as well as interviews with WOW Bali Co-founder and key project partners. Review of case studies and programs of WOW Bali, which led to the development of Sustainable Dynamics Framework was undertaken. Also, the research offered to explain the underlying principles behind the Framework through a number of literature from various disciplines that support the relatively new field of 'sustainability science', which deals with natural and social systems interactions and their influence on the '*challenge of sustainability: meeting the needs of present and future generations while substantially reducing poverty and conserving the planet's life support systems*' (PNAS, 2013).

Research Site and Participants

The second research question, which pertains to how the Sustainable Dynamics Framework has been applied in collaborative sustainable development, requires direct interaction with collaborators. In March and April 2014, key informant interviews, focus group discussions, and actual workshops were undertaken with the coordination of WOW Bali International Initiative (WOW Bali), a regenerative program for sustainable development in Bali, Indonesia during the time. These served not only to demonstrate but also to provide actual experiences of Sustainable Dynamics at work. Community partners of WOW

Bali were involved in the research activities: the owner of Sekar Bumi Tropical Farm in Banjar Buhu, Desa Kerta Payangan; the village chief of Desa Kerta Payangan in Gianyar Regency; the founder of Yayasan Tri Hita Karana Bali, the umbrella organization of WOW Bali in Ubud, Gianyar Regency; the owner of The Mansion Resort in Ubud, Gianyar Regency; the founder of The Fat Radish, a seed-saving Community-Supported Agriculture (CSA) Program in Bali; and the Dean from the College of Agriculture of Dwijendra University. The participants were chosen based on a purposeful sampling strategy; their participation into the creative collaborations being the main consideration. The key informants were in various stages of collaborations with WOW Bali and some of the actual activities (i.e., workshops) in which they have participated were documented for the purpose of the study. Their availability during the time of the study was also considered, as well as their ability to express their opinions and insights in the English language. While all the respondents were able to speak in English, other interviewees helped translate some of the discussions where the respondent resorted to communicating their insights and experiences in Bahasa Bali.

According to Palinkas, et al (2015), purposeful sampling is popular in qualitative research, especially in identifying and selecting cases that can provide robust information on the phenomenon being investigated. They further emphasized that aside from knowledge and experience, the ‘availability and willingness’ as well as the ‘ability to communicate experiences and opinions in articulate, expressive and reflective manner’ should also be given importance in purposeful sampling.

Individual consent of the informants was obtained for the purpose of the research. Photographs, video and audio recordings of the interview, discussion, or workshop were made available for sharing with the participants as a practice of digital regeneration of information. As part of active learning process, long term collaborative projects between the partners and WOW Bali were covered by Memorandum of Understanding (MOU) stipulating that the creative collaborations will be shared with other stakeholders for the purpose of subsequent case studies and for regenerating sustainable best practices.

Community Action Research

The dynamics of the action research was hard to anticipate for the researcher-practitioners. As they are not merely interested in generating knowledge from the research itself, they are also committed towards achieving the outcomes of the collaborative projects. After the case studies in 2014, the ‘*community action*

research' (Senge and Scharmer, 2002) continued as WOW Bali evolved from being a program into a Yayasan (Foundation/ Non-Profit, Non-Government Organization) of its own, taking on a wide array of 'sustainable dynamic' collaborations with various local and international stakeholders. Senge and Scharmer (2002) aptly described community action research, resonating with what WOW Bali had been working towards, i.e., becoming an actively learning community that '*values knowing-in-action*' with similar focuses, to wit:

1. fostering relationships and collaboration among diverse organizations, and among the consultants and researchers working with them;
2. creating settings for collective reflection that enable people from different organizations to "see themselves in one another;"
3. leveraging progress in individual organizations through cross-institutional links so as to sustain transformative changes that otherwise would die out (2002).

RESULTS AND DISCUSSION

The Sustainable Dynamics Framework

The Sustainable Dynamics Framework is the product of accumulated knowledge and applications stemming from over fifteen years of researches and developments in experiential alternative learning models as well as grassroots best practices. Defined as a process for '*leveraging the forces and properties that enable a community to coexist and operate interdependently, without much intervention from outside conditions and affects*'¹, the Framework had been readapted in various community-based collaboration projects. WOW Bali's image of sustainability is a '*world in which everyone is happy, healthy, and prosperous by virtue of living in complete harmony with the "dynamic" (forces and properties) of culture and natural ecosystems*'². Its concept of sustainability is intimately linked to the concept of 'wellness', which means the awareness of the balanced functioning of one's mind, body and spirit. At a certain time in the development of creative collaborations and implementation of programs, WOW Bali started using the terms 'sustainability and wellness' together to signify their interconnected essence.

1 This definition appeared on the official visual map of the Sustainable Dynamics Framework developed in 2012 courtesy of Process Space, one of WOW's collaboration initiatives.

2 This definition appeared on WowBali's EcotOURisms Presentation for the Forum on East Asia and Latin America Cooperation (FEALAC) & UN-World Tourism Organization-Asia Pacific Economic Cooperation (APEC) 2013, available via <https://www.slideshare.net/daihai1/wowbalis-ecotourisms-presentation>.

Interviews and interactions with WOW Bali Co-founder and Creative Director helped provide an understanding of the Sustainable Dynamics Framework. Sustainable *Dynamics* is an abstract concept better communicated through visual rather than literal (written and spoken) means. Visual graphics are a common modality for expressing or communicating abstracts ideas, which are consistent with WOW Bali’s commitment to the development of human creative potential.

What follow are narrative descriptions and visual graphics about Sustainable Dynamics, its components, and its evolution through various programs.

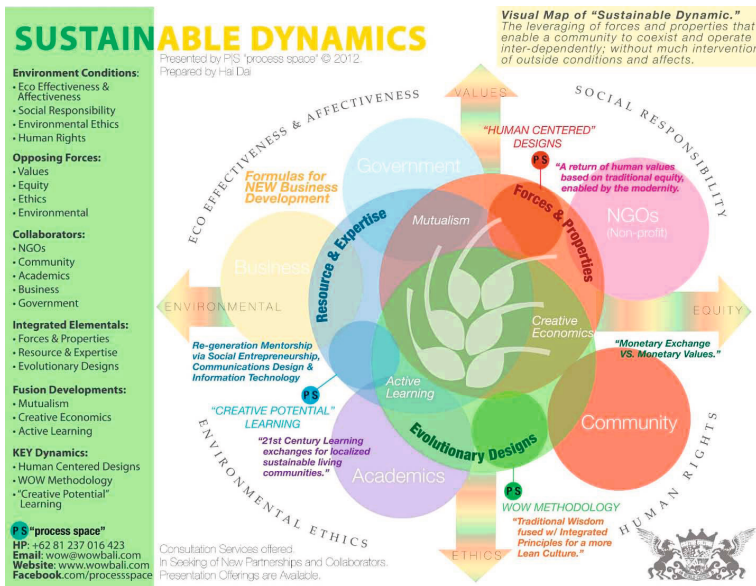


Figure 1. Visual Map of the Sustainable Dynamics Model

The Development of the Sustainable Dynamics Framework

Sustainable Dynamics was put together through WOW Bali, a program for ‘regenerative sustainable development’, which was then under the aegis of Yayasan Tri Hita Karana Bali. In 2008, I Made Chakra Widia founded Tri Hita Karana Bali, with the objective of raising environmental awareness of adults and children through programs and projects designed to counter the adverse impacts of the so-called “Green Revolution” in Bali (Tri Hita Karana Bali, undated). The “Green Revolution” was introduced in Indonesia through the Indonesian

Government in the 1950s and 1960s to revolutionize agriculture, i.e., drastically increase agricultural production using chemical pesticides, fertilizers, and high-yielding varieties of crops. According to Tri Hita Karana Bali, a great number of farmers still use '*unsustainable amounts of fertilizers, pesticides, herbicides and, despite living in one of the most beautiful regions of the world, there is little awareness of the impact of non-biodegradable waste upon the environment*' (undated).

The foundation is composed of international participants, i.e., farmers, students, educators, professionals, volunteers, children, adults, activists, and change-makers, from different backgrounds and have different skills and experiences. They came together in Bali to find and implement '*solutions for sustainability*' and their mission was to revive the Balinese belief system of Tri Hita Karana—the philosophy that one attains and maintains happiness through the harmonious relationship between people, nature, and God (Tri Hita Karana Bali, 2013). According to the Yayasan, this belief system of the Balinese is represented in their 'land use, settlement arrangements, architecture, ceremonies, rituals, art, and social organization' (Tri Hita Karana Bali 2013). The main focus of sustainability solutions was the regeneration of Bali's once self-sufficient food supply, which had started to decline since the introduction of conventional farming systems (Tri Hita Karana Bali 2013).

WOW Bali Co-founder, Hai Dai Nguyen, saw a parallel vision of sustainability in Yayasan Tri Hita Karana Bali, thus, he began a mutual relationship with the foundation in 2008 to implement programs along the area of food sufficiency through permaculture.

The Sustainable Dynamics Framework exemplifies what Beddoe *et al.* (2009) called an '*evolutionary redesign*' of the way different stakeholders should work together in a sustainable manner. The framework itself is a product of experiencing actual collaboration work in Bali, Indonesia. It is also an evolution, an accumulation of learnings from undertaking case studies, interacting with different stakeholders, and implementing projects first hand.

The Sustainable Dynamics Framework requires one to find the *dynamics*—forces and properties at work in the community. It looks into the people, institutions, and resources, and studies the relationship existing between and among these components. Inherent in any sustainable system is the process of evolution. One needs to understand how the system has evolved or changed through time in order to provide a viable set of actions or solutions that will sustain it for generations to come. As a basic principle in dynamics, the most dynamic component would probably set the whole system in motion allowing it to undergo change or to transform, thereby setting it through an evolutionary

path. This dynamic component would enable the system to sustain. For a solution to be sustainable, it should be focused on the most dynamic component of the system or the community, whether it is a person or a group, an institution, a resource, or a relationship between or among these components.

Components of the Sustainable Dynamics Framework

1. Environment Conditions

Anyone working in sustainability has to be aware of the bigger frameworks upon which any endeavor in sustainable development is anchored. In Sustainable Dynamics, these ‘environmental conditions’, namely, ‘eco-effectiveness and affectiveness, social responsibility, environmental ethics, and human rights’ come to mind when thinking about sustainability.

The overarching principle of *human rights* is at the core not only of the framework but all the actions into which WOW Bali is involved, thus, underpinning human value and agency. Environmental ethics, on the other hand, is a key concern in sustainable development as it defines the human’s place in the natural environment. Rolston (2003) highlighted environmental ethics as

theory and practice about appropriate concern for, values in, and duties regarding the natural world. By classical accounts, ethics is people relating to people in justice and love. Environmental ethics starts with human concerns for a quality environment, and some think this shapes the ethic from start to finish. Others hold that, beyond inter-human concerns, values are at stake when humans relate to animals, plants, species and ecosystems. According to their vision, humans ought to find nature sometimes morally considerable in itself, and this turns ethics in new directions.

In industrial systems, *eco-effectiveness*³ proposes product transformation

³ Ellen Macarthur Foundation explains the concept of eco-effectiveness as a contrasted to the earlier approach of eco-efficiency: ‘eco-effectiveness proposes the transformation of products and their associated material flows such that they form a supportive relationship with ecological systems and future economic growth. The goal is not to minimise the cradle-to-grave flow of materials, but to generate cyclical, cradle-to-cradle ‘metabolisms’ that enable materials to maintain their status as resources and accumulate intelligence over time (upcycling). This inherently generates a synergistic relationship between ecological and economic systems, a positive recoupling of the relationship between economy and ecology’ (2012). From <http://www.ellenmacarthurfoundation.org/business/toolkit/toolkit-efficiency-vs-effectiveness>. The website sustainabilitydictionary.com defines eco-effectiveness as ‘the central strategy in the cradle-to-cradle development method and seeks to create industrial systems that emulate healthy natural systems. The central principle of eco-effectiveness is that “waste equals food.” The concept was developed in response to some of the perceived limitations of eco-efficiency which critics claim only slow down the rate of environmental

processes that generate a 'cyclical, cradle-to-cradle' flow, thereby emulating healthy natural systems. Eco-effective processes '*inherently generates a synergistic relationship between ecological and economic systems, a positive recoupling of the relationship between economy and ecology*'. On the other hand, WOW Bali incorporates the concept of *affectiveness* in recognition of the emotional context of efforts aimed at sustainable development as this has the potential to motivate individuals or groups to achieve sustainable development goals. What feelings do these eco-solutions inspire in the individual? Do the solutions encourage a condition for sharing and working together with other people who have the same goals? Do the exchanges about sustainability allow deeper level of understanding between peers; if not allow one to empathize with people who have opposing views? Do these open opportunities to bridge new relationships? These are some of the questions that eco-affectiveness finds most interesting. While eco-effectiveness delves on objectified outcomes, eco-affectiveness deals with the subjective feelings evoked by such efforts.

Social responsibility is an ethical framework which proposes that every individual or group has a duty to undertake actions that are beneficial to the society. Social responsibility is achieved when a balance between economic growth, social and environmental welfare is maintained (Pachamama Alliance, 2014).

2. *Opposing Forces*

Sustainable dynamics requires balancing '*opposing forces*'; between value and ethics, and equity and environment. Stakeholders joining in the collaboration have different interests, which represent these *opposing forces*. The government, for example, will have to check on how a community's business sector performs, ensuring that it meets standards for social and ecological responsibility. An NGO, may come in to work with the community and ensure active functioning of the civil society in governance and community life. On the other hand, entrepreneurs who would want to collaborate have business interests that they want to secure. Collaboration with other stakeholders, or engagement in sustainability, will eventually enhance their economic bottom-line.

Balancing these interests are important in Sustainable Dynamics. When a sustainable development project is focused too much on ethical practices without the right balance of economic value creation, the community will be left with

depletion and don't reverse the production of unused or non-recycled waste' (n.d). From <http://www.sustainability-dictionary.com/eco-effectiveness/>.

very little incentive to sustain their initiative. Likewise, too much emphasis on environmental conservation without considering social equity between and among the collaborators will not be a successful strategy for a sustainable development project within a community.

3. *Collaborators*

To understand the dynamics of a community, WOW Bali looks at Sustainable Dynamics from a social systems viewpoint. Much like the human body as a system (composed of parts that have specific functions), society is composed of different parts that have different roles. WOW Bali has identified five groups of stakeholders interacting with each other: Community, Business, Government, Non-government organizations, and the Academe.

WOW Bali takes into account the forces and properties (capabilities) of everyone involved in the creative collaborations. Local partnerships and projects with private and public sectors have been created at the regional level (in the area of Ubud and Payangan within Gianyar Regency) over the period of three years. Interestingly, WOW's long-term partnerships with people from these main stakeholder groups are people who have sole proprietorship of businesses or are social entrepreneurs. The partners are also observed to be economically sustainable and have strong global consciousness.

While the partners are keen on the outcomes and results of their collaborations, they are also aware of the process that they are undergoing as they make effort to keep communications open. In the past couple of years, even tourists who come to Bali have taken interest on the work that WOW and its partners are doing.

4. *Integrated Elementals*

WOW refers to '*integrated elementals*' as the essential contributions that collaborators may bring into the partnership. These can be in the form of resources or expertise. Forces and properties, or the dynamics, are intangible elements that set things into motion. Intangible as they are, they cannot be measured like resources and expertise. The dynamic integration of these elements, when put together through collaborative actions, can bring forth evolutionary results for all partners involved. Evolutionary designs can enhance the relationship existing between and among partners. The integration of elements that partners bring into the collaboration takes place in the framework's '*fusion development*'.

5. *Fusion Development*

WOW Bali's creative collaborations are based on mutualism, creative economics, and active learning. One cannot begin to delve deeper into the concepts and practical applications of these modes of cooperation without looking into the very idea of collaboration that emerged in the modern context to be a technical term for '*working together*'. Although collaboration is used in various fields to denote '*new forms of labor relation*', very few research and theoretical reflections on the subject exist (Schneider 2007). Distinguishing between collaboration and cooperation in the pedagogical and organizational contexts, Schneider provides a sketch where

Increasing evidence shows that '*working together*' actually occurs in rather unpredictable and unexpected ways. Rather than through the exertion of the alleged generosity of a group made up of individuals in the pursuit of solidarity, it often works as a brusque and even ungenerous practice, where individuals rely on one another the more they chase their own interests, their mutual dependence arising through the pursuit of their own agendas. Exchange then becomes an effect of necessity rather than one of mutuality, identification or desire (2007).

It is precisely this unpredictability of any collaborative process, and the ensuing transformative potential it presents to those involved in the collaboration that invokes a

'*sudden need to cross the familiar boundaries of one's own experiences, skills and intellectual resources to enter nameless and foreign territories where abilities that had been considered "individual" marvelously merge with those of others*' (Schneider, 2007).

Mutual dependence drives fusion development. Collaborators have to recognize each other's resources and expertise or capacities, allow their efforts to merge together to create a shared-value or reach a goal that is greater than when each is working separately. This applies in partnerships that involve business operations. The key is finding balance between economic sustainability and social responsibility.

Lewis (2013) shared a view of mutualism founded upon '*togetherness—shared responsibility and shared reward*' and underscores '*mutual dependence [is] necessary to social wellbeing*'. Affect plays a significant role in nurturing mutualistic

relationships. Furthermore, organizations that employ mutualistic strategies not only require long term development, but also a stable leadership as well as a massive dose of determination and patience (Lewis, 2013).

'*Creative economics*' is also one of the important elements of collaborations where partners focus on the process of creating eco-based sustainable products and services as well as finding creative ways of productizing and marketing. Referencing several other authors on the subject, Marinova and Borza (2013) summarized some sketches that describe the relationship between creativity and economic activity as follows:

[c]reativity is the ability to mix and combine data, perceptions and materials to create something new (Boix et. al. 2011). Howkins (2007) advocated that the creativity is not necessarily an economic activity although it can become when the result of the creative process is an idea with economic implications or a marketable product. Boix et al. (2011) defined the creativity in the economic context, as: 1) "an idea or action that is new or valuable" (Csikszentmihalyi, 1996) or 2) the "formulation of new ideas and to the application of these ideas to produce original works of art and cultural products, functional creations, scientific inventions and technological innovations" (UNCTAD, 2010).

WOW Bali sees the potential of today's emerging creative revolution. Its programs were geared toward cultivating the individual's creative potential so that he/she can contribute towards developing solutions to the problems faced by his/her community. Combine one's creative potential with a sense of mutualism, we are building a condition that fosters creative collaborations. Only through the power of a collective of people can we overcome deeply entrenched systemic issues. According to Gardner (1981), '*some of the most difficult problems today are such as to defy correction by any single dramatic solution. They will yield, if at all, only through a whole series of innovations.*'

The visual map of the Sustainable Dynamics Framework located '*active learning*' at the intersection of the integrated elements of resource and expertise and evolutionary design. Active learning facilitates exchange of knowledge and information between and among collaborators who hold specific expertise or who have certain resources. It allows them to continuously communicate and update each other about their work. The integration of the active learning approach in the framework affirms lifelong learning, which can be carried out by anyone seeking to enhance his knowledge, skills, and competencies for the purpose of

professional or personal development and greater civic or social participation (Commission of the European Communities, 2001). Active learning therefore serves as an evolutionary tool that somehow diminishes the linear, hierarchical model of organizational arrangement that characterizes a considerable number of organizations at present.

This active learning process is made easier via digital means of communication, especially for partners who are collaborating remotely. Dunlap and Lowenthal (2011) shares how educators can make use of Web 2.0 technologies to motivate students into becoming lifelong learners. In the context of collaborative projects, WOW considers these digital technologies and Web 2.0 platforms like '*blogging, microblogging, social networking, document co-creation and resource sharing*' (Dunlap & Lowenthal, 2011) tools not only to expand the capacity of collaborators for participatory learning, but also to contribute to the existing body of knowledge and practice in the area of sustainability and wellness.

6. *Key Dynamics*

The 'human-centered design' component of the Sustainable Dynamics Framework is an integration of the '*human-centered design*' (HCD) process being advocated by ideo.org, a US-based non-profit that employs design to address issues of global poverty. Its '*Hear-Create-Deliver*' methodology provides a process by which development practitioners working in specific cultural and socio-economic contexts can implement effective solutions based on innovative approaches that arise out of their ability to listen to what the people in the community actually need (HCD Connect.org, undated). This methodology necessarily puts people at the center of the development process by focusing on their needs and desires.

The cultivation of people's '*creative potential*' is one of the defining features of 21st century learning reform in the education sector which is aimed at preparing learners to become active, productive participants in today's world. WOW Bali has designed a whole range of learning programs that is based on 21st century learning principles for application in the local community. Its Cultural Wealth Collaboration Program, for example, has been designed to cater to at-risk (or at-hope) youths, enabling them to learn and acquire interdisciplinary skills through creative arts, new media, permaculture, active learning and disciplinary (martial) arts. The objective of the program is to develop learners to become 21st century global contributors while holistically participating towards the sustainable development of their own communities.

'WOW Methodology', on the other hand, is a learning process that focuses on enhancing the learner's creative potential. This process, a fusion of '*traditional wisdom*' and '*integrated principles for a more lean culture*', is aimed at balancing '*one's consideration of affectiveness and effectiveness in sustainable living*'.⁴ WOW Bali (2013) claimed that its 'Sustainable Dynamics' is borne out of '*abstract understandings that can only be defined via sensitive awareness that is based on subjective learning experience*'. Adhering to a holistic worldview, it makes sense for WOW Bali to stick to '*traditional wisdom*' or '*ancient wisdom*' at the heart of its methodology and philosophy. What guides the WOW Bali International Initiative is the philosophical view that there exists a universal truth shared by all religious traditions. As Holman (2008) puts it, '*because there are numerous spiritual traditions that reflect the Truth does not mean there are multiple varieties of Truth but simply a plurality of Its expression.*' Only such a spiritual framework can encompass eastern and western belief systems; only such a framework can foster a truly inclusive understanding of human development beyond the diversity of religious doctrines as well as cultural and social conditionings. Remnants of traditional wisdom or this universal truth still exist in the modern world. WOW Bali believes that ancient cultures such as that of the Balinese, that have managed to survive up to the present, are carriers of this universal wisdom. By preserving the cultural heritage, ceremonies and rituals of these ancient cultures, we are likewise sustaining our connection with this universal truth for generations to come.

Sustainable Dynamics Programs

The Sustainable Dynamics Framework guides local initiatives or creative collaborations of WOW Bali. The programs, projects, and activities of WOW Bali expanded and its network of collaborators has grown over the years. Themes emerged as a result of the reviewing past and existing programs implemented by WOW Bali, namely, dynamic wellness, natural aesthetics, creativity and love, regenerative leadership, celebrations and ceremonies, and cultural fusion.

The following provides a narrative explanation of 'WOW Dynamics Programs' and the supporting researches and studies that explore the programs' connection to regenerative sustainable human development that WOW espouses. It should be noted, however, that the dynamic nature of the programs could hardly be captured through the narrative approach expressed from the point of view of the

⁴ This appears as well in the presentation WOW Bali: Regenerative and Sustainable Dynamics Development, Consultations, Workshops, and Ecological Programs/ Tours: http://www.slideshare.net/daihai1?utm_campaign=profiletracking&utm_medium=sssite&utm_source=ssslideview.

researcher. This is where community action research helped facilitate learning among the collaborators. Documenting action learning through video is a better method to capture data for this purpose, as information is interpreted and shared directly by the research participants.

Dynamic Wellness



Figure 2. Visual Graphics of Dynamic Wellness Program

Sustainability is a global systemic concern. It is exactly the enormity of the problem that makes it so challenging to solve. Somehow, acknowledging that we humans are at the center of the sustainability crisis, allows us to direct sustainable development interventions towards *ourselves*. In this manner, we can tackle sustainability as a personal concern, using the simplest of solutions. WOW Bali proposes a framework for understanding *personal* sustainability via the conceptual framework of wellness.

To operationalize this concept, WOW Bali developed *Dynamic Wellness Program*, which deals with one's personal awareness of the functions and dynamics of the sustainable human body and balance of the human mind. The program entails defining wellness at a personal level and finding balance of one's mind,

body and spirit by using different physical, mental, and energetic modalities. By this, WOW considers wellness or health as a '*uniquely personal and subjective experience about which each person has his or her own narrative*' (Kirsten, Van der Walt & Viljoen, 2009).

What makes wellness a key component of WOW Dynamics is the principle of '*holistic participation*'. An individual can only participate fully in his or her personal development and the development of his immediate community in as far as he/ she is functioning at his/ her full potential.

How one achieves his highest potential is a dynamic process, according to Halbert Dunn. He defined wellness

'as an integrated method of functioning which is oriented toward maximizing the potential of which the individual is capable. It requires that the individual maintain a continuum of balance and purposeful direction within the environment where he is functioning' (1961).

This definition suggests two aspects of wellness development: one of cultivating personal capabilities and another of relating with his/ her external environment. These are rather not separate aspects, but are two integrated aspects of wellness that one needs to balance. An effective wellness program has to take into consideration a number of factors affecting health practices in certain social contexts and thus has to be composed of '*integrated multi-level approaches*' (Cueva, et.al., 2012).

In Dynamic Wellness framework, the first aspect of personal development focuses on what it refers to as '*multiple intelligences*' that govern the physical and mental abilities of the individual (i.e., sensory, creativity, imagination, awareness). The second aspect focuses on forces and properties and governs energetics (i.e, place, relationships, resources, physical objects, time). In this framework, wellness starts from the healthy functioning of the individual's body and mind and interrelates to wider social and cultural contexts as the individual enters into simple and complex relationships, even extends towards the spiritual realm as one defines a relationship with the divine. This conception of wellbeing follows that of the Tri Hita Karana philosophy, that WOW Bali considers to be the ancient equivalent of human-centered design: with humans as the '*common denominator*' in the three sources of happiness that define our wellbeing—our harmonious relationship with other humans, nature, and God. The main objective of Dynamic Wellness is to enable human connections at the 'heart-to-heart' level.

WOW Bali has chosen the local Balinese to exemplify the dynamic processes of wellness that are integrated into their daily life—in their diet, connections with the land, and their ceremonies and celebrations. Consumed for their daily nourishment, Balinese food is composed of rice, vegetables, a small amount of meat or fish, and various spices. The Balinese cook their meal early in the morning to be consumed anytime within the day, whenever they feel the need to eat. However, during ceremonies food are prepared in creative, elaborate ways and are shared within the community. WOW characterizes the ceremonies of the Balinese as highly imaginative (manifested by the gods they worship) and creative (shown thru the art, music and dance as their offerings to their gods) spiritual processes. The *subak* system of the Balinese showcases their profound connection with their land and their natural environment, while the *banjar* system exemplifies a truly democratic social arrangement that governs their communal activities.

Viewing wellness as a holistic, dynamic and life-long process leads one to an eco-systemic model (Kirsten, Van der Walt & Viljoen, 2009) of health, wellness and wellbeing that describes the complex web of interactions within the human person as well as his/ her dealings with the external environment. Illustrated below, the eco-systemic model, as conceptualized by Kirsten, Van der Walt, and Viljoen (2009), views wellness from a multi-disciplinary approach, looking at individual human being as a totality, a complete person with certain distinguishable yet inseparable biological, psychological, and spiritual characteristics. Following a '*holistic systems theory*', they claim that '*it would be impossible for a person to live without being a bio-psycho-spiritual being*' and that this totality of the human being is '*inextricably linked to the state of the health of his or her physical and symbolic environment*' (Kirsten, Van der Walt & Viljoen 2009). They also echo Olivier, De Jager, Grootboom, and Tokota (2005) who portrayed wellness as a '*conscious process of holistic self-development, based on personally determined goals for wellbeing*' that will eventually result, among others, to the health and well-being in the community (Kirsten, Van der Walt & Viljoen 2009).

Natural Aesthetics



Figure 3. Visual Graphics of Natural Aesthetics

WOW Bali’s integration of ‘*natural aesthetics*’ into creative collaboration explores how human-centered designs can be applied in ways that enable us to ‘*mutualize*’ with nature through the course of human development. Being in harmony with nature, first and foremost, should allow us to understand human-nature processes—doing or acting, thinking, feeling, and knowing—and connect us at different levels with one another. Without an understanding of the *self* through Dynamic Wellness, we can never really understand and connect with people around us. How can one expect to really find connection with other species with which we happen to coexist in this planet if we are not connected with ourselves and with our fellow human beings? This is among the basic questions WOW Bali hopes to answer in its efforts in sustainability and wellness. It looks into the natural connections humans innately possess and examines why natural aesthetics designs are fundamental to our symbiosis with life and harmonious relationship with nature.

And so WOW Bali turns towards Balinese natural aesthetics and the interactive processes with which the local people have managed to produce cultural landscapes that have now become major tourism assets. Based on case studies of WOW

Bali, the Balinese culture is still largely dependent on the people's high regard for their relationship with nature, with other people and with the divine. Hakim, Kim and Hong explained that communities in many parts of the world have created cultural landscapes as they interact with nature in order to survive and sustain themselves, but the cultural landscape of Bali is so unique it has gained for the island the image of '*paradise on earth*' (2009). According to them, the community's belief in the Tri Hita Karana has a lot to do with it. This philosophy also influenced the Balinese system of spatial planning and management that provides for biodiversity conservation, exemplified when a specific zone has been declared '*sacred*' by the local community. This case leads to '*low disturbance due to anthropogenic factors, and provides opportunities for biodiversity to survive*', making it an '*excellent model for the achievement of sustainable development*' and has been enlisted by UNESCO (2012) in the World Heritage Site.

Preserving the authenticity of Balinese cultural traditions serves various purposes, tourism being the most obvious. Nakamura's ethnography (2003) highlighted how the commodified traditional culture of the Balinese, which fuels tourism receipts for the state-led development, served as an effective leverage against President Suharto's authoritative regime that undermined minority cultures in Indonesia. Nakamura (2003) characterized the Balinese as a people who had been able to progressively appropriate their '*adat*' or indigenous tradition amidst state pressures, allowing its continual flourishing.

In 2012 Lietaer and DeMeulenaere highlighted another aspect of the Balinese society that exemplifies cultural resiliency and sustainability amidst a rapidly globalizing world—the *banjar*. It is the basic social unit in the local Balinese society which continues to function in a '*decentralized, democratic, cooperative*' way despite its ancient origin (Lietaer & DeMeulenaere, 2012). Their research led them to find a dual currency system within the *banjar* that they proposed to underlie the enduring resiliency of the Balinese socio-cultural fabric despite the pressures of tourism. They reported of a '*strong system of mutual cooperation*' held together by this double currency system that utilizes both monetary and time contributions of community members. Measured in both rupiah and man-hours of community service, this system is capable of mobilizing resources aimed at accomplishing local projects (Lietaer & DeMeulenaere, 2012).

Lietaer and DeMeulenaere (2012) extrapolated that warding off global economic threats may require adopting a dual or complementary currency system alongside a strong grassroots structure that helps weave a resilient economic and socio-cultural fabric in both the developed and developing world. In the same manner, this approach can be applied in efforts to rebuild sustainable

communities whose cultural diversity have so often been torn down by the forces of globalization (Lietaer & DeMeulenaere, 2012).

Lastly, we focus our attention to the Balinese *subak* system that covers how irrigation water is managed in the agricultural community. UNESCO (2012) described the *subak* as ‘*cooperative water management system*’ with four components—the forest which sustains the supply of water; the landscape of rice terraces and rice fields connected through a circuit of canals, tunnels and barriers; the villages; and the water temples. Upon examining this elaborate system of irrigation, with all the infrastructure, social organization and the artistic rituals performed around the management of the *subak*, one finds the ancient philosophy of Tri Hita Karana as the lynchpin which has shaped and kept together the Balinese landscape that locals and tourists alike continue to enjoy. All this aimed at sustaining the harmonious relationship between the human, natural, and spiritual world (UNESCO 2012). As one of the World Heritage Sites, it has a significant cultural and physical importance that conveys a universal value worth preserving. According to Dean Ir Gede Sedana of the Department of Agriculture in Dwijendra University, the *subak* ‘*is not only an institution in agriculture, but also as a part of Bali’s local wisdom about human society and its relationship with the environment*’.

A major concern facing the *subak* system at present is that ‘the terraced landscape is highly vulnerable to a range of social and economic changes, such as changes in agricultural practices and increasing tourism pressures’ (UNESCO 2012). According to Roth, developments characterized by the rising shift of land and water resource use from agricultural to residential and tourism purposes over the past decades have posed ‘*a major threat to the continued existence of the subak in many areas of Bali*’ (2011). UNESCO (2012) underscored that the sustainability of the *subak* systems requires support to the traditional system and provision of incentives for farmers to stay on the land.

For WOW Bali, the *subak* system is one manifestation of natural aesthetics practiced on a cultural scale that has endured many generations. However, given the recent developments in Bali, the *subak* system and the whole agricultural landscape have seen several transformations. Looking at the issue through the lens of natural aesthetics, WOW sees the need to preserve the traditional irrigation system as this has vital implications to sustainability; more so because the *subak*, in the Balinese customary law, has the properties of socio-religious agriculture representing farmers’ associations that manage irrigation system in paddy fields. The dynamics of the *subak* enables a deep connection between the Balinese way of life and the natural ecological system.

WOW Bali found the application of the Balinese natural aesthetics in designing a multi-function house for its Smart Center Ecological Village sustainable development project in response to the need to preserve Bali land resources and allowing the farmers enough incentives to stay on the land. Dubbed as ‘WOW House’, this multi-function building is based on Balinese architecture and made of coconut wood. It has been designed to have zero to minimal ecological footprint and utilizes low-cost renewable energy solutions for its lighting and power needs to exemplify the principles of modern sustainability.

Creativity and Love

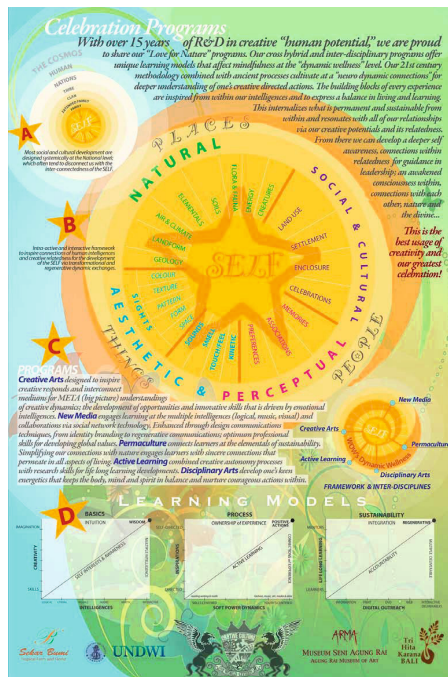


Figure 4. Visual Graphics of Celebrations Program

Having extensively researched and worked around the area of alternative learning, WOW Bali has developed ‘Celebration Programs’ to inspire a more sustainable way of living by activating human creative potential especially among children and youth. This program utilizes a creative learning curriculum that allows them the freedom to learn, thereby empowering them with the ‘creative autonomy’ to take greater positive actions based on their creative awareness.

When one recognizes the value of what is being learned, one is empowered and inspired to take greater positive action. WOW adheres to the belief that the highest context for learning is when one has the freedom to learn and create, to follow one's own chosen process and purpose.

Rowlands (2011) recognized the increasing interest towards creativity in the modern education setting, although the focus on creativity nowadays is geared toward promoting '*romantic individualism*' and is driven mostly by the penchant for novelty rather than on '*developing the potential to be creative within the disciplines*'. He supports the argument that '*the vast majority of humankind is capable of truly creative acts*'; thus creativity may be attributed to any learner and not only to so-called '*geniuses*' (Rowlands 2011, O'Brien 2012). O'Brien (2012) shared with the general consensus to consider creativity not as a '*fixed trait*' of an individual but a universal process of learning which involves '*higher order thinking and engagement*', as well as a '*sustainable and replicable intellectual practice*'.

According to Rowlands (2011), reducing creativity to innovation-oriented concepts can '*undermine the true creative potential of the vast majority of children*', more so when creativity is fostered for the purpose of advancing the interests of the current monetary-based global economy. Along with Craft (2003) he encouraged the education sector to challenge the desirability of the prevailing global economic system that promotes innovation-oriented concept of creativity which fuels a consumerist culture that relies on the built-in obsolescence of consumer products (Rowlands 2011). Challenging this basic assumption in perceiving and applying creativity in the modern age comes close to the very issue of sustainability that is at the core of WOW Bali's opus.

This key pillar of WOW Dynamic Program focuses not only on inherent human creativity but also on one's innate capacity to learn. WOW Bali upholds 21st Century learning as its pedagogical paradigm characterized by the following necessary skills set which fall under key domains as identified and explained by Trilling and Fadel (2009) and summarized by Kivunja (2014): the first key domain is composed of the basic skills in literacy, i.e., reading, writing and numeracy. The domain of learning and innovation skills include critical thinking, problem solving, communications, and creativity and innovation. The third domain, career and life skills, cover collaboration and teamwork, leadership and responsibility, initiative and self-direction, flexibility and adaptability, social and cross-cultural interaction, career and learning self-reliance, and productivity and accountability. The last domain recognizes social evolution in the 21st century given the influence of digital media and technologies. Information and communications technology (ICT) and media literacy fall under this domain.

WOW Bali complements its use of 21st century learning paradigm with active learning, which comes from the cognitivist and constructivist traditions that support the notion that learners construct knowledge through active participation and experiential interactions of the individual learner (Piaget 1981) within his socio-cultural environment (Vygotsky 1978). Kivunja also proposes a shift in pedagogy towards '*digital connectivism*' as espoused by Siemens (2004). Parallel to this, Hoffmann, Cropley, Cropley, Nguyen and Swatman (2005) emphasized that '*[h]uman creativity frequently (some argue always) involves some sort of collaborative effort and IS [information systems] can provide means for relating to others or disseminating results*'. In this regard, WOW Bali maximizes digital technology and social media to regenerate knowledge and facilitate learning between collaborators, as opposed to the 'Do-It-On-Your-Own (DIOYO)' model. With digital connectivity integrated into social and experiential modes of knowledge acquisition,

[l]earning is no longer a lonely, DIOYO experience, but an interactive activity within dynamic communities that comprise Peer Learning Networks. This new approach to learning creates opportunity for an understanding of how social constructivist learning processes can be enriched, extended and improved to levels hitherto unseen, as a result of embedding computer-mediated digital technologies and using them as tools for active learning, critical thinking and problem-solving, innovation, creativity and teamwork in 21st century learning and occupations (Kivunja, 2014).

Inspiring self-directed learning that eventually leads to life-long learning of individuals is a parallel goal for implementing the Celebrations Program. Knowles (1975) referred to self-directed learning as

the process in which individuals take the initiative, with or without the help of others, in diagnosing their learning needs, formulating learning goals, identifying human and material resources for learning, choosing and implementing learning strategies, and evaluating learning outcomes.

Contrary to common notion of self-directed learning being an individual, isolated venture undertaken in the 'DIOYO' fashion as Kivunja (2014) pointed out, self-directed learners make use of both technological means as well as interactions with people—'*peers and colleagues, teams, informal and formal*

social networks, and communities of practice' (Kerka, 1994 as cited in Dunlap &Lowenthal, 2011).

The Celebrations Program serves as the amalgamation of WOW Bali's extensive pedagogical research and experience. The program is internationally recognized and based on case studies produced for the National Alliance of New Media Arts and Culture (NAMAC.org) and was applied for the Digital Global Ambassadors Programs of UNESCO and ZeroOne.org at the ISEA Symposium sponsored by Adobe, Inc.

The Cultural Wealth Collaboration Project of WOW Bali uses the Celebrations Programs, with its curriculum targeting to develop learners to connect with their inner being (the *self*) towards living a more balanced life via one's creative autonomy and transformative leadership framework (in short, freedom to be and to relate—leading to empowerment).The backbone of this framework is to empower learners with 21st century new media skills, communication designs techniques, and to maximize one's creative potentials. These potentials will enhance their professional skills for any industry, enabling them to actively participate. These same professional skills aim at supporting our ecological awareness via the application of new media for regenerative sustainability and wellness development. Based on the UNESCO and NAMAC.org case studies, the Celebrations Programs have proven to be affective in inspiring learners to be more intuitive and self-directed in their learning experience, helping them develop a more sustainable process in living.

However, merely equipping learners with skills is not enough if the goal is to help them become successful 21st century life-long learners (Dunlap & Lowenthal, 2011). They point out the essential role of having metacognitive awareness (Briggs & Moore 1993); that makes learners become conscious and reflective about their own learning processes, allowing them to have control over their learning, to plan and strategize their learning activities, to self-assess and evaluate their learning progress, and to make adjustments as they see fit (Dunlap & Lowenthal, 2011).⁵

WOW Bali's recent inquiry into the nature and sources of creative potential leads to the relationship between '*love and creativity*'. If we are to holistically consider sustainable human development, we feel the need to pay attention to these two things—*love* being the highest of human emotions and *creativity* as human's greatest ability—for the implications they have upon human wellbeing.

⁵ Dunlap and Lowenthal summarized the works of other authors on the topic of metacognitive awareness of learners: Brockett & Hiemstra, 1985; Brookfield, 1985/1991; Glaser, 1984; Ridley, Schultz, Glanz, & Weinstein, 1992; Von Wright, 1992.

Määttä & Uusiautti's (2011) extensive literature review on the nature of and connections between love and creativity revealed some paradoxes. It is worth noting on the one hand that love can be referred to as '*motivation and energy*' as well as an '*active force*' but never can creativity or love be made or developed by force, neither can external motivation or compulsion nurture both (Määttä & Uusiautti's 2011). Furthermore, love and creativity involves '*solving constant conflicts, and non-stop molting and reproducing the experiences of real actuality*'. In relation to human wellbeing, Määttä & Uusiautti (2011) claimed that love and creativity had been responsible for mankind's survival and cultural development and everyone needs both to keep a healthy society. Their inquiry concluded with a note supporting the development of creativity among children and the teacher's role in it:

because of the connection between love and creativity, it seems reasonable to assume that a teacher who applies pedagogical love could foster students' creativity regardless of the educational level. Pedagogical love provides a specific teaching attitude and shows in quite a concrete way that acting in the teaching profession as the core of pedagogical love consists of trust in pupils' learning capacities and the desire to help pupils improve their abilities and talents⁶ (Määttä & Uusiautti's 2011).

Regenerative Leadership



Figure 5. Visual Graphics of Regenerative Leadership

⁶ The same can be gleaned from other works of Määttä. See Määttä, K. (2011a). The fascination of love never fades – How do the elderly describe their experiences of falling in love? *International Review of Social Sciences and Humanities*, 2 (1) and Määttä, K. (2011b). The sweet poison of love in adolescence and early adulthood. *Elixir Psychology*, 37,3836-3843. [Online] Available: http://elixirjournal.org/articles_view_detail.php?id=1141&mode=pdf.

Creative autonomy in learning seems to be a prelude to ‘*regenerative leadership*’. The learning cycle has greater impact once the learner is able to share and inspire others to learn as well. Following this principle, the learning process not only becomes regenerative in terms of knowledge sharing: learning (for both teachers and the learners) takes on an evolutionary path—it takes them to a whole new level of learning and understanding. This model of regenerative leadership deviates from the old paradigm that espouses the leader-follower dichotomy. The task of the leader in the 21st century is not to create an army of followers but to inspire new leaders.

Peterlin, Dimovski & Penger (2013) proposed sustainable leadership development based on multiple intelligences, among which interpersonal intelligence should play a central role. In this model, they define leadership as ‘*directed towards future generations, taking into account well-being of society and nature*’. They argued that sustaining a fundamentally diverse world requires incorporating the concept of sustainability and translating it into actions through leadership development within business and organizational environments. This will entail a reorientation towards the kind of leadership that, as explained earlier by Kras (2007), allows for the rethinking of dualistic assumptions and fosters greater awareness towards the interrelatedness and interdependence of the human and natural environments.

Given their evolutionary design, WOW Dynamics Programs aim to regenerate new leaders. The regenerative leadership framework necessarily integrates sustainable dynamics thinking, natural aesthetic designs, creative autonomy, and active consciousness. In today’s efforts for sustainable development, everyone needs to exemplify leadership by taking responsibility for our own actions. Active and dynamic exchange via different modalities of intelligence within this framework empowers leaders to inspire holistic participation rather than reaffirming the old paradigm of hierarchy that creates greater indifference and separation.

Social Holistic Entrepreneurship

From these ranks of leaders will emerge the ‘*Social Holistic Entrepreneurs*’ who will champion and regenerate innovative solutions for sustainability. This model of social entrepreneurship aims to develop among social innovators a holistic outlook of sustainability—one which not only creates new products and services with positive social impact, but also bridges new relationships that foster sharing of diverse ideas and resources which can only bring forth exponential results

for the community. As Westerlund (2013) mentioned in a lecture series for the Technology Innovation Management Review,

we need entrepreneurs and leaders with the courage and conviction to take bold action ahead of others. We also need radically new business models that create true value for the environment and society, bring competitive advantage to companies, and have the potential to transform industries globally.

Majid and Koe (2012), who pushed for sustainable entrepreneurship, documented the transitions from largely profit-oriented beginnings of entrepreneurship toward the recent integration of sustainability. This transition saw some entrepreneurs buying into sustainable development with profit opportunities as their main motivation, looking only at sustainability as mere unmet demands that need to be supplied with ‘sustainable’ products and services.⁷

The study of Parrish (2010), brought to the fore the contributions of entrepreneur groups whose primary motivation is to directly influence sustainable development through their business ventures. The revised model for sustainable entrepreneurship that Majid and Koe (2012) were proposing underscores a balance in all four domains—economic, social, ecological, and cultural.

Given this transition, WOW Bali responded by redefining social entrepreneurship to become ‘*social-holistic*’ (SO-HO) in recognition of the holistic social dimension of business development for it to support real efforts in sustainability. Entrepreneurial models have reached new heights in sharing prosperity with communities, producers, and farmers. Organic production, for example, has to be redefined for real sustainability; otherwise, modern organic lifestyle entrepreneurs can be just another business model making organic produce expensive for consumers and organic farming unsustainable for local farmers. Regional sustainability models and regenerative solutions for organic and

⁷ See also Cohen, B. and Winn, M.I. (2007). Market Imperfections, Opportunity and Sustainable Entrepreneurship. *Journal of Business Venturing*, 22(1), 29-49; Crals, E. and Vereeck, L. (2004). Sustainable Entrepreneurship in SMEs: Theory and Practice. Conference proceedings in 3rd Global Conference on Environmental Justice and Global Citizenship, February 12-14, 2004, Copenhagen, Denmark; Dean, T.J. and McMullen, J.S. (2007). Toward a Theory of Sustainable Entrepreneurship: Reducing Environmental Degradation through Entrepreneurial Action. *Journal of Business Venturing*, 22(1), 50-76; Gibbs, D. (2009). Sustainability Entrepreneurs, Ecopreneurs and the Development of a Sustainable Economy. *Greener Management International*, 55, 63-78. Schaper, M., Volery, T., Weber, P. and Lewis, K. (2011). *Entrepreneurship and Small Business*, (3rd Asia Pacific ed.). Milton, Australia: John Wiley & Sons; and Schick, H., Marxen, S. and Freimann, J. (2005). Sustainability in the Start-up Process. In Schaper, M. (Eds.), *Making Ecopreneurs: Developing Sustainable Entrepreneurship* (108-121). Hampshire: Ashgate Publishing.

ecological production have to be redefined in order for organic productization to be effective in ecological conservation and affective for the producers at the same time.

The social holistic entrepreneurship model is aligned with Zero Emissions Research and Initiatives' Blue Economy philosophy. Business models that support the Blue Economy are characterized by their capability to introduce products and services to the market at competitive prices, and at the same time consciously contribute towards the strengthening of social capital and environmental stewardship (Pauli, 2012).

Celebrations and Ceremonies



Figure 6. Visual Graphics/ Poster of New Celebrations and Ceremonies

Based on case studies of Balinese culture, celebrations and ceremonies play important roles in social and community life. They are vital elements of sustainable human development in so far as they signify what people hold valuable or essential. People celebrate what they value until it becomes embedded in the collective consciousness, which binds and connects them together. Moreover, WOW Bali came to discern that celebrations and rituals are processes of creativity of the Balinese people. Their ceremonies highlight their highest creative expressions—the arts, i.e., music, dances, visual arts, food, etc. – the same things that define the wealth of a culture and form part of its people's cultural identity and have vital implications on their social well-being.

The eco-systemic view of wellness (Kirsten, Van der Walt & Viljoen, 2009) rationalized how cultural and spiritual processes and the physical and symbolic environments surrounding the individual human person are inherently linked to his/her health and wellness. This being the case, WOW Bali re-adapted the celebrations and ceremonies as community-based dynamic wellness processes, which are now considered important aspect of WOW Bali's programs that aim to enhance human wellbeing as the key towards sustainability. Aside from the arts, simple modalities of movement, breath work, and the use of elementals are also being considered in enhancing the wellness of body, mind and spirit. WOW Bali believes that returning to balance or wellness should require only simple process that are accessible to everyone. E-Celebration and Wellness Sundays were two of the community outreach programs developed by WOW Bali in 2014 based on new celebrations and ceremonies.

According to WOW Bali, at the end of all the efforts in sustainability is a celebration of abundance; thus, the integration of celebrations and ceremonies to its sustainability framework as a way to connect with people across cultures. As a leading organization promoting sustainable lifestyle, WOW Bali is creating new ways to celebrate with the fusion of music, visual and kinesthetic modalities—minus the excesses and transgressions typical to modern celebrations. The events also serve as venue for cultural creatives in the community to share their art and allow other people to participate—a manifestation of collective creativity.

Cultural Fusion



Figure 7. Visual Graphics/ Poster of Cultural Fusion

‘Cultural Fusion’ can be considered among WOW Bali’s social experiments. This process of mixing or combining elements of two or more cultures provides a framework for bridging connections and understanding between and among cultures (east and west), and across generations (ancient and modern). However, globalization has come to undermine the balance inherent to cultural fusion due to the dominance of the monetary-based society, diminishing the value of most indigenous cultures. What we need in sustainable human development is a framework that inspires the sharing and preservation of cultural wealth given the best of what modern culture can offer.

With globalization encroaching on cultures, holistic cultural collaboration addresses global holistic participatory concerns related to the sustainability of the planet. Identifying cultural diversities not only allows us to celebrate uniqueness, but to define the sacred balance of sameness among cultures. In this sacred balance we can bridge understandings and co-create a more dynamic future.

Cultural fusion not only bridges people across cultures but also across generations. This allows people today to become aware of ancient cultural practices using modern media—a manifestation of ancient-future integration. This process is one way by which WOW Bali is promoting a global society. It provides a venue for synergistic and holistic engagements between and among people from different cultures and generations—a venue needed to address the global systemic sustainability problems we need to resolve as a collective.

Sustainable Dynamics Creative Collaborations

WOW Bali International Initiative models social collaborations between and among stakeholders upon natural processes of mutualism and evolutionary design. Following the Sustainable Dynamics framework, it approaches collaborations from systemic, holistic, interdisciplinary and participatory standpoint where stakeholders are considered as interdependent actors working synergistically towards a common vision. Since the collaborations are dealt with human actors, WOW brings the human-centered design at the core of its partnerships.

It is important to note of these collaborations’ interdisciplinary nature. Its partners and collaborators come from the different stakeholder groups, wanting to participate and co-operate under a common goal of sharing resources. They also share the same systemic, holistic outlook towards sustainable development. Interestingly, WOW’s long-term partners in sustainable dynamics are those who have **sole proprietorship of businesses** that espouse social-holistic (SO-HO) entrepreneurship. The partners are also observed to be economically sustainable and have strong global consciousness.

What follows are case study narratives describing the collaborations initiated by WOW with different community partners based on key informant interviews, workshops proceedings, and participant observations undertaken in March until April 2014. Given the active learning component of WOW collaborations, where communications have been mediated online, the data gathering necessary to create these narratives have been extended even after the said period. This is to consider the evolutionary aspect of the model which considers the collaborations not as static processes, but as contingent to changes depending on the dynamics of the relationship between the stakeholders.

Cultural Wealth Collaborations: Sekar Bumi Farm and WOW Bali



Figure 8. Photo-documentation of several activities at the WOW Smart Center in Sekar Bumi Farm, Desa Kerta Payangan, Gianyar, Bali

Sekar Bumi Farm, owned and managed by Pak Ketut Subagia, is the largest heliconia (common name: bird-of-paradise) farm and agrotourism destination in Bali, Indonesia. It is co-developing a long-term partnership in ‘sustainable dynamics’ with WOW Bali to share its Global Banjar vision. The resource-sharing and joint efforts between the two serve to co-develop new ecological sustainability standards and solutions and to showcase these for the sustainable agrotourism sector as a Cultural Wealth Area for the Regency of Gianyar in Bali, Indonesia.

Pak Ketut originates from a family of farmers who have toiled the land for generations. He was born and raised in Desa Kerta, considered to be among the most pristine organic lands in Bali, as it is situated in the rain-belt region of the island. Bali, to him, is a ‘paradise island’. Having been brought up as a farmer by his great grandfather and his father, he has taken on the job of taking care of his community and he is happy to do it. Farming, in this sense, becomes a form of ‘celebration’ for him. He currently manages eighteen (18) hectares of tropical flower farm.

Situated seven hundred meters (700 m) above sea level, Sekar Bumi Farm is also a showcased ecotourism, agrotourism, floriculture and agroforestry site. Pak Ketut Subagia is cooperating with Pak Made Gunawan, the village chief of Kerta, and other stakeholders to develop the area as an ecotourism district. While the village is willing to offer the abundance of their village to tourists, finding the balance in sustainable development of ecotourism and agrotourism is the key towards preserving their land. The people opted for ecotourism development and not the usual tourism development for hotel establishments and villas to cater to the need for more accommodation and services. In this way, the local village can keep the land for the farmers to till. The local village is also working with other *yayasan* and the academe through the Udayana University and Dwijendra University to develop young students' interests and skills in farming and ecotourism.

Sekar Bumi Farm and WOW Bali are currently co-developing an ecovillage with a fully sustainable ecological lifestyle and offering adventure, ecological and cultural tours to revitalize the economy of the local village. This is in view of the ongoing over-development due to the ever growing demands of the tourism sector. WOW Bali complements these developments with modern active learning Celebrations Programs for children in the village. These programs aim at developing 21st century life-long learning skills for children and youth to stay in the village and sustain their local farming livelihood but at the same time become global contributors by taking advantage of the power of the internet and social media.

Beyond the need to sustain the entrepreneurial aspect and social responsibility inherent to this collaboration, the relationship is nurtured by the human bonds of friendship formed between the people behind these two organizations. With this sustainable dynamic, they have successfully collaborated with other stakeholders and cultural creatives. In August 2014, they have co-created with the Department of Floriculture of the Ministry of Agriculture of Indonesia and the Local Government of the Regency of Gianyar to conduct the First International Heliconia Congress. This international event was conducted alongside the WOW Kreatif Camp organized in collaboration with artists from Snerayuza Art Space. The WOW Paradise Sustainable Ecotourism Program was launched during the event with focus on Dynamic Wellness, the WOW Smart Center Ecovillage Project and the Global Banjar Vision, which had been expanded in 2015 to another region in Bali, specifically in the village of Batur in Bangli Regency. Pat Ketut Subagia bridged the collaboration between WOW Bali and the Batur Management Team to start WOW Batur Project or the Pekraman Puri Pelisan, a

regenerative model for community-based cultural tourism. Lake Batur, situated within the crater of Batur Volcano, supplies most of the island's water, which is the lifeblood of the Balinese culture. This collaboration project pays tribute to the significant contribution of Batur and the local communities living in this sacred land, headed by their high priest, Jero Gede Alitan.

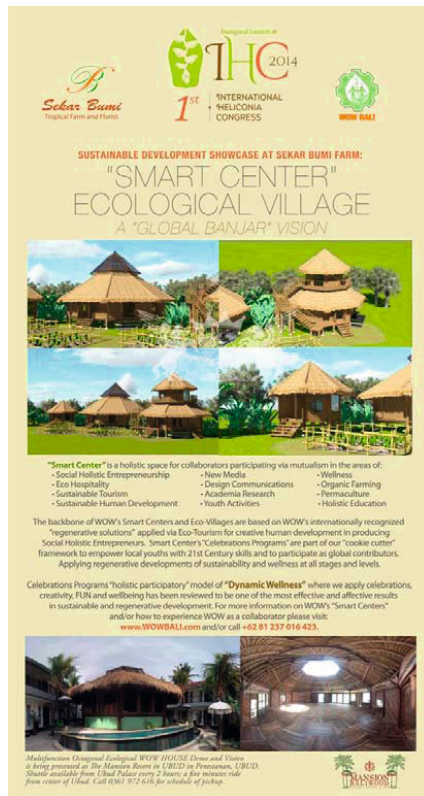


Figure 9. Poster/Visual Graphics of the "Smart Center" Ecological Village Project

The eco-village development project is a long-term collaboration between WOW Bali and Sekar Bumi Farm. The partnership is set through the fusion of efforts directed towards the preservation of Balinese natural aesthetics—local culture, natural resources and ecological biodiversity for the next generation. Through ecotourism, this local best practice is regenerated internationally, allowing people of other cultures to participate in what Sekar Bumi Farm

envisioned to be a 'Global Banjar'. Their relationship is founded upon a spirit of togetherness; of *'shared responsibility and shared reward'* (Lewis 2013).

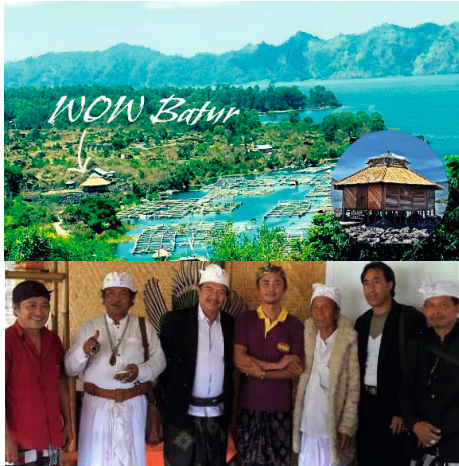


Figure 10. WOW Batur, Pak KetutSubagia (leftmost), Hai Dai (center), and JeroGedeAlitan (3rd from right) together with the rest of Batur Management Team.

Eco-life Development: The Mansion Resort Hotel and WOW Bali



Figure 11. The Mansion in Ubud, Bali

The Mansion Resort Hotel is a five-star hotel located in the village of Ubud, Bali. Its collaboration with WOW Bali aimed to develop and showcase dynamic wellness programs and implement eco-effective solutions that could transform and improve efficiency in the use of resources in luxury settings. Adhering to 'green' principles as the basic step towards ecological sustainability, The Mansion practices environmental and sustainable dynamics. The Mansion also supports events that showcased 'cultural fusion' of Balinese theatrical and musical performances with modern music and dance from both eastern and western cultural influences.

Ibu Claudine Jusuf is the sole owner of The Mansion. What brought her to collaborate with WOW was her vision of a global society. She saw this partnership with WOW Bali as a way to achieve that vision. Transforming The Mansion into a model hotel for ecological sustainability while maintaining tourism and hospitality standards for people from all over the world to come and learn about sustainability and wellness is one of the missions of this collaboration. She coined the term SO-HO (social-holistic) entrepreneurship to recognize the holistic approach of initiatives that delve into the social dimension of sustainability. As part of her collaboration with WOW Bali, she offered several spaces within the premises of The Mansion to develop several sustainable and wellness projects. The WOW Affect 2014 New Year Celebration was at the hotel's Art Tribute Palace. Proceeds from this event were supposedly allocated for the development of the 'House of Wellness' to showcase various sustainable products from the community, and the Farmers Organic Marketplace and Manufacturing Area to present sustainable production.

The Mansion also showcased the WOW House—a fully sustainable house based on local Balinese architecture and natural aesthetics for eco-village development. An Organic Seedling Greenhouse constructed out of recycled plastic bottles was also showcased for growing aromatics herbs, Balinese spices and organic vegetables.

The New Media Lounge, which served as the headquarters of WOW Bali in 2013 until 2014, was housed within the Puri Raja area of The Mansion compound to offer dynamic and creative alternatives to learning and wellness. WOW Bali and The Mansion's New Media Lounge offered 'state of the art' multimedia programs to maximize one's visual and acoustic experiences. Designed for full immersion of one's emotional intelligence, the programs were based on celebrations and artistic performances for creative learning autonomy.

The sustainable dynamics in this collaboration allowed the bridging of two stakeholder groups: business and non-profit NGO with a common vision for a

global society. The Eco-life Development project was unique in that it brought together two stakeholders that would otherwise be pursuing opposite objectives—profits for business and social good advocacies for non-profit. Collaboration can also happen in unexpected ways as Schneider (2007) would put it. On the other hand, the project itself had a business development component attached to it, which makes the existing relationship between the stakeholders a little more complex, especially for a non-profit organization. This type of partnership was supposed to be carried out in the long-term with strong leadership, patience and perseverance (Lewis, 2013) as well as open communication between stakeholders for it to work out in a mutualistic way. Needless to say, clear cut outcomes and processes of exchange would have to be put in place to guide all those involved in the collaboration, which ended in December 2014.

The main lesson gleaned from the partnership was that collaborations are a dynamic process. Reflecting on a lesson from the Barefoot Connection, sustainability should not be mistaken for longevity and development actors have to learn to about

organic cycles of birth, life and death, each paving the way for the next cycle. Sustaining the life of something as desirable in itself can lead to stagnation, worse than death. Rather, what needs to underpin sustainability are qualities and abilities of leadership, learning, creativity, freedom, mutuality, responsibility, response-ability etc. that enable change to be learned from and worked with, that enable continuous organic development and healthy change (CDRA, n.d.).

Community-Supported Agriculture: Kerta Generations and WOW Bali



Figure 12. Workshop with WOW Bali, Kerta Generations, and The Fat Radish

Pak Made Gunawan, the chief of Desa Kerta, had a vision for his village located at the tropical rain-belt region: to be the center for organic farming and agroforestry in Bali. They kept this aspiration '*inside them*' for some time as they found it difficult to introduce to the people. Given this missing piece of a puzzle, they got connected with Hai Dai, the founder of WOW Bali. This connection has led them towards a collaboration founded upon mutual trust. In 2014 planning and development for the area has been ongoing between the WOW Bali, the community and the local government to prepare the community towards the achievement of this vision.

The land area of organic farmland offered for long-term co-development totals to 115 hectares. Local farmers grow both food and flowers (heliconia) in the area to sustain their livelihood. At present they are looking at ecotourism and agritourism as a way forward. The Kerta Generations have undergone series of workshops with WOW Bali to holistically participate and collaborate.

To jumpstart this partnership, WOW enjoined the efforts of Matt Malerba of Fat Radish, a seed-saving permaculture group advocating Community-Supported Agriculture (CSA). He was creating a seed bank in Bali to offer an alternative for large multi-national seed companies that are '*destroying the seeds of the world*'. His efforts aimed to help farmers create and sustain agricultural biodiversity. His seed saving technology is likened into a seed library, where the organization keeps track of organic seeds from all over the world and exchange them with local farmers for cultivation. Organic seeds can be used to grow vegetables again, whereas hybrid seeds do not regenerate, forcing farmers to buy seeds every planting season.

Seed saving allows the creation of a community—the mere act of sharing and exchanging seeds for farmers to grow starts the process of community building. And it does not end there: farmers are also encouraged to share their farming techniques, their 'secret' process by simply exchanging information.

The Community Supported Agriculture (CSA) Project is a collaboration with The Fat Radish (a permaculture and seed saving organization) and Kerta Generations (Youth) that promotes affordable and sustainable organic vegetables to every home. The objectives of this collaboration project is to create economic sustainability for the village; integrate ecological (organic) farming practices; have active learning to teach the generation new permaculture knowledge; regenerative education for other farmers; and, produce permaculture products.

This project had been initiated with the local community during the first quarter of 2014 with initial workshops undertaken. Active learning programs for

local farmers to train on permaculture and seed saving would have to be taken on for the project to evolve. What this project taught us is that if we are to put the burden of food sufficiency to our local farmers, we should partner with them to provide the necessary support and incentive they need to protect and enhance their livelihood, compete in the market, sustain their land and natural resources within the community and at the same time look after their own well-being. These challenges led WOW Bali to look at the issue of marginalization of farmers from a systemic viewpoint and develop holistic solutions and interdisciplinary responses that carry out a truly participatory way of sustainable development.

Sustainable Eco-village Development: Bindu Village and WOW Bali



Figure 13. Farmlands at Bindu Village

Bindu Village is located ten minutes away from the international tourism hub of Ubud in Bali. Pak Gusti and Pak Tri Suda Pala represent the partners of WOW Bali in this project with their land offering of five hectares. WOW Bali aimed to exemplify full sustainable dynamic collaboration through this project. How?

What motivated the partners to collaborate with WOW Bali was the need to preserve the land amidst the ongoing land conversion in Bali. WOW Bali, on the one hand, saw this opportunity to practice ‘holistic participation’ in creating

a win-win-win solution for all stakeholders concerned. Pak Gusti, Pak Tri and Pak Hai Dai envision the five-hectare area to become a fully sustainable five-star eco-resort, minus the monolithic structure and heavy ecological footprint that characterize most high-end tourist accommodations nowadays.

To accomplish this, WOW Bali would bring all other ‘sustainable dynamics’ partners into the picture. Permaculturists will come in to help the local farmers transform the current monocrop land into an organic polyculture area. The Mansion will help put up high quality hospitality services for the eco-village. The WOW House will serve as the model for accommodation for tourists. Manpower for the eco-village management will be taken care of by the local university.

The partners, by themselves, see the detriments of mainstream development onto Balinese land and people; thus, their advocacy to return to cultural and natural aesthetics through this collaboration initiative. Pak Tri of Tri Hita Karana Bali is a practitioner of Slow Food (opposite the fast food culture), and had been supportive of WOW Bali’s efforts since the very beginning.

Creating Local to Sharing Global: Dwijendra University and WOW Bali



Figure 14. Signing of MOU between Dwijendra University and WOW Bali

Dwijendra University is the oldest professional ethics University in Bali offering programs from Kindergarten up to Bachelor Level. Dwijendra University, through the Dean of the College of Agriculture Prof. Gede Sedana, collaborated with WOW Bali to implement the ‘Sustainable Dynamics Collective’, with

emphasis on Dynamic Wellness within its curriculum and to initiate local academic exchanges such as symposia to share knowledge, expertise, and research and development (R&D) initiatives on sustainability and wellness based on the Balinese culture. They were also planning to co-develop academic case studies and researches, and later on share community-based sustainable development projects globally through international academic conferences for the regeneration of the framework and the best practices built around it. This will include hosting and inviting students and teacher in Indonesia, experts, researchers and other practitioners from all over the world for creative collaborations in sustainable development.

Dean Sedana from the College of Agriculture spearheaded the collaboration with WOW Bali through the initial conduct of the Awaken the Spirit Conference in 29 March 2014. This event launched the Sustainable Dynamics Framework for collaborations, showcasing the different collaborations with local stakeholders in Bali. He discussed about the *subak* system, the traditional system of irrigation sustaining the agricultural way of life in Bali. WOW Bali considers the *subak* system as a form of natural aesthetic designs fundamental to the Balinese communities' symbiosis with life and harmonious living with nature—the backbone of sustainability.

One can trace the beginnings of this collaboration between WOW Bali and Dwijendra University out of the need to preserve the Balinese subak system amid the increasing shift in land and water resource use to respond to the growing demands of the tourism industry. Sustaining the *subak* system means sustaining the cultural landscape of Bali and the social fabric that keeps the local population together—their ancient philosophy of Tri Hita Karana. The academe plays a special role in ensuring that this ancient knowledge gets passed on to the next generation, which is a function not only of cultural fusion but a social responsibility in itself.

CONCLUSIONS

Despite the lack of a comprehensive theoretical framework for sustainable development, and given the varied roots of our conceptual understanding of sustainability, communities still experience various challenges: degradation of natural ecosystems due to pollution and depletion of natural resources, extreme poverty, and various forms of social inequalities. Responding to these 21st-century challenges requires an 'evolutionary redesign' (Beddoe *et al.*, 2009) of our current socio-economic structures to align with the regenerative design of natural

systems that have inherent self-organizing capabilities (Eisenberg & Reed, 2003). This proposition brings us to the conceptual understanding of sustainability that is rooted in biology and ecology, or the study of nature. Collaboration is a mode of self-organization which can facilitate a dynamic and creative process of working together to co-develop local initiatives in sustainable development. As demonstrated by the cases of WOW Bali and its selected community partners, achieving social, economic and ecological balance within the community depends on the dynamics of the actors and stakeholders participating in a creative collaboration. Communities and even individuals have their own concept and image of sustainability and they also formulate their own vision of sustainable development which they seek to achieve by working collaboratively with individuals who share a parallel or aligned vision.

Defined as a process for *'leveraging the forces and properties that enable a community to coexist and operate interdependently, without much intervention from outside conditions and affects'*, the Sustainable Dynamics Framework proposes that sustainability has its own dynamics depending on the cultural and ecological conditions and contexts of the community. Through the narrative approach of qualitative inquiry, this exploratory study shows that Sustainable Dynamics is an amalgamation of knowledge and applications of experiential alternative learning models as well as grassroots solutions and best practices, and inspired by ancient Balinese philosophy. Sustainable Dynamics guides individual stakeholders and collaborators to identify the overarching frameworks of sustainability such as human rights, environmental ethics, eco-effectiveness and affectiveness, and social responsibility. Collaborating individuals make up a community, which, when actively learning together, are more likely to foster and expand relationships, create *'settings for collective reflection'*, and leverage each other's dynamics (forces and properties or capabilities) to sustain transformative changes (Senge and Scharmer, 2001). The creative collaborations of WOW Bali showed several dynamics of the Balinese culture; the creative autonomy of the Balinese, specifically, allowed the integration of their local wellness traditions with modalities of wellness from other (modern) culture introduced by WOW Bali, thereby co-creating the Dynamic Wellness Program.

Preliminary 'results' of the community action learning in implementing WOW Bali's programs show that addressing systemic problems of sustainability should not only be left to the domain technological solutions although they are important. It demands human-level (*self*) transformation, fore mostly; and holistic participation within a community, secondly. Focusing on the human dimension of sustainable development through Dynamic Wellness, enabled

WOW Bali to direct interventions towards individual contributions, making each of us to realize almost instantly that '*I am* (part of) the solution'.

Healthy individuals are more likely to be creative and dynamic agents of change. Their creative potential, especially when harnessed and combined with those of others in a dynamic process of collaboration, can sustain local initiatives and become a transformative force for sustainable development.

These local initiatives are likely to carry on and expand in the future in Bali, and already in other places in Indonesia as well as in other countries such as in Vietnam. After this exploratory study, and with the continuing community action research, the regenerative aspect of the creative collaborations requires further analysis and reflection. This next phase of active learning will focus on the impacts of the local sustainable development initiatives on the community. This will also require not only more innovative methods of action research, but also more regenerative ways of sharing information and learning exchange.

LITERATURE CITED

- Ascher, W., & Mirovitskaya, N. (Eds.). (2002). *The guide to sustainable development and environmental policy*. Durham, NC: Duke University Press, retrieved on 4 August 2017 from <https://goo.gl/GYcbkC>.
- Bass, S, Dalal-Clayton, B & Pretty, J. (1995). *Participation in strategies for sustainable development*. International Institute for Environment and Development, retrieved on 7 May 2014 from <https://goo.gl/Ls05Of>.
- Beatley, T., & Manning, K. (1997). *The ecology of place: planning for environment, economy, and community*. Washington, DC: Island Press, retrieved on 5 August 2017 from <https://goo.gl/iFUupf>.
- Beddoe, R., Costanza, R., Farley, J., Garza, E., Kent, J., Kubiszewski, I., ... & Ogden, Z. (2009). Overcoming systemic roadblocks to sustainability: The evolutionary redesign of worldviews, institutions, and technologies. *Proceedings of the National Academy of Sciences*, 106(8), 2483-2489.
- Bender, H. (ed) (2012). *Reshaping environments: an interdisciplinary approach to sustainability in a complex world*. Cambridge University Press. Melbourne, retrieved on 7 March 2014 from <https://goo.gl/DDcc0U>.

- Centre for Developmental Practice. (n.d.). Four case studies methods for practitioner learning, retrieved on 13 November 2014 from <http://www.barefootguide.org/tools-and-exercises.html>.
- Commission of the European Communities. (2001, November 21). Making a European Area of Lifelong Learning a Reality. Retrieved on 4 October 2014 from <https://goo.gl/gGqVmM>.
- Curran, M. (2009). Wrapping our brains around sustainability. *Sustainability, Vol 1*, pp 5-13. Retrieved on September 30, 2014, from <http://www.mdpi.com/2071-1050/1/1/5/htm>.
- Eisenberg, D & Reed, W. (2003) Regenerative design: toward the re-integration of human systems within nature, retrieved on 16 September 2014 from <https://goo.gl/eOOE18>.
- Dunn, H. (1961). High-level wellness for man and society. *American Journal of Public Health*, 49(6), 786-792, retrieved on 30 September 2014 from <https://goo.gl/fYi1L>.
- Dunlap, J. C., & Lowenthal, P. R. (2011). Learning, unlearning, and relearning: using web 2.0 technologies to support the development of lifelong learning skills. in G. D. Magoulas (Ed.), *E Infrastructures and Technologies for Lifelong Learning: Next Generation Environments* (pp. 46-52). Hershey, PA: IGI Global, retrieved on 5 October 2014 from <https://goo.gl/YWXja>.
- Gardner, J. (1981). *Self-renewal: the individual and the innovative society*, revised edition, WW Norton & Company, New York, online copy borrowed from <https://openlibrary.org/>.
- Gassner, P. (2014, April). Green challenge accepted: telling the story of sustainability. *ASEAN Biodiversity*, vol. 13, no. 1, Pp 8-10.
- Holman, J. (2008), *The return of the perennial philosophy: the supreme vision of western esotericism*, Watkins Publishing, London, retrieved on 24 March 2014 from <https://goo.gl/EStWKc>.

- Hakim, L, Kim, J & Hong S. (2009) Cultural landscape and ecotourism in Bali Island, Indonesia, *Journal of Ecological Field Biology* 32 (1): pp. 1-8, retrieved on 16 November 2014 from <https://goo.gl/aYKM1J>.
- Hoffmann, O, Cropley, D, Cropley, A, Nguyen, L, and Swatman, P. (2005). Creativity, requirements and perspectives, *AJIS* Vo. 13 retrieved on 4 October 2014 from <https://goo.gl/44YiY5>.
- Jabareen, Y. (2007). A knowledge map for describing variegated and conflict domains of sustainable development [Abstract]. *Journal of Environmental Planning and Management* , 47(4), 623-642. <http://dx.doi.org/10.1080/0964056042000243267>.
- Jabareen, Y. (2008). A new conceptual framework for sustainable development. *Environment, Development and Sustainability*, 10(2), 179-192. doi:DOI 10.1007/s10668-006-9058-z.
- Kates, R. (ed) (2010). *Readings on sustainability science and technology*. (working paper). Center for International Development at Harvard University, retrieved on 13 July 2014 from <http://rwkates.org/pdfs/a2010.02.pdf>.
- Kidd, C. V. (1992). The evolution of sustainability [Abstract]. *Journal of Agricultural and Environmental Ethics*, 5(1), 1-26. doi:10.1007/bf01965413
- Kirsten, T.G.J.C., Van der Walt, H.J.L. & Viljoen, C.T., 2009, 'Health, wellbeing and wellness: An anthropological eco-systemic approach', *Health SA Gesondheid* 14(1), Art. #407, 7 pages. DOI: 10.4102/hsag.v14i1.407, retrieved on on 30 September 2014 from <http://www.hsag.co.za>.
- Kivunja, C. (2014). Do you want your students to be job-ready with 21st century skills? change pedagogies: a pedagogical paradigm shift from Vygotskyian social constructivism to critical thinking, problem solving and Siemens' digital connectivism, *International Journal of Higher Education*, Vol. 3, No. 3, retrieved on 2 October 2014 from <https://goo.gl/Mvz7FW>.
- Knowles, M. (1975). *Self-directed learning: A guide for learners and teachers*. New York: Association Press, retrieved on 10 October 2014 from <https://eric.ed.gov/?id=ED114653>.

- Koshy, V. (2010). Action research for improving educational practice: a step-by-step guide, second edition, Sage Publications, Ltd. Pp 2, retrieved on 8 March 2014 from <https://goo.gl/HyLTBQ>.
- Kras, E. (2007). The blockage: Rethinking organizational principles for the 21st Century. Baltimore: American Literary Press.
- Laszlo, A. (2003). The systems sciences in service of humanity (with Laszlo E), The encyclopedia of life support systems: Water, energy, environment, food & agriculture, retrieved on 17 March 2014 from <http://www.eolss.net/sample-chapters/c02/e6-46-02-01.pdf>.
- Leach, M, Mearns, R & Scoones, I. (1997). Editorial: Community-Based Sustainable Development Consensus or Conflict? IDS Bulletin 28(4):4 – 14, retrieved on 29 May 2017 from <https://goo.gl/H7WKZX>.
- Lewis, P. (2013). John Lewis and the benefits of mutualism, retrieved on 15 June 2014 from <https://goo.gl/gorMmc>.
- Lietaer, B & DeMeulenaere, S. (in press). Sustaining cultural vitality in a globalizing world: The Balinese example, retrieved on 15 October 2014 from <https://goo.gl/gslmFF>.
- Lyle, J. (1994). Regenerative designs for sustainable development, New York, retrieved on 17 September 2014 from <https://goo.gl/T7uPMc>.
- Määttä, K, & Uusi-autti, S. (2011). Creativity and Love-paradoxical but important virtues, International Journal of Psychological Studies Vol. 3, No. 2; December 2011, retrieved on 3 December 2014 from <https://goo.gl/FAZGOg>.
- Majid, I & Koe, W. (2012). Sustainable entrepreneurship (SE): A revised model based on triple bottom line (TBL), International Journal of Academic Research in Business and Social Sciences, June 2012, Vol. 2, No. 6, retrieved on 21 January 2015 from <https://goo.gl/9HF98p>.

- Marinova, E & Borza, A. (2013). The creative industries and new trends in the economic world, *Economia: Seria Management*, Vol 16, Iss 2, Pp 327-332 (2013), retrieved on 15 January 2015 from <https://goo.gl/no2Vwi>.
- Mommaerts, M, White, K, & Roberts, B (2014). Weaving the community resilience and new economy movement: voices and reflections from the field, Post Carbon Institute, retrieved on 30 September 2014 from <https://goo.gl/lkHgmQ>.
- Nakamura, K. (2003). The end of ethnography? Bali's last resort: writing ethnography of Balinese *adat*, IAS Newsletter No. 32, retrieved on 3 June 2014 from <https://goo.gl/xR7zRB>.
- O'Brien, M. (201). Fostering a creativity mindset for teaching (and learning), *LEARNing Landscapes* | Vol. 6, No. 1, Autumn 2012, pp 315-333.
- Our Story. (n.d.). Retrieved September 15, 2013, from <http://trihitakaranabali.webnode.com/about-us/>
- Palinkas, L. A., Horwitz, S. M., Green, C. A., Wisdom, J. P., Duan, N., & Hoagwood, K. (2015). Purposeful sampling for qualitative data collection and analysis in mixed method implementation research. *Administration and Policy in Mental Health*, 42(5), 533–544. <http://doi.org/10.1007/s10488-013-0528-y>
- Parrish, B.D. (2010). Sustainability-driven entrepreneurship: principles of organization design. *Journal of Business Venturing*, 25(5), 510-523, retrieved on 12 January 2015 from <https://goo.gl/A3IemD>.
- Pauli, G. (2012). The blue economy, retrieved on 5 January 2015 from <https://goo.gl/kiAsmN>.
- Peterlin, J, Dimovski, V, & Penger, S. (2013), Creation of sustainable leadership development, *Managing Global Transitions* Volume 11, Number 2, Summer 2013, retrieved on 4 October 2014 from <https://goo.gl/HcxFKz>.

- Piaget, J. (1981). *The psychology of intelligence*, Littlefield, Adams & Co, New Jersey.
- Pickel-Chevalier, S. and Budarma, K (2016). Towards sustainable tourism in Bali, *Mondes du Tourisme* [Online], Hors-série | 2016, Online since 01 September 2016, connection on 05 October 2016, retrieved on 30 April 2017 from <http://tourisme.revues.org/1187>.
- Rolston, H. (2003). Environmental ethics, *The Blackwell Companion to Philosophy*, 2nd ed. Nicholas Bunnin and E. P. Tsui-James, eds., pp 517-530, Blackwell Publishing, Oxford, retrieved on 15 September 2014 from <https://goo.gl/pNzONg>.
- Roth, D. (2011). The subak in diaspora: Balinese farmers and the subak in South Sulawesi, *Human Ecology Interdisciplinary Journal*, 39(1), pp. 55-68, retrieved on 7 October 2014 from <https://goo.gl/ih1i0M>.
- Rowlands, S. (2011). Discussion Article: Disciplinary boundaries for creativity, creative education, Vol. 2, No. 1, 47-55, *Scientific Research*, retrieved on 6 December 2014 from <https://goo.gl/EhFjxM>.
- Schneider, F. (2007). Collaboration: some thoughts concerning new ways of learning and working together. in: *Academy*, edited by Angelika Nollert and Irit Rogoff, 280 pages, Revolver Verlag, ISBN 3-86588-303-6, retrieved on 14 November 2014 from <https://goo.gl/CUfjUf>.
- Senge, P. and Scharmer, O. (2002). Community Action Research: Learning as a Community of Practitioners, Consultants and Researchers, in: P. Reason and H. Bradbury, Eds, *Handbook of Action Research*, London, Sage, pp. 238-249, retrieved from 7 March 2014 from <https://goo.gl/EjEOCq>.
- Siemens, G. (2006). *Connectivism: learning theory or pastime of the self-amused*, retrieved on 13 October 2014 from <https://goo.gl/xetMw6>.
- Sirageldin, I. (2009). *Sustainable human development in the 21st century: an evolutionary perspective*. EOLSS Publishers Co. Ltd., retrieved on 9 May 2014 from <https://goo.gl/H6Ft4L>.

- Social Responsibility and Ethics. (n.d.), retrieved on 3 September 2014 from <https://goo.gl/6Pl2ei>.
- Sustainability Science. (2013, January 1), retrieved on March 17, 2014 from <http://sustainability.pnas.org/page/about>.
- Sustainable Development. (n.d.). Retrieved August 05, 2017, from <http://www.iisd.org/topic/sustainable-development>.
- Tufte, T & Mefalopulos, P. (2009). Participatory communication: a practical guide. (working paper). The World Bank, retrieved on 7 March 2014 from <https://goo.gl/AjuzRY>.
- UNDESA. (2007). Institutional aspects of sustainable development in Indonesia. Retrieved 28 April 2017, from <https://goo.gl/3TZYsY>.
- UNESCO. (2012). Cultural landscape of Bali Province: the subak system as a manifestation of the Tri Hita Karana philosophy, retrieved on 13 October 2014 accessed from <https://goo.gl/PPdpyD>.
- United Nations World Commission on Environment and Development (WCED). (1987). Our common future. Oxford: Oxford University Press, retrieved on 5 March 2014 from <https://goo.gl/sAKfBx>.
- Van Dooren, T. (n.d.). Life at the Edge of Extinction: Spectral crows, Haunted Landscapes and the Environmental Humanities. *Humanities Australia*, Pp 8-22, retrieved on 19 August 2014 from <https://goo.gl/1MrvSa>.
- Vygotsky, L. S. (1978). Mind in society: the development of higher psychological processes. Harvard University Press, Cambridge, MA, retrieved on 19 December 2017 from <https://goo.gl/QH9qTT>.
- Westerlund, M. (2013). TIM Lecture Series – Green business models to change the world: how can entrepreneurs ride the sustainability wave? *Technology Innovation Management Review*. July 2013: 53–57, retrieved from 19 November 2014 from <https://timreview.ca/article/707>.