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TABLE OF CONTENTS

ACKNOWLEDGMENTS	4
ACRONYMS AND ABBREVIATIONS	5
1. INTRODUCTION	7
2. LITERATURE REVIEW AND THEORETICAL FRAMEWORK	11
2.1. Environmental Anthropology and Humanitarianism	11
2.2. Anthropological Approaches to NGOs in Africa	16
2.3. Environmental Education and Environmental NGOs	19
3. RESEARCH METHODS & POSITIONALITY	23
3.1. Quantitative research methods in anthropological inquiry	23
3.2 Qualitative research methods in anthropological inquiry	24
3.3. Sampling strategy: Selection of NGOs and key informants	25
3.4. Description of Field Site	25
3.5. Ethical Concerns	29
4. ETHNOGRAPHIC CASE STUDY /OBSERVATIONS	30
4.1. Politics of Waste: Sustainable Resource Management in Seychelles	30
4.2. Educating for Change: Environmental NGOs in Seychelles	45
4.2.2. The Ocean Project Seychelles	56
4.3. Local perspectives: Plastic pollution and the work of NGOs in Seychelles.	77
5.CONCLUSION	83
6.REFERENCES	86
7.APPENDIX	91
7.1. Abstract	91

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ACRONYMS AND ABBREVIATIONS

AIODIS	African and Indian Ocean Developing Island States
CJA	Climate Justice Action
CAEP	Climate Action Enhancement Package
EA	Environmental Anthropology
EC	European Commission
EE	Environmental Education
EEA	European Environmental Agency
ENGO	Environmental Non-Governmental Organizations
ESD	Education for Sustainable Development
EU	European Union
GIZ	German Agency for International Cooperation
IRENA	International Renewable Energy Agency
INDC	Intended Nationally Determined Contribution
IOs	International Organizations
LWMA	Landscape and Waste Management Agency
NGO	Nongovernmental Organization
SeyCCAT	Seychelles Conservation and Climate Adaptation Trust
SDG	Sustainable Development Goals
S4S	Sustainability for Seychelles
SDG4	Sustainable Development Goals- Quality Education
SIDS	Small Island Developing States
SSTF	The Seychelles Sustainable Tourism Foundation
SNWP	Seychelles National Waste Policy

TNC	The Nature Conservancy
TFOPW	The Future of Plastic Waste
UN	United Nations
UNDP	United Nations Development Program
UNEA	United Nations Environment Assembly
UNEP	United Nations Environment Program
UNESCO	United Nations Educational, Scientific and Cultural Organization
UNFCCC	United Nations Framework Convention on Climate Change
MACCE	Ministry of Agriculture, Climate Change and Environment-Seychelles
TOP	The Ocean Project Seychelles

1.INTRODUCTION

The escalating levels of plastic pollution pose a significant worldwide environmental problem, as Rolf U. Halden points out, because of their durability against chemical, physical, and biological forces, and it's a big concern for human health and the environment in contemporary living conditions (2010). The consequences of this escalating crisis resulting from plastic production, consumption, and pollution are manifold, adversely affecting both human and non-human species alike. "By reducing waste to an all-too-human by-product in need of rational management, we foreclose from consideration how waste may exist for nonhuman beings" (Reno 2015). The undeniable truth is that human reliance on nature highlights a crucial interconnection between humans and the environment. This connection encompasses our dependence on nature for fundamental necessities and economic support, as well as the profound influence of the natural world on our physical and mental well-being. Hence, recognizing and preserving these critical relationships between nature and humans is paramount for a sustainable and harmonious future.

The pollution of the world by human waste has become a basic anthropocentric conceit, a belief that we are set apart because of the uniquely contaminating impact of what we leave behind. (Lynch 1990, as cited in Reno 2015).

At this juncture, it is evident that human intervention in nature, commonly referred to as the Anthropocene impact, has significantly contributed to the environmental challenges facing the globe. This intervention is marked by the commodification of nature, representing a contemporary global trend characterized by Peet and Watts (1996) describe as "the death of nature and the rise of the environment." As Pathak Gauri contends, in addition to examining sociocultural structures, pollution can offer a useful approach to understanding power dynamics within these structures that influence how individuals organize their environment. (2023). This insight underscores the substantial influence of societal values and political structures on the approaches taken by individuals and states, acting as national entities, toward environmental issues. The impact of these factors is particularly evident in the formulation of strategies and policies related to challenges such as waste generation and minimization. In essence, the noticeable shift in our relationship with nature, coupled with the commodification of nature, reflects a broader transformation in human perspectives and practices. The acknowledgment of the Anthropocene era emphasizes the interconnectedness between human activities and environmental consequences, urging a reevaluation of people's societal values and political

structures to address the critical environmental challenges of the time. In the United Nations Framework Conventions on Climate Change, human activities are identified as the direct or indirect causes of the consequences associated with climate change (1992). In the face of the pressing need to discover sustainable solutions for contemporary and future sustainability challenges, as emphasized by authors (Hackmann et al. 2013), it is vital to shed light on high-risk regions that face significant challenges in environmental conservation. Anthropologists have recently included the main concern in the protectionist trend in remote areas; the most common are developing African states that are resisting the disruptive reality of environmental challenges as they become more dependent on a variety of internal and external variables. In other words, the distribution of environmental inequalities among countries according to their development levels in the globalizing world is widely discussed in the literature. In this scholarly investigation, within the framework of African studies, this paper intends to scrutinize the Seychelles—an archipelago comprising 115 islands situated in the Indian Ocean off East Africa—with a specific focus on plastic pollution. “Typically, geographically isolated and limited by population and economic scale, SIDS (Small Island Developing States) are highly dependent on the international market and vulnerable to economic shocks, and they lack capital to mobilize projects” (Eckelman et al. 2014, as cited in Agricole et al. 2016). The inherent challenges in addressing this issue lie primarily in the island nation's limited capacity, predominantly stemming from economic constraints. Isabelle Anguelovski and Debra Roberts emphasize broadly that by deducing from their field analysis in Durban, South Africa, “recent studies demonstrate that the extreme vulnerability of the continent to climatic changes is aggravated by the interaction of multiple stresses occurring at various levels and by a low adaptive capacity. This vulnerability is also exacerbated by developmental challenges, fragile institutions, limited access to capital, weak infrastructure and technology, ecosystem degradation, and complex disasters and conflicts” (2011). Before diving into human factors behind the fragile environmental conversation system in the Seychelles, considering other factors playing effective roles on creation of mass waste accumulation on the shores of the Seychelles islands will be useful to touch upon because these make human influence more dangerous and complicate the Seychelles' struggle in this area. Joshua Reno stated that wastes are not only a mirror of humanity but are also actively affected by climate change, geological formations, and ocean gyres (2015). The Seychelles islands, nestled in the heart of the Indian Ocean gyre, confront a pronounced susceptibility to plastic pollution due to their unique

geographical location and the dynamics of ocean currents.¹ However, in this thesis, we will explore this perspective to illustrate how natural events can catalyze hazardous scenarios and amplify the impact of humanitarian factors not only on individual states but also as a global issue. Take, for instance, the Indian Ocean, where the irresponsible disposal and waste dumping practices of developing industrial nations—Malaysia, Sri Lanka, Thailand, Indonesia, India, and China—contribute significantly to the plastic debris in the region (Pattiaratchi et al. 2022). This issue is exacerbated by the geological movements of the ocean, magnifying the vulnerability of these countries and leading to heightened environmental and human-related concerns. Seychelles, with its natural beauty, finds itself burdened by geographical isolation, subject to the ceaseless currents that serve as conduits for plastic waste originating from distant corners of the world. As a result, the coastal islands of the Seychelles face an increased risk of shouldering the cumulative consequences of global mistakes, primarily human-induced and compounded by natural conditions such as ocean gyres.

Moreover, beyond geographical factors, as Thomas H. Erikson stated, the vulnerability of the Seychelles to waste management issues stems from regional socio-economic structures and cultural elements that fail to instill a sense of urgency in confronting environmental degradation (2020), thereby perpetuating a persistent threat to diverse forms of life. Waste management deficiencies pose a significant challenge in many developing countries, particularly in the African region, where the case of Seychelles exemplifies the pervasive nature of this issue. According to Sustainable Development Strategy Seychelles, the causes of inadequate waste management in Seychelles are multifaceted, encompassing factors such as rapid urbanization, population growth, insufficient infrastructure, and limited financial resources (UNEP, 2012). Urban areas, which are experiencing a surge in population, often lack

¹Five subtropical eddies that cover 40 percent of the world's seas accumulate floating plastic debris. Among the five major gyres, the most notorious and extensively examined among them is the Great Garbage Patch situated in the North Pacific Ocean, positioned between Hawaii and California. Currently, approximately 100 million kilograms of plastic debris reside within the Great Pacific Patch, comprising an estimated count of 1.8 trillion individual pieces scattered across the ocean's expanse. Subtropical gyres also occur in the North and South Atlantic and the Indian Ocean, where “79% of the debris was plastic, noteworthy categories included flip-flops, containers for energy drinks, and compact fluorescent lights (CFLs)” (Baouwman, et al., 2016). Subtropical gyres are large, slow-moving circular ocean currents that facilitate the accumulation of floating debris due to their characteristic clockwise or counterclockwise rotation, depending on the hemisphere. Indian Ocean Gyre is two distinct gyres, one of which is the South Indian Ocean Gyre and the other one is the North Indian Ocean Gyre. “More debris may be scavenged by islands located near gyres or currents than islands located further away.” (Bouwman, et al., 2016).

the necessary waste disposal facilities and organized collection systems. Furthermore, the absence of stringent regulations and enforcement mechanisms exacerbates the problem, leading to improper waste disposal practices. “These all drivers in turn are the result of forces such as land alienation, state policies, poverty, and population growth and can bring about behavior that exacerbates the problem” (Kopnina 2013). This actively demonstrates that the outcomes of these deficiencies are severe and wide-ranging, impacting both the environment and humans harder. Developing nations, grappling with reliance on external resources, find themselves entangled in a contemporary form of colonial dominance, a subject debated among anthropologists like Thomas H. Eriksen (2020) and James Ferguson (2006) as emblematic of present-day unjust power dynamics. Within the concept of environmental justice, scholars put the term “inequitable distribution of environmental burdens” (Kopnina 2013) forward so as to illuminate the “unequal exposure to environmental problems” (Kopnina 2013), which refers to the disproportionate impact of environmental hazards and risks on marginalized and vulnerable communities. That’s to say, in light of these challenges that are mostly discussed from a global perspective by anthropologists, it becomes imperative to recognize the Seychelles not merely as a passive recipient of plastic waste but as a nation contending with external factors that amplify the impact of the problem of environmental degradation. In other words, the neoliberal approach and 21st century “millennial capitalism” (Hilgers 2011) trends are in the middle of the anthropological analysis, and many anthropologists have focused on the articulation of the objectives of governance and sovereignty, analysis of the dynamics of social control and power disparities, and uncovered neocolonial tendencies within the realm of Education for Sustainable Development (ESD) (Ferguson 2006; Camaroff 2003). It is criticized by Helen Kopnina that local cultural variations in perceptions of sustainability are neglected by studies focusing on ESD. Instead, people often focus on summarizing ESD through Western theoretical frameworks and examples, primarily from formal education settings in the West (2013).

In brief, it is important to highlight that environmental problems are dependent on society, culture-related (e.g., reactions, perceptions, and adaptations), and can be affected by external factors (e.g., global consumption patterns, neoliberal capitalist actors). As a global concern over waste pollution intensifies, the Seychelles serves as a poignant example of a coastal nation navigating the intricate interplay of environmental, economic, and geographical factors in the face of the mounting plastic crisis. This study focuses on environmental education and will examine the same issue through environmental NGOs, which play a big part in the sense that the Seychelles deal with environmental conservation. As stated by Edward Shizha

(2015), colonial education exerted hegemonic influence in Africa, imposing its dominance and disrupting traditional cultural practices. This hegemony manifested itself through the imposition of foreign values, languages, and educational systems, often alienating indigenous knowledge and eroding the fabric of African societies. In other words, environmental education is embedded within the sociocultural and intergenerational dynamics of acquiring knowledge and values. Numerous anthropologists' express skepticism towards educational initiatives geared towards predetermined objectives associated with Western-style development. Also, the contemporary criticism of non-governmental organizations (NGOs) echoes similar concerns. Given the prevalent reliance on foreign aid amid the economic and political challenges confronting the Seychelles, an examination of educational NGOs in the country is imperative. This scrutiny will focus on whether these NGOs, particularly illustrated through a case example, are undergoing transformations and if their initiatives are becoming enmeshed with Western cultural norms and practices. The inquiry extends to whether the principles outlined in international declarations are being appropriately tailored to align with the socio-cultural fabric of Seychellois society.

2. LITERATURE REVIEW AND THEORETICAL FRAMEWORK

2.1. Environmental Anthropology and Humanitarianism

Environmental anthropology is a subfield within anthropology that examines the intricate relationships between human societies and their environments, emphasizing the cultural dimensions of these interactions. Scholars in this field seek to understand how various cultures perceive, adapt to, and transform their surroundings, and how these interactions, in turn, shape cultural practices, beliefs, and social structures. Environmental anthropologists employ a holistic approach, considering the complex interplay of ecological, economic, political, and cultural factors that influence human-environment dynamics. Through environmental anthropology work, anthropologists contribute valuable insights to ongoing debates about sustainable development, conservation, and the impact of globalization, in Gupta's words, 'neoliberal governmentality' (2006), on traditional ecological knowledge, fostering a deeper understanding of the intricate connections between culture and the environment. Unlike other disciplines, it is the goal of contemporary ecological anthropology to not only understand environmental problems but also to find solutions to them (Kottak 2010, as cited in Kopnina 2013). The significance of analyzing humans within culturally specific contexts lies in recognizing the inherent complexity that arises when discussing the equitable

distribution of the environment. Environmental problems are not universally attributed; rather, they are products intricately woven into specific historical and cultural configurations. Attempting to address these issues without acknowledging the cultural nuances and historical trajectories that have shaped them would oversimplify the intricate tapestry of human-environment relationships and hinder the ability to formulate effective and culturally sensitive solutions (Breidlid and Botha 2015; Kopnina 2013). Nevertheless, as exemplified by the inquiry into Garrett Hardin's "tragedy of the commons" (Feeny et al. 1990), which characterizes a scenario in which commonly shared environmental resources are utilized to an excessive extent, exploited, and ultimately exhausted, posing a risk for all parties involved with the requisite modifications. Therefore, it demonstrates that common problem of all necessitates collective, cross-cultural responses while acknowledging the significance of local contexts, challenges such as climate change, biodiversity loss, and pollution exhibit global repercussions. Meanwhile, the interconnected nature of the planet means that the impact of environmental degradation often extends beyond localized origins, requiring a recognition of shared responsibilities and collaborative efforts to address these challenges on a broader, more inclusive scale (Appadurai 1996). This investigation of 'tragedy of commons' elucidates the fundamental causes of an inequitable global system, primarily characterized by discussions on political and economic hegemony, as well as the capitalist distribution of power, environmental resources, and the conceptualization of equality. This scholarly exploration underscores the interconnected dynamics wherein the "common concern of humankind" (UNFCCC, 1992). This serves as a lens through which the unjust distribution of resources and power on a global scale is critically examined, emphasizing the intricate relationships between socio-political structures, economic systems, and the prevailing environmental ethos. It might be converted to "three P's for people, profit, and planet, which stands for society, economics, and environment" (Kopnina 2023).

In pursuit of this viewpoint, a pivotal concern within environmental anthropology is the pursuit of 'Environmental Justice', the fair allocation of environmental benefits, including natural resources, fresh air, and water, among human communities and also across different species (Kopnina 2013). In principle, many scholars delve into the complex interplay between environmental resource access and social and economic disparities, unearthing instances where certain groups bear a disproportionate burden of environmental harm. Rob Nixon (2011), by approaching environmental justice literature from a transnational perspective, describes the serious and underestimated colonial disempowerment. Insufficient attention is paid to the

potential harmful results arising from catastrophes (socio-political, environmental, etc.), and the notion of "slow violence" emerges as a symbolic sign of the dangers. The unseen poverty is compounded by the invisible intervention of "hard-charging capitalism" (Nixon 2011) and white supremacy applied to disadvantaged populations, inevitably resulting in the violent displacement and brutal suppression of minority or marginalized communities, even if it is bloodless. This is often motivated by the presence of valuable resources in impoverished regions or simply serves as a means of colonization and power demonstration. Correspondingly, he states that not only physical harm is given, but also psychological abuse is used on people living in poverty, as seen in the example of exporting rich-nation garbage and toxicity to nations labeled as poor (2011).

In the book edited by Helen Kopnina and Eleanor Shoremon-Quimet, the four ethical dilemmas embedded within the concept of environmental justice are mentioned critically. This section has touched upon remarkable points in order to identify and realize the self-contradictions of the capitalist world order and the artificial obstacles that stand in the way of a system that is compatible with universal human rights according to its definitions and principles. Firstly, there is the challenge of rectifying the 'unequal distribution of environmental burdens' (2013). Advocates for environmental justice emphasize the need to address the disproportionate placement of hazardous industries and pollution sources among vulnerable groups, such as ethnic minorities and economically disadvantaged populations. The consideration of "human universals" (2013), such as the drive for technological innovation, material wealth, and social justice, adds a pertinent layer to the theory of the unequal distribution of environmental burdens. Global industrialization, driven by these universals, has led to environmental degradation disproportionately affecting marginalized communities. Recognizing these universal tendencies prompts the need for strategic solutions that address both the environmental crisis and the associated inequalities. However, this raises questions about fairness and social equity in exposure to environmental risks. Secondly, the concept encompasses the issue of 'unequal exposure to environmental risks between developed and developing countries' (2013). This statement underscores the disparities in the impact of environmental challenges, particularly those associated with climate change, on nations with varying levels of economic development. The particular reason for it is that the adverse impacts of globalization and environmental degradation are most acutely felt by those who are economically disadvantaged. The theory of 'post materialism' faces criticism from environmental sociologists, notably William R. Freudenburg and Thomas Dunlap (as cited in

Kopnina 2013). They are skeptical about the presumed disconnect between a state's financial well-being and its environmental concerns. Instead, it should emphasize the need for a more intricate understanding that considers the complex interplay between socio-economic factors and ecological considerations. Overall, achieving environmental justice requires an equitable spatial distribution of both burdens and benefits across different nations and social groups regarding universal human rights without using tools of racism on environmental issues. The third ethical dilemma involves 'temporal environmental justice' (Kopnina 2013). This dimension centers on concerns for the well-being and rights of future generations. It prompts considerations about the long-term consequences of current environmental practices and policies and underscores the responsibility to ensure that the environmental choices made today do not compromise the well-being of future human populations. The final dimension of ethical concern is 'biospheric egalitarianism' (Kopnina 2013), which entails considering the rights and well-being of other species. This raises questions about the anthropocentric nature of priorities, particularly in the context of social justice. The tension arises between human-centric perspectives and the broader ethical responsibility to include non-human species in considerations of justice and well-being. In a nutshell, they highlight the complexities and contradictions inherent in the application of environmental justice principles on a global scale. Critics of environmental justice often assert the contradictions embedded in the implementation of international humanitarian rights, particularly when put together with the imposition of Western-style capitalist consumerism and the ideology of exploitation. Associated with the role of power, its impact on government policies, implementation strategies of the state, and increasing the power of neoliberal state dynamics is inevitably approved by most environmentalist scholars (Ferguson 2006; Comaroff 2003; Gupta and Araphana 2006). Correspondingly, tension arises from the perceived incongruity between the principles espoused in international humanitarian frameworks and the realities of environmental practices that perpetuate inequalities and exploitation. This creates a power dynamic that significantly influences the behavior and mindset of local, indigenous, or minority communities. The discrepancy between the stated ideals and the tangible consequences of environmental actions can shape how these communities perceive and respond to environmental issues, potentially influencing their behavior and thought patterns (Kopnina 2013; Gupta and Sharma 2006). This criticism revolves around the notion that the principles of environmental justice, which emphasize fairness and equity in the distribution of environmental burdens and benefits, can be compromised by the economic and political interests of "white supremacy" (Shizha, 2015). To put it differently, every system of thought is seen as serving the interests of particular social

structures of power (Peets and Watts 2002). The imposition of Western-style capitalist consumerism, driven by profit motives and resource exploitation, may undermine the very ideals of justice and equality that environmental justice seeks to promote. This critique suggests that international humanitarian rights are often subordinated to economic interests, leading to environmental injustices on a global scale. Furthermore, the imposition of certain environmental policies and conservation efforts by Western entities have been criticized for infringing upon the rights and practices of indigenous communities. In the name of environmental protection, restrictions on traditional practices such as hunting, fishing, and land use are imposed, often without adequate consideration of the cultural and livelihood implications for these communities. This raises questions about the universality of environmental justice principles and the need for a more culturally sensitive and inclusive approach.

As many anthropologists' questions, the outcome of resource exploitation is the transformation of 'nature' into 'environment.' (Peet and Watts 1996). The commodification of nature, in other words, "nature enters into a competitive value system" (Sterk 2020), primarily driven by prevailing Western discourses rather than local or indigenous perspectives, enables the convenient appropriation of natural conservation for simplistic, consumption-based solutions to intricate socio-ecological challenges. In essence, the global proliferation of the neoliberal capitalist ideology, described by Farmer (2004) as "central to modern development efforts, the goal of which is less to repair poverty and social inequalities than to manage them," poses a significant threat to effectively strengthening collective commitments to environmental concerns. This hindrance arises from the tendency to prioritize profit-driven agendas over communal interests, as self-interested policy attitudes prevail. At this point, it is necessary to mention that within the expansive landscape of environmental anthropology, the intersection with political ecology resonates particularly with the emergent discourse of "liberation ecology" as a critical approach to political ecology (Peets and Watts 2002). Both fields share a common concern for the intricate relationships between societies and their environments, examining the power dynamics and political-economic structures that influence environmental conditions. Nonetheless, liberation ecology is described by Peets and Watts as follows: it upholds the modernist concept of deliberate actions toward nature, acknowledges critiques from Marxist and post-structuralist perspectives regarding capitalist rationality, yet seeks to replace it with a democratic process of deliberation within a reimagined framework of interconnected social and natural relations. In a word, it sticks to the idea that people should thoughtfully

interact with nature but understands the criticisms about how capitalism thinks. Instead of capitalism, it suggests using a democratic process to think about how we relate to both society and the environment in a new way and as an evolving concept, and it emphasizes the liberation of both human and non-human entities from oppressive environmental conditions (2002). This resonates with the political ecology lens, which scrutinizes how political and economic systems contribute to environmental injustices. Together, these perspectives contribute to a nuanced understanding of environmental issues by intertwining cultural insights with critical analyses of power relations and systemic structures, ultimately advancing the discourse on environmental liberation within the broader context of anthropology. According to some anthropologists, like Helen Kopnina (2013), market-driven methods, as part of western consumerism, do not adequately capture the intrinsic values tied to ecosystems and thus fail to adequately assess environmental conservation priorities. For a comprehensive environmental decision-making process to be effective, cultural, social, and ecological dimensions must also be taken into account.

2.2. Anthropological Approaches to NGOs in Africa

In the realm of development discourse in Africa, the anthropological examination of non-governmental organizations (NGOs) and their engagements with environmental conservation stand at the forefront of scholarly attention. Anthropological approaches provide a nuanced lens through which to understand the complex interactions between NGOs, local communities, and the intricate socio-cultural landscapes of the region. As NGOs increasingly take on pivotal roles in addressing environmental challenges, for the reason that “governments, which now provide a minor proportion of these services” (Ferguson, 2006), to cope with environmental issues, anthropologists delve into the dynamics of power, cultural sensitivity, and community participation inherent in these initiatives. As William W. Fisher noted, some argue that the emerging IOs and NGOs have held significant humanitarian initiatives by engaging in a wide spectrum of activities. These NGOs tackle issues ranging from grassroots and sustainable development to human rights advocacy, environmental protests, and various objectives traditionally within the purview of governmental agencies (1997). However, since the first rise of IOs for universal positive goals after World War II, the perspectives towards international bodies have been observably changed in the discussion of anthropology. Recent studies predominantly consider the concept from anti-colonial perspectives, with a particular emphasis on African dimensions. Environmental studies delve into remote regions, where the legacies of colonialism manifest through the hierarchical structure of the global order.

“The global, as seen from Africa, is not a seamless, shiny, round, and all-encompassing totality. Rather, the ‘global’ we see in recent studies of Africa has sharp, jagged edges; rich and dangerous traffic amid zones of generalized abjection; razor-wired enclaves next to abandoned hinterlands” Ferguson 2006

As emphasized by Ferguson, the global political economy classifies Africa as a continent grappling with numerous deficiencies and challenges; even state strengthening is poor, resulting in state failures and functionless governance. Thus, economically, the continent is often labeled as underdeveloped, with its economies collapsing and increasingly becoming marginalized on the world stage (2006). Consequently, issues such as resource depletion, forced labor, and unequal economic structures contribute significantly to ongoing environmental disparities, which are keenly felt in international aid from various organizations. The dependence of impoverished nations on international corporations driven solely by profit motives, as articulated by Christian Sterkl (2020), exacerbates these problems. That’s to say, such corporations seek to minimize expenses while maximizing profits, leading to the externalization of environmental costs associated with their operations. In simpler terms, these companies prioritize their financial interests, often at the expense of the environment, by shifting the burden of environmental destruction onto external entities, or “supranational actors” (Kelleher 2020). Nonetheless, Kelleher also highlights the potential for creating a win-win scenario for marginalized populations through the implementation of conservation policies. When these policies are applied, the economic funds provided by investor organizations can be acquired by the state. This approach becomes a strategic avenue to simultaneously achieve conservation goals and alleviate poverty. However, this argument faces criticism based on the belief that environmental conservation, when encapsulated by neoliberal ideologies and led by international state actors, may not offer a conclusive solution to the pressing imperative of poverty alleviation and socio-economic progress for communities in need. The rationale behind this skepticism is rooted in the contention that co-management agreements prioritize conservation, emphasizing the preservation of natural resources rather than serving as an effective tool for poverty alleviation (Sunde and Isaacs 2008, as cited in Bergthaler 2020). This brings about the most recent wave of global capitalist restructuring, marked by the rapid development of 'the global economy,' which has marginalized Africa, relegating it primarily to its historical colonial role as a supplier of raw materials (Ferguson, 2006).

In parallel, the environmental justice movement faces challenges due to Western imposition, resulting in a lack of credibility and visibility. The movement contends with an

environmentalism dominated by rich countries, developed nations, and non-governmental organizations under Western ethics. This situation raises questions about the true motivations behind environmentalism. When it is implacable to transnational projects, they are adapted in ways that resemble the organizational patterns typically seen in ‘enclaves’ exploitation’, where resources are exploited without full integration into the surrounding community or environment, even if they have looked like having a good intention or humanitarian purpose. (Ferguson, 2006). The reason is that states are increasingly relying on non-governmental means to establish political order, leading to a situation where traditional state governance is supplemented or replaced by external mechanisms. Within the discourse on International Organizations (IOs), Paul Farmer (2004) highlights the binary action mechanism that aids a strategic approach in gaining control over states seeking assistance from the IMF, to remedy their economic ailments. This mechanism plays a crucial role in shaping strategies employed by IOs, particularly the IMF in influencing and asserting control over nations grappling with economic challenges. Farmer's observation underscores the dynamics at play when states turn to international financial institutions for economic assistance. Similarly, the World Bank's structural adjustment programs, through which the conditions imposed prioritize the interests and returns of the lenders over the long-term economic development or well-being of the borrowing country. Nevertheless, the pursuit of conservation objectives fundamentally clashes with the imperatives of capitalist expansion within the framework of neoliberalism. It paves the way to “European colonialism continuing to find impetus and momentum through globalization” (Bredlid and Botha 2015).

“It is a global not of planetary communion but of disconnection, segmentation, and segregation—not a seamless world without borders, but a patchwork of discontinuous and hierarchically ranked spaces, whose edges are carefully delimited, guarded, and enforced”.

Ferguson 2006

Lastly, critics of such narratives rightly point out their flaw in assessing Africa solely based on external normative standards, such as the idea of "proper states" and "good economies." Instead, these perspectives tend to overlook the intrinsic qualities and dynamics within Africa, framing its conditions solely through an external lens without recognizing the diverse and nuanced aspects of its states and economies (Ferguson 2006). Within anthropological discussions, proponents contend that grasping the essence of Africa requires an anthropocentric lens, acknowledging the intricate cultural and social dynamics that shape its states and economies. Contrary to external normative standards, anthropological perspectives

advocate for an in-depth examination that delves into local contexts, offering a richer understanding of Africa's complexities beyond the colonialist imagination of Africa. Advocates propose the necessity of raising awareness of the invisible exploitation driven by 'turbo capitalism' in marginalized places. Breaking global stereotypes requires dismantling existing biases, necessitating an expansion of the information pool. This refers to the impact of inadequate or manipulative information dissemination across various media platforms, contributing to a deliberate unawareness of global events and issues, particularly the crisis of 'disposable people' seen through the eyes of supra-national actors (Nixon, 2011).

2.3. Environmental Conservation and Environmental NGOs

A significant aspect of anthropological inquiry is environmental education. Both the state and individuals have common responsibilities in the formation and prevention of environmental problems. Environmental education is necessary and mandatory in order to recognize these environmental responsibilities and fulfill the duties necessary to achieve a sustainable future. Global efforts are underway to address environmental concerns on an international scale. The first Intergovernmental Conference on Environmental Education, held by UNESCO in Tbilisi in 1977 and in collaboration with the United Nations Environment Programme (UNEP), was a pivotal moment. It highlights the vital role of education in addressing significant environmental challenges in contemporary society. The conference aims to explore the importance of education in tackling environmental issues, discussing ongoing national and international efforts, strategies for advancement at the national level, and the need for regional and global cooperation. This gathering serves as a platform to assess global needs and methods for promoting environmental education. In essence, it lays the groundwork for understanding the connection between education and environmental issues, influencing subsequent initiatives and policies. The 1975 International Workshop on Environmental Education in Belgrade is crucial in globally recognizing the association of environmental education with the solution of problems caused by excessive economic growth and rapid technological advancement (1978).

“Education is widely conceived as a catalyst for sustainable development. Yet our education systems are not always prepared for or responsive to challenges such as climate change. Accelerating geopolitical, demographic and environmental changes, and their associated uncertainty, risks and disasters, mean that there is an urgent need to reorient education systems to empower everyone to make informed decisions for environmental integrity, economic viability and a just society, and to respond to current and future challenges”.

UNESCO (as cited in the World Social Science Report 2013).

Environmental education, as envisioned by scholars, serves as a transformative force by instilling a global understanding of conservation values and responsibility among the younger generation through programs and events. It also plays a crucial role in offering alternative livelihood options and fostering ecologically sustainable practices for communities. The recognition of diverse cultural perspectives underscores the need for an inclusive educational approach to addressing human-environment relationships. Moreover, education is portrayed as a liberating force, dispelling misconceptions and providing individuals with the freedom to comprehend and utilize knowledge effectively. In summary, these perspectives converge to emphasize the holistic role of education in fostering a profound shift in attitudes and behaviors towards the environment (Zips and Mairitsch 2020; Shizha 2015; Kopnina 2013).

Environmental education operates within diverse contexts, ranging from formal academic settings or ‘institutional education’, to informal community initiatives, or ‘sociocultural learning’ (Kopnina 2013) which is a powerful learning method through involvement in society to achieve strong ties with community skills in terms of economic and social sustainability (Shitza, 2015). Both educational systems primarily aim to empower individuals with the tools necessary to make informed decisions, drive positive environmental behaviors, and advocate for ecological conservation. While formal education encompassing structured learning within academic institutions can integrate environmental studies by creating awareness about ecological challenges and sustainable practices; informal education is a natural learning through social experiences in specific community values. Both equip students with the knowledge needed to comprehend the intricate relationships between human activities and the environment, which may “vary in accordance with formal institutional policies or cultural traditions and expectations” (Kopnina 2013). As posited also by Dunlap (2018, as cited in Kopnina 2013), there are influential forces of learning, which are socio-cultural variables and political institutions. Socio-cultural elements, including “universal human activities, cultural values and a sequence of culturally patterned experiences” (Spindler and Spindler 2000), underscore the indispensability of the environment and the individuals within it in endowing knowledge with enduring value. The cultural milieu and community dynamics wield significant influence over the educational landscape. Conversely, political institutions emerge as decisive agents in shaping a well-constructed educational framework that aligns with socio-cultural imperatives. These institutions play a pivotal role in augmenting educational resources, ensuring the adaptive evolution of the system to meet the dynamic needs of society. In essence, environmental education is viewed as a cultural and societal process through which individuals

and communities develop an understanding of their relationship with the environment (Milton 2002; Kopnina 2013). It explores the ways in which different cultures perceive, interact with, and value their natural surroundings. Anthropological perspectives on environmental education delve into the cultural dimensions of environmental knowledge, examining how traditions, beliefs, and practices shape people's attitudes towards nature. This approach recognizes that environmental education is not just about disseminating scientific facts but also involves acknowledging diverse cultural perspectives and integrating them into strategies for sustainable coexistence with the environment. Furthermore, Michael Omolewa (2007) emphasizes that education constitutes an essential component of the cultural and historical fabric of the local community, preserved through diverse forms and conveyed via various channels, some of which are language, music, dance, cultural practices, religious traditions, and more. Over the centuries, this educational approach has served as a foundation for sustainable development across domains such as farming, health management and conservation.

The critics in anthropology acknowledge that there is a rapid decline in indigenous knowledge due to the global forces of capitalism, industrialization, and consumerism, which exert an impact on the actions and thought processes of indigenous or minority communities (Kopnina 2013). Widely debated in scholarly discourse, environmental non-governmental organizations (NGOs) often face skepticism, a sentiment amplified by the growing influence of post-colonial realities within institutional frameworks. As previously noted, NGOs, with expansive networks aligned with other global institutions sharing common objectives, are viewed with suspicion as potential disruptors of the equilibrium among nations. Georg and Louise Spindler claim that within the framework of global environmental ethics, the creation of an atmosphere fostering international collaboration based on eco-centric principles with the goal of formulating a unified and universally applicable solution to a global issue has faced criticism as indicative of declining biodiversity (2000). Their ostensibly humanitarian aid, or what can be labeled as interventions driven by self-interest, has been critiqued for creating dominance around environmental resources, eroding state authorities, and contributing to various forms of environmental degradation (Ferguson 2006). Such organizations having a role as “international donors” for developing countries (Charnley and Durham 2010), are examined by scholars, particularly considering African regions, which stand as potential victims of historical colonial powers. Georg and Louise Spindler argue that to gain a better understanding of education, it is essential to look into social and cultural variables in the educational processes in non-western societies (2000). The spread of Westernized culture in non-Western formal and

informal education systems has impeded the continuity of cultural heritage in communal education which is described by Shizha as a “psychological de-ruralization process of contextualizing knowledge production and dissemination” (2015). Helen Kopnina (2013) maintains the idea that the conviction that the Western education system is superior and more advanced than that of non-Western states motivates scholars to scrutinize societies, aiming to enhance their strength by aligning with Western standards. However, this perspective views the education system as a hindrance to the blossoming of youthful, innovative ideas and their potential to play a dynamic and transformative role in society. This exploitation of indigenous educational practices, as strongly asserted by Edward Shizha in a case study conducted in Sub-Saharan Africa, has resulted in a tragic reduction of the cultural education model. Instead, he reports that these systems have been assimilated into the Western legacy of colonialism, and as a consequence, their educational practices now resemble those of Europeans. Moreover, he mentions the prevalent oppression locals experienced when faced with unfavorable situations or resistance against European implementation. To address the issue of colonial education enforcement in African lands, a viable solution involves fostering indigenous knowledge and building conscious communities through education to use “counter- hegemonic cultural force” (Bredlid and Botha, 2015). In environmental education, a parallel situation exists. Many scholars agree that effectively shaping individual choices necessitates the guidance of environmentally informed governments for the management of educational settings and policies, not solely relying on individuals with ecological education. When efforts align with human nature, the potential for positive changes to emerge becomes more promising (Peter H. Kahn and Stephen H. Kellert 2002; Kant 1949, as cited in Kopnina and Ouimet 2013; Spindler and Spindler 2000). According to the perspective of Nixon (2011) and his examinations in the Global South, politicians tend to adopt “last in, first out” policies when it comes to environmental issues. Due to “neoliberal nature conservation, the role of the state is limited to that of a watchdog over private property privileges and enterprises” (Zips and Manuela, 2020). Their attitudes often reflect a lack of urgency and a tendency to pass problems onto the next generation. Despite pressing environmental concerns, many politicians exhibit a carefree approach, delaying crucial actions with the refrain “not now, not yet” due to the paradox of a long-term emergency, which exacerbates the environmental problems of the crisis in undeveloped and developing nations.

In brief, environmental colonialism is a recurring theme in environmental anthropology, sustained by the prioritization of individual utility, and executed by environmental NGOs and

international organizations. This highlights a pattern of exploitation and dominance in ecological matters that warrants careful consideration due to the fact that environmental justice is being undermined by conservation practices that are carried out under the banner of globalization (Meiu 2020). The needs and expectations of local communities, where schools are situated, should be addressed by mitigating the relentless forces threatening both human and non-human species. The primary goal shifts towards decolonizing the African education system through the implementation of culturally responsive and pragmatic educational programs. The outdated colonial practice of marginalizing indigenous languages in education ought to be repudiated as incompatible with the vision for contemporary Africa. The focus needs to be recalibrated to preserve endangered ecosystems and reform education in a manner that respects and reflects the diverse cultural and practical requirements of local communities (Zips and Manuela 2020; Kopnina 2013, and Shizha 2015). Moreover, Susan Charnley and William H. Durham argue that fostering collaboration within the community involving individuals from diverse sectors such as decision makers, investigators, and inhabitants can prove instrumental in identifying effective eco-friendly solutions. This approach acknowledges the social, political, and economic values inherent in the specific needs of the locale. (2010) The concept, possibly aligned with Karl Polanyi's substantivist idea of collective logic, is grounded in the recognition that sustainable practices and lifestyles are more likely to succeed when approached collectively, prioritizing the needs of the entire community or group over individual interests alone.

3. RESEARCH METHODS

This study explores the initiatives of NGOs actively involved in environmental education, specifically addressing plastic pollution and waste management in Seychelles. Employing a mixed-methods approach, the research collects both quantitative and qualitative data to offer a comprehensive analysis.

3.1. Quantitative research methods in anthropological inquiry

Quantitative data in this paper include the amount, types, and distribution of plastic debris collected during beach clean-ups. For instance, observations and measurements in the field recorded the amount of plastic waste collected over a specific period. Additionally, by leveraging data from reputable databases, comparative analysis techniques and interpretive approaches were employed to observe factors such as plastic usage habits, recycling rates, and

awareness levels. This data gathering process facilitated a comprehensive examination of the specified themes.

3.2. Qualitative research methods in anthropological inquiry

Qualitative data in this study were obtained through observations, interviews, and focus group discussions during fieldwork. These methods aimed to obtain in-depth information on the views, experiences, and sensitivities of local people and non-governmental organizations regarding plastic pollution. Qualitative analysis methods, such as content analysis or thematic analysis, were employed to approach participants' thoughts and feelings objectively. Fieldwork involved collecting extensive information from diverse segments of society through formal and informal interviews, serving as a participant observer. The integration of a mixed-methods strategy proved valuable for conducting a thorough examination of plastic pollution and waste management in Seychelles. This approach not only revealed overarching trends but also provided crucial insights into the root causes of these patterns and the firsthand experiences of participants. These diverse findings formed a robust foundation for the formulation of effective policies and solutions to address the complex issues associated with plastic pollution and waste management. Moreover, the research delves deeply into the narratives and methodologies employed in environmental education initiatives led by NGOs dedicated to tackling waste management and plastic pollution challenges in Seychelles. Utilizing techniques such as interviews and participant observation, this method aims to capture multifaceted perspectives, varied experiences, and proactive measures undertaken by these NGOs in response to pressing environmental concerns. In this comprehensive study, a multifaceted research approach was employed, combining individual interviews, questionnaires, and participant observation to gain a nuanced understanding of waste management and plastic pollution initiatives in Seychelles. The individual interviews, guided by a semi-structured interview guide, involved face-to-face interactions with key representatives from various NGOs, enriching the diversity of perspectives. In addition to interviews, participant observation played a pivotal role, involving immersive experiences in the field, such as participating in a beach clean-up with environmental activist Lara Gutser on Anse Barbarons Beach. Field notes documented during participant observation serve as rich qualitative data, capturing detailed observations, interactions, and reflections. This holistic research approach ensures a comprehensive and nuanced exploration of waste management and plastic pollution initiatives in Seychelles.

3.3 Sampling strategy: Selection of NGOs and key informants

First of all, Mahé is the main island and the largest island of Seychelles and almost 90 percent of the Seychelles population of 72.000 inhabitants lives there, which is why government buildings and ministries and the majority of local and even international NGOs are located there. For this reason, interviews were held with communities and organizations mostly on Mahé Island, and then observations and interviews were held on Parley Island.

Purposeful Sampling: NGOs were selected based on their active involvement in waste management and plastic pollution initiatives in the Seychelles. The selection criteria will include factors such as the duration of their presence, the scale of their operations, and their representation of different geographic areas within the Seychelles. NGOs working on plastic pollution and environmental conservation, and more importantly, NGOs in environmental education, projects, and awareness initiatives, were the primary focus. Also, ministry office was selected purposefully regarding an approach to see both the angles of state and non-state actors.

Purposeful Sampling Individual Volunteer Activists: People initiating voluntary projects, as might be called environmental activists, related to the topic were selected as interviewees. People were selected based on their involvement in individual beach clean ups. Through social campaigns or creating a new business model with the purpose of mitigating environmental challenges and raising awareness, people are doing those initial or secondary jobs. Their operations and cooperative actions with other local and international NGOs will be taken into consideration.

3.4. Description of the Field Site

My fieldwork and ethnographic observations for my thesis were conducted on the island of Mahé, the largest island of the Seychelles, apart from visits to Praslin and Felicite islands. A chain of 115 islands, the Seychelles consist of three main islands, Mahé, Praslin, and La Digue, where most of the island settlements are located. Before examining the main ethnographic field, which is Mahé, I will give some information about the islands I have visited. First of all, I visited Félicité Island which are located in 4 kilometers east of La Digue. As the fifth-largest gem in the Seychelles, Felicite underwent a transformation in 2013 under the ownership of Singaporean real estate developer Kishore Buxani. The island was allocated to a sustainable hotel. The project commenced in the middle of that year, and today, the island is home to the Six Senses Zil Pasyon resort, boasting 30 villas and spas, effectively occupying one-third of the

island's expanse.²The informative tour, a beacon of knowledge, unfolds the island's commitment to environmental responsibility under Lucie Bennett's insightful guidance, the sustainability manager at Six Senses Zil Pasyon-Felicite. At the heart of this hotel, there is a commitment to recycling, a principle that interlaces with this high-end establishment. Beyond the allure of luxurious services and facilities, the hotel strives to cultivate a profound relationship between its guests and the local community. This connection is rooted in shared values, as both visitors and residents embrace the principles and practices of environmental sustainability. This facility practices organic farming, cultivating fruits, vegetables, and greens in accordance with climatic conditions. The commitment to ideals and positive awareness extends beyond production to include recycling and waste reduction. For instance, the facility uses refillable glass bottles and water treatment technologies to address the issue of plastic production, given the preference for clean drinking water in Seychelles. This approach sets a commendable example for hotels and businesses in a country where tourism serves as the primary source of income. She provided me with comprehensive information on the hotel's water treatment facilities, waste separation systems in the cafeteria, organic farming methods on the premises, and, importantly, the conservation of natural habitats for both plants and animal species, including sea turtles. As a result of my observations, I have come to see more clearly that tourism activities in the Seychelles, including the production of waste and consumption of natural resources playing a major role. More specifically, hotels are one of the main actors in the tourism sector along with the fishing industry, and the important steps they take under environmental responsibility are an important initiator for creating environmental awareness and widespread sectoral awareness. Also, by seeing these eco-friendly hotel facilities I observed how sustainable development practices are implemented in different sectors like tourism and different islands of the Seychelles. Nevertheless, arguably, I can assert that the popularity of sustainability under luxury concepts should be criticized from many aspects. For example, the hotel, equipped with sustainable energy resources and practices, does not appeal to citizens from all walks of life due to its high cost compared to other tourism options. Although efforts are being made to address the waste pollution problem in the tourism sector, there is a lack of sustainable studies demonstrating exemplary adaptability to other areas of the country.

² One experienced Six Senses hotel employee, Lucie Bennett, who was the Sustainability Manager at Six Senses Zil Pasyon-Felicite, introduced the hotel and talked about their ideal mission and sustainability initiatives on May 8, 2023. I haven't done an interview session with her, but fieldnotes have been used as a contribution to the research.

Secondly, Praslin Island is located northeast of Mahé Island. This island is home to approximately seven percent of the Seychelles population. I can say that my visit to Praslin Island to evaluate the environmental conditions of the second-largest island played a role in expanding my research. I conducted an interview session with independent community group Fresh Focus, Ivan Ray Capricieuse and Jason Edward Gomme who are Seychellois, and from My Beach Project, Stephanie Wichmann, who works in the community of Fresh Focus as well as a unique individual environmental initiator through art work. Stephanie, who is captivated by her entrepreneurial ventures, expressed her goal of leveraging social media effectively to bring attention to the disruption of the delicate balance of nature caused by environmental waste. Her aim is to prompt society to contemplate and address this pressing issue. In addition to her regular beach cleaning efforts, Stephanie's artistic creations crafted from waste materials have garnered widespread appeal across various segments of society. Through her innovative approach, she not only contributes to environmental conservation but also sparks interest and engagement from diverse communities. The figures she sculpts from discarded materials serve as powerful visual reminders of the impact of waste on our surroundings, encouraging a broader audience to reflect on their own consumption habits and the need for sustainable practices. Stephanie's dual commitment to both hands-on environmental action and creative expression underscores the multifaceted ways individuals can contribute to raising awareness and fostering positive change. Since she started working in environmental conservation in the Seychelles instead of going back to her country, Germany. She makes a clear analysis of the conditions and high risk of waste pollution in African countries, specifically the Seychelles, and has a great passion for the path to make changes in the sense of responsibility for the environment.

Moreover, I have visited the National Park called the Vallée de Mai; a living relic of ancient palm forests that is often referred to as the island's green heart. Within its boundaries, you can find the largest remaining forest of the endemic coco de mer palm in the Seychelles. Despite its relatively small size of just 19.5 hectares, the Vallée de Mai holds the distinction of being one of the world's most compact natural UNESCO World Heritage Sites. This forest has been isolated for millions of years, leading to the evolution of numerous distinctive species that are exclusive to this location and cannot be found anywhere else on the planet. The Seychelles government recognized its importance early on, granting it protection as far back as 1966. This safeguarding effort encompasses over 1,400 Coco de Mer trees, renowned for their uniqueness and the significance of their habitat.

Thirdly, located on the largest and most densely populated landmass in the Seychelles, Mahé Island encompasses 157.3 square kilometers. It is located in the Indian Ocean, off the eastern coast of Africa, north-east of Madagascar. Victoria is the capital of Mahé. Mahé offers all the characteristics of a tropical island paradise. The Morne Seychellois National Park serves as a large nature reserve that protects the natural beauty of the island. Victoria, the capital of Mahé, is the administrative and cultural center of the country. The city offers a small but vibrant center and combines an old-world and new-world atmosphere. Mahé also functions as the economic center of the country. Tourism makes up a large part of the island's economy, and Mahé has many luxury resorts and accommodation options, so associatively, Mahé is the center of local industry, retail, and trade.

During my three-weeks of stay on Mahé Island, I had the privilege of discovering the diverse geography and cultural interactions that define the Seychelles. In other words, this duration provided a great opportunity to keenly observe the region's geographical and cultural facets. Known for its geographical and natural charm, the Seychelles is described as an idyllic paradise for nature lovers, especially with its marine ecosystem and forested habitats. Engaging in snorkeling trips and professional scuba diving experiences in Beau Vallon has helped me to observe the fascinating world of vibrant coral reefs and marine life, as well as the marine plastic waste situation. After all, witnessing such ecological diversity served as a poignant reminder of the profound impact human actions can have on nature, emphasizing the importance of responsible and sustainable practices. The bulk of my observations were conducted in Beau Vallon, situated in the northwest of the island. The rugged, mountainous, and narrow roads, a product of the island's geological structure, posed a surprising challenge for travel, given the Seychelles' small island status. This unexpectedly difficult transportation situation contributed to the noticeable congestion of cars on the island, especially evident during my stay in May. Litter bins overflowing along the beach at Beau Vallon were showing the dangerous situation of waste in the first place. This issue extended to other parts of Mahé and even Praslin, showcasing a broader problem. The lack of designated public garbage collection areas or bins separated by material type became evident not just on the beaches, it was hard to find a rubbish bin around Victoria as well. Broken or unusable garbage bins at bus stops added to the challenge of environmental pollution. Another observation is the behavioral habits of younger generations who often prefer open spaces for leisure activities, demonstrating a tendency to leave behind containers, bottles, and plastics without proper disposal. As an inevitable outcome, the garbage that ends up in the sea and in nature poses a danger to many species. Hence, the lack of

environmental consciousness among the island's residents becomes a defining factor, highlighting how the inadequacies in infrastructure contribute to the diminishing state of environmental concern.

On May 13th, participating in a beach cleanup with Lara Gutser at Anse Barbarons Beach offered a hands-on perspective on the issue. We collected 14 kilos of garbage, primarily plastic (PET) bottles, glass alcohol bottles, slippers, portable food containers, market bags, and even personal care items. Gutser, recognized as an environmentalist on the island, manages her own business while simultaneously making significant individual efforts to mitigate environmental pollution. She is originally from Germany and has lived in the Seychelles for over 6 years. By sharing personal photographs of her beach cleaning endeavors on her social media accounts under the name “SeychellesBeachCleanUp”, Gutser aims to raise awareness about the risks associated with waste disposal on beaches. Her efforts in organizing such cleanups serve as a commendable example of her individual dedication to environmental awareness.

Apart from the shorelines, there were noticeable accumulations of waste along roadsides, concealed behind bushes, releasing a persistent garbage smell into the atmosphere. The fact that a regular garbage collection system, garbage separation bins, or just garbage bins cannot be positioned on narrow roads due to the geological conditions of the island makes this situation even more critical. Additionally, the Seychelles faces a considerable amount of marine-derived plastic waste from fishing activities and shipping routes, with abandoned fishing gear contributing substantially to the plastic pollution issue. In a nutshell, the Seychelles' natural beauty contends with environmental threats stemming from ineffective waste management practices.

3.5. Ethical Concerns

To avoid potential ethical problems, I adhered to a set of ethical guidelines throughout my fieldwork in the Seychelles. Firstly, I obtained full consent from all participants before the research methods were used (interview, informal conversations, questionnaire), ensuring they were fully aware of the purpose of the study, the nature of their involvement, and the potential implications. I also prioritized confidentiality, assuring participants that their personal information would be handled with the utmost care and would only be used for research purposes. Additionally, I maintained a transparent and respectful approach, acknowledging and respecting the cultural diversity of the Seychelles. I strived to minimize any potential biases in

my interactions and analyses, recognizing the importance of cultural sensitivity. Moreover, I remained conscious of power dynamics, aiming for an inclusive and participatory research process that empowered participants rather than exploiting their perspectives. By upholding these ethical principles, I aimed to foster a trustworthy and collaborative environment, allowing for a more accurate representation of diverse viewpoints on environmental issues in the Seychelles. During my time in the Seychelles, I placed a strong emphasis on environmental consciousness to ensure that my research activities had a minimal impact on the delicate ecosystems. Striving to reduce my ecological footprint, I implemented practices aimed at generating minimal waste, such as opting for reusable materials and responsibly disposing of any unavoidable waste. By incorporating these environmentally conscious practices into my research approach, I aimed to contribute to the safeguarding of the Seychelles' natural heritage while obtaining valuable insights into the diverse perspectives on environmental issues within the region.

4. ETHNOGRAPHIC CASE STUDY /OBSERVATIONS

4.1 Politics of Waste: Sustainable Resource Management in Seychelles

The politics of waste management have emerged as a critical aspect of environmental discourse and serve as a lens through which societies grapple with the growing challenges posed by waste accumulation. In the context of the Seychelles, an archipelago country, the intersection of environmental protection and waste management becomes even more important. Against the backdrop of global concerns about the environmental impacts of mismanaged waste, the Seychelles provides an intriguing case study in which the delicate balance between economic development and ecological conservation is carefully observed. As commonly discussed by anthropologists, the socioeconomic conditions and political implementations in developing nations play a significant role in shaping the practices of environmental conservation, influencing how communities interact with their natural surroundings, and defining their approaches to sustainable resource management. In this ethnographic part, I aim to explore the nuanced dynamics of waste policy in the Seychelles, with a special focus on the role of governance in spearheading waste management initiatives, in particular education in environmental context. By exploring the interplay between environmental imperatives, government policies and the proactive involvement of NGOs, this review aims to shed light on the evolving landscape of waste governance in Seychelles and its implications for sustainable development.

To begin with significant steps in environmental development, The Seychelles, as a Small Island Developing State (SIDS), in the Seychelles National Waste Policy 2018-2023³, grapples with significant challenges in waste management due to limited land area, technical capacity, and financial resources. With an estimated annual solid waste generation of 80,000 tons and a yearly increase of 6%, the nation recognizes the importance of environmental conservation in its constitution. Seychelles has a significant history in waste management, marked by the initiation of the Environment Management Plan Seychelles (EMPS) in 1989, supported by UNDP, UNEP, and the World Bank. The success of EMPS 1990-2000, backed by substantial pledges, marked a decade of accomplishments, including legal reforms, environmental impact assessments, and the elimination of environmentally harmful practices such as the turtle shell industry. Amid economic challenges, a 2009 review highlighted successful implementation, showing the Seychelles' commitment to environmental sustainability. Seychelles has been an early signatory to global environmental conventions, emphasizing its leadership in sustainable development. The commitment to sustainable development aligns with global resolutions and is embedded in the country's constitution, affirming the right to a safe environment and emphasizing the need for judicious resource management. The transition from the EMPS to the Seychelles Sustainable Development Strategy (SSDS) 2012-2020 signifies a strategic shift toward a more comprehensive framework, recognizing the intricate linkages between environmental and social issues. EMPS is inherently about sustainable development rather than mere environmental management and also lacks educational enforcement. "Although the second EMPS did not include education as a thematic area on its own, but rather as a cross-cutting theme, many stakeholders, including the government, NGOs, parastatals, the media, and the private sector continued to develop environmental education and awareness programs on their own and in collaboration with each other's" (SSDS 2012-2020, accessed through UNEP, 2012).

The Seychelles National Waste Policy 2018-2023, aligned with national strategies and international commitments has been developed through consultation with stakeholders. It aims to provide a framework for government, private sector, and public involvement in waste

³ The Seychelles National Waste Policy 2018-2023 is anchored in a set of key principles and approaches that underscore its commitment to sustainable waste management. Embracing the concept of "Waste as a resource," the policy advocates a shift towards sustainability and resource conservation. It emphasizes the "Cost Recovery" principle, aiming to progressively recover economic costs from waste producers based on the Polluter Pay Principle. The policy adopts a "multi-stakeholder approach," recognizing the pivotal role of the private sector and civil society in decision-making processes. "Public education and awareness" are prioritized to minimize waste and associated costs through informed waste management practices. Embracing the "Circular Economy," the policy seeks to maintain the value of products and resources for as long as possible, fostering economic benefits, innovation, growth, and job creation. The "Waste Hierarchy" guides strategies to prevent waste generation and reduce harmfulness, promoting reuse, recycling, recovery, and safe disposal. The "Precautionary Principle" emphasizes action in the face of credible environmental or health risks, and "Extended Producer Responsibility" involves manufacturers in closing the life cycle of products. The "Polluter Pays Principle" holds those responsible for waste generation accountable for mitigating environmental consequences. Anchored in the concept of "Sustainable Development," the policy strives to balance economic, social, and environmental considerations. Finally, the "Best Practicable Environmental Option" ensures systematic decision-making for environmental protection across land, air, and water, seeking the optimal combination of options that benefit the environment in the short and long term at an acceptable cost.

management, emphasizing the efficient use of resources and acknowledging waste as a potential economic asset. The policy is funded by the cooperation of GOS (Government of the Seychelles), UNDP (United Nations Development Programme) and GEF (Global Environmental Facility) Resource Efficiency Project, and seeks to encourage informed decision-making and sustainable practices in waste disposal.

Waste is managed in a sustainable manner, following the set guiding principles and approaches, in order to protect the integrity of the environment and improve the quality of life in the Seychelles. (The Seychelles National Waste Policy 2018-2023, 2018).

The primary institutions responsible for executing the Seychelles National Waste Policy 2018-2023 are the Ministry of Agriculture, Climate Change and Energy (MACCE)⁴, along with the Landscape & Waste Management Agency (LWMA)⁵. In light of legal and institutional principles, it is stated in the official document of SNWP 2018-2023 that waste management regulations are formulated by incorporating international conventions, such as the Stockholm Convention, into the national framework through a process known as domestication. In fact, it is intensely mentioned that “waste infrastructures shall be in accordance with international practices that minimize environmental impacts (according to BPEO principles).” (Seychelles National Waste Policy 2018-2023, 2018). The term "best practicable environmental option" (BPEO) in environmental management refers to the outcome of a thorough decision-making process emphasizing comprehensive environmental protection across land, air, and water. Furthermore, the Seychelles, a proactive participant in the global effort to combat climate change, has been actively involved in the Paris Agreement, contributing to the international commitment to limit global warming. As part of this commitment, the Seychelles submitted its Intended Nationally Determined Contribution (INDC) in September 2015, formalized upon the country's endorsement of the Paris Agreement in April 2016⁶. This revision is facilitated through the NDC Partnership's Climate Action Enhancement Package (CAEP), involving

⁴ MACCE holds a key role in shaping and executing policies for waste management, encompassing aspects such as collection, characterization, treatment, and disposal. The Waste Enforcement and Permit Division, part of the Environment Department under MACCE, takes charge of developing policies related to waste. The ministry is committed to safeguarding the constitutional right to a clean environment, providing dependable water and energy supplies, and enhancing resilience to climate change and disasters.

⁵ LWMA's responsibility is to maintain the cleanliness and aesthetic appeal of the Seychelles. Additionally, LWMA is tasked with overseeing waste management contracts, ensuring efficient waste collection, and managing landfills. The ministry entrusts LWMA with the supervision of contractors engaged in waste-related activities, including collection, landfill management, and the upkeep of cleanliness on the Seychelles' beaches and roads.

⁶ In June 2020, Seychelles commenced the process of updating its 2015 NDC, a critical step in aligning with the Paris Agreement's requirement for nations to revise their contributions every five years. Despite challenges posed by the COVID-19 pandemic, Seychelles is resolute in submitting its updated NDC by July 2021, intending to present it at the UN COP26 in Glasgow. The revision process, initiated in June 2020, follows a stepwise approach led by the Seychelles Ministry of Agriculture, Climate Change, and Environment (MACCE).

technical assistance from supporting partners such as the World Bank, EU, UNDP, IRENA, GIZ, TNC, Pew Charitable Trust, and SeyCCAT. The NDC Partnership's in-country facilitators play a crucial role in coordinating the implementation of NDC Partnership Plans, acting as the interface between MACCE and the Partnership. Given attention to all legal processes above, it is seen that developing states, often portrayed as vulnerable to climate change and subject to economic and social assessments by leading developed nations and intergovernmental organizations such as the United Nations and its subsidiaries and the European Union, demonstrate the Seychelles government's commitment to international declarations in its strategic planning and regulatory frameworks. From the perspective of a senior waste management officer at LWMA, I received the following remarks during the interview: “Seychelles' way of handling environmental policies boosts its credibility and helps deal with environmental issues more effectively. They do this by taking the best ideas from global conventions. Also, connecting with other countries helps Seychelles learn more and work together on tackling tricky environmental problems through sharing info and teaming up” (Mondon, 17.05.2023, interview), in parallel with the argument that “the impact is not only local but also extends to international negotiations. Small island states must actively participate to defend their interests, as dealing with these issues can be very challenging for us (Racamora, project coordinator at TOP 18.05.2023, interview). In addition to that, I observed similar perceptions during the fieldwork. In this context, the formulation and execution of state policies are intricately interwoven with the sources and convictions that underpin the nation's institutions. Notably, the ideological foundations shaping these policies extend beyond domestic considerations, with a significant reliance on international declarations, particularly those pertaining to environmental stewardship. The global discourse on environmental sustainability, as encapsulated in various international treaties and declarations, profoundly influences the trajectory of the Seychelles government's environmental policies.

The disposal sites in the Seychelles currently total four, situated in different locations—two on Mahé (Providence and Anse Royale), one on Praslin (Amitié), and another on La Digue (L'Union). As a small note, the Anse Royale is sponsored by the EU, but it does not currently function due to the dissatisfaction of the people living in the surrounding area due to the location of the landfill (Lau Tee, 17.05.2023, interview). These landfill areas are government-owned open dumps facing recent restrictions on the import of specific single-use plastic items, encompassing plastic bags, Styrofoam boxes, plastic utensils, cups, plates, and straws. While significant strides are yet to be made in large-scale waste recycling initiatives, there are existing

measures targeting two specific waste streams—PET bottles and beverage cans. Through a regulated deposit system, individuals can return these items at various redeem centers across the islands, receiving a refund for each item. The sole active waste collection effort targets plastic bottles, primarily PET bottles, with glass bottles being a secondary focus for recycling. In the recycle center in Mahé, just PET drink bottles, aluminum drink cans, and glass alcohol bottles can be redeemed. Some other concerns have risen up at this point: people doing territory monitoring to collect these items to gain financial benefit in return for these items in redemption centers have not actually done a contributing job for the environment. Stephanie Wichmann (19.05.2023, interview), an environmental activist renowned for her unique trash art project under MyBeachProject, and Lara Gutser (14.05.2023, interview), a prominent environmental advocate celebrated for organizing beach cleaning events and her social media platform SeychellesBeachCleanup, both express a shared perspective. According to their insights, the reason why PET bottles continuously appear in abundance in nature is linked to the low cost of these items, priced at only 0.50 rupees (0.036 euros) for a can and 0.70 rupees (0.051 euros) for a PET bottle. Although this has been done to encourage people to bring recyclable wastes to recycling centers, the financial support seems to be insufficient, so this automatically means that in these circumstances, people individually are not willing and enthusiastic enough. Another negative outcome of this system is the ignorance of the gelatins and caps of the plastic bottles, which are supposed to be taken out to be able to get paid by the redemption centers. Drawing from my personal experiences as a participant on Mahé, particularly during a beach cleanup event at Anse Barbarons Beach with Lara Gutser, it became evident that individuals tend to discard PET bottle caps and gelatins in situ. Lara Gutser emphasized that “these lightweight and compact items are susceptible to water and wind, easily drifting to different locations” (14.05.2023, interview). This characteristic poses challenges in the identification and collection of plastics that could otherwise be salvaged. The consequence is an increased difficulty in mitigating plastic pollution, raising concerns for the well-being of marine life as these discarded items either vanish into the natural environment or intermingle with seawater.

The processed recyclables, involving shredding and baling, are then exported overseas, and yet other materials like different plastics, glass, paper, and organic waste find their way into landfills. As one of the initial waste management plans, Lau Tee, senior waste management officer at LWMA, stated that they will “try to extend the life of this landfill and promote recycling as much as we can and segregation. And we are trying to divert organic waste from the landfill because it makes up almost half of the amount of waste in our landfill. And organic

waste is something that we can recycle” (17.05.2023, interview). Despite the nascent state of broader recycling initiatives, the PET bottle and beverage can redemption system in Seychelles has resulted in the successful collection and recycling of 109 million cans and 259 million PET bottles (Agricole et al., 2016). Efforts to enhance the current waste management system in Seychelles are crucial for the future sustainability of recycling practices. The reason is explained by waste management officers: “there is no proper collection system, we pay different companies, and the Ministry lacks the necessary budget allocation and funding to support waste management practices, we might not be conducting some efficient and proper landfill monitoring and compaction. So that's why we tend to be reaching maximum capacity quicker, so we need training with the staff here. Maybe we need to have more equipment of better quality as well” (Mondon, Lau Tee, 17.05.2023, interview). That’s to say, the Seychelles has grappled with intricate challenges in waste management, resulting in practices such as landfilling and waste exportation.

The island nation's constrained land area and limited waste management infrastructure have contributed to the prevalence of landfilling as a means of waste disposal. Since then, due to limitations in waste management infrastructure and resources, landfilling has become a common practice in the Seychelles with side effects. “Currently, nearly 80% of global waste is sent to landfills, with a significant amount lacking proper design or containment” (Castaldi, 2014). In line with the information expressed by Estelle Lau Tee and Camille Mondon, senior waste management officers at Landscape and Waste Management Agency, it is possible to say that new projects and solution-oriented garbage separation and recycling opportunities are currently being worked on since “waste management, which was previously carried out by private company Star, a South African company, for over 20 years, has been assigned to the state institution under LWMA by the state this year, with the information that the landfill area in Seychelles is about to reach almost the maximum level, one of the reason is that the land area is limited in the Seychelles.” (17.05.2023, interviewed). In the document of Solid Waste Master Plan for Seychelles, it is noted that “around 50% of the solid waste produced in Seychelles is compostable” (Wim et al. 2020) which means that separation of the organic fraction would substantially contribute to the diversion of waste from landfills. Nevertheless, improperly managed landfills can lead to environmental pollution, including soil and groundwater contamination, and contribute to visual blight. In other words, in the absence of regular monitoring, “the harmful liquid produced by the waste that dissolves and decomposes in the landfill on an island that is 99 percent water is mixed with underground and surface water

resources” (Lau Tee, 17.05.2023, interviewed), causing health problems for all living organisms and humans. Additionally, the Seychelles has engaged in waste exportation, a strategy often employed by small island nations facing resource limitations. This actively demonstrates that Seychelles, like many small island nations, faces difficulties in managing its waste locally. “There are more and more difficulties to export as well for the plastic. For example, China and other Asian countries have closed their borders” (Mondon, 17.05.2023, interview). This implies that these nations have restricted or halted the import of plastic waste. This closure of borders may be a response to environmental concerns, changes in regulations, or other factors influencing the global trade of plastic materials. Additionally, financial challenges in managing waste costs are attributed to inadequate state policies. Simultaneously, another contributing factor to this predicament is the absence of financial incentives or taxes from society for effective waste management. “This absence places the entire burden on the state, further complicating the financial aspects of waste management” (Mondon, 17.05.2023, interview). In some cases, the country exported waste to other countries with more developed waste management systems. While exportation may temporarily alleviate local pressures, it raises ethical and environmental concerns, potentially transferring waste-related issues to recipient regions. Mitigating these challenges requires comprehensive waste management strategies that account for the unique geographic and economic circumstances of the Seychelles, aiming to minimize environmental impact and ensure the long-term sustainability of waste management practices. Due to these limitations and unfavorable conditions, the Seychelles has become a highly vulnerable region for plastic pollution, making it a compelling subject for research.

In parallel with constraints in waste management initiatives, complicating matters are conventions that impose restrictions on actions, adding another layer of complexity. The recycling landscape faces constraints, particularly concerning specific types of plastic. For instance, rigid plastic such as HDPE requires substantial quantities for cost-effective shipping, posing a logistical challenge. The interview with Alvenia Lawen, who is Seychellois and Parley Seychelles country coordinator, on August 12, 2023, underscores the financial burden and logistical challenges associated with recycling. Storage expenses and transportation costs contribute to the impracticality of the current system. Lawen emphasizes the need for a thorough review of the recycling system by the Ministry of Agriculture, Climate Change, and Environment (MACCE) to improve consumer convenience. This may involve streamlining processes, increasing accessibility, and enhancing overall user-friendliness to pave the way for

more sustainable waste management practices in the Seychelles. Moreover, the Seychellois government's adherence to international treaties and declarations serves as a benchmark for evaluating the efficacy of its environmental policies. The alignment with global standards provides a basis for assessing the nation's progress in achieving sustainable development goals and mitigating environmental risks. "It is important for backward island states like the Seychelles to grow and improve the Seychelles' standing in the international community" (Mondon, 17.05.2023). Followingly, critics by many anthropology scholars like Ferguson and Breidlid and Botha 2015, argue that influential nations, often driven by hegemonic interests, may disproportionately shape global standards, sidelining the voices and needs of less powerful countries. A post-colonial lens highlights concerns about cultural insensitivity and the potential continuation of imperialistic undertones in certain international practices. Moreover, the lack of equal representation in decision-making processes and a perceived Western-centric bias raise questions about the inclusivity and fairness of these practices. In essence, these critiques call for a more conscious effort to foster equitable, culturally sensitive, and inclusive international frameworks that genuinely consider the diverse perspectives and historical contexts of all nations involved. Even though following internationally accepted and proven principles promotes global cooperation and harmony and helps create an atmosphere of solidarity and trust in international relations, I also argue that it is fundamental to pursue an independent political stance, enforcing laws and practices that are not dictated by international organizations or actors of [so-called] superpowers. As it is often emphasized by environmental anthropologists, practices and policies that are shaped according to the culture and value judgements of the society and that respond to the lifestyle and needs of the people of the society should be selected (e.g. Kopnina 2013). In parallel with interference principles of international actors from a globalized worldview, perception building would be another concerning point from the angle of the Seychelles case study. On the official ministry webpage of the state, as stated in the National Waste Policy, the Seychelles is described as a weak nation-state not capable of coping with environmental problems effectively. Based on the principle of causality, the portrayal of underdeveloped and developing states as inherently in need of worldwide aid and incapable of self-development without international support is often underpinned by neoliberalism, a perspective that tends to emphasize the role of free-market capitalism and minimal state intervention in economic affairs. This framing perpetuates a narrative that positions these states as dependent entities requiring constant external assistance, obscuring the structural issues and historical factors that contribute to their socio-economic challenges. Neoliberalism, as a prevailing economic ideology, often advocates for the reduction of state involvement in

economic activities, favoring market-driven mechanisms. This ideology, when applied to the international development discourse, shapes a narrative where underdeveloped and developing states are portrayed as inherently deficient and unable to progress without external intervention. This portrayal serves to justify and perpetuate a global power dynamic where certain states, often considered economically advanced, assume “the role of benefactors or mentors” (Caniglia 2011). The emphasis on international aid as a primary means of development reinforces a dependency narrative, creating the perception that these states lack the internal capacities for autonomous growth. By framing development as contingent on external assistance, the neoliberal perspective undermines the agency of the Seychelles, neglecting the potential for self-determination and natural growth.

Disregarding policies aimed at mitigating disempowerment and dependence holds the potential to introduce significant vulnerabilities for externally dependent states and administrations. This is evidenced by numerous case studies in African regions, including my research on the Seychelles. Particularly, the reliance on external interference principles, such as maintaining control initially through binding international conventions or policy recommendations like international funds and grants for local development projects, underscores the pronounced economic dependence and its associated challenges. The senior waste management officer’s saying during the interview was, “The Seychelles has a highly sophisticated social development infrastructure, encompassing education, health, welfare, and housing; however, the potential efficacy of this network is at risk due to the adverse impact of weak economic performance and environmental degradation.” (Lau Tee, 17.05.2023, interview). This perspective introduces a critical paradox. Social development networks are frequently backed by international organizations that aim to support economically weaker states in the realm of environmental sustainability which contributes to poor nations’ budgets. However, simultaneously, these organizations bind these states through agreements, effectively restricting their potential for independent development and growth. In this scenario, the pursuit of solutions may, ironically, become the root problem. In other words, networks that seemingly promote development might actually impede the economic progress of states by limiting their autonomy as Rob Nixon (2011) mentions the potential harms that may be caused by environmental crises in the aspect of environmentalism of the poor. The country's limited income resources also drag the country into the same kind of dilemma. In Seychelles, tourism significantly contributes to the nation's economic gains but concurrently plays a notable role in waste generation. In a nation heavily reliant on tourism for its income, the very natural

attractions that draw visitors face a detrimental impact from the escalating issue of plastic waste. This environmental challenge poses a threat to the allure of these natural habitats, potentially diminishing tourist interest and, consequently, having severe repercussions on the crucial tourism sector, which serves as a vital source of income for the country's economy. However, the data indicates that a substantial 35% of the waste originates from the tourism industry, as highlighted by Camilla Mondon of LWMA (17.05.2023, interview), with a significant contributor being food waste. This revelation underscores the far-reaching environmental implications of tourism activities, particularly disposal of unused or leftover food items. As efforts are directed toward mitigating plastic pollution, it becomes imperative to address the intricate challenge of waste management within the tourism sector to ensure the sustainability of both the environment and the country's economic backbone. Irene Ducret (11.05.2023, interview), a social media manager of the Seynoplasic organization, pursues the same argument that the influx of tourists brings with it an increased demand for various services, accommodations, and consumables, often accompanied by a surge in waste generation. Single-use plastics, packaging materials, and disposable items become integral to catering to the needs of visitors. Consequently, the rapid accumulation of plastic waste and other pollutants can strain the limited waste management infrastructure of the Seychelles, leading to challenges in waste collection, disposal, and recycling. The symbiotic relationship between tourism and the economy, while offering economic opportunities, necessitates a careful consideration of sustainable practices to mitigate the negative impact on the environment. This entails implementing measures to reduce plastic consumption, promoting responsible tourism behaviors, and fostering greater awareness among tourists and local communities about the importance of preserving the Seychelles' natural beauty.

Another point I have realized during my field work focuses on the deficiency of projects in the fields of waste reduction, plastic pollution and raising social awareness about environmental conservation. While preserving plant and animal diversity through projects and funds overseen by foreign organizations and institutions is quite common, I have seen that the number of initiatives for the certain purpose of coping with anthropogenically-emitted environmental issues is insufficient. In other words, while there is significant attention to safeguarding biodiversity and protecting endangered animals like sea turtles, giant tortoises and plant species, areas like plastic pollution, waste management, and recycling projects may not receive the same level of emphasis. Instead, the priority is actually given to the area where investment is made like in the Seychelles. Thus, the budget and opportunities allocated to

sustainable nature, a clean environment, and appropriate waste management and control are limited and even insufficient. To spread an eco-friendly approach, the state must fulfill the need for waste collection facilities. As mentioned by Estelle Lau Tee, “a lot of people might not be segregating their waste; there could be different factors. And a big factor could be that we're not providing the services for them to do so, you know, so for them, what's the point of doing it if waste is just going to end up at the landfill?” (17.05.2023, interview). Consequently, this limited focus poses a significant risk to environmental pollution, especially from plastic waste, which further threatens the broader objectives of biodiversity protection. According to my analysis, the initial criticism is that the Seychelles aims to integrate climate considerations into various sectors, including tourism, agriculture, fisheries, and land-use planning. As it is mentioned in the Sustainable Development Strategy of Seychelles Action Plan 2012-2020, a supportive argument would be “the SSDS should not be seen as an ‘environment’ document but one that seeks to mainstream environmental and sustainability issues into all thematic sectors (such as population growth, agriculture, coastal management, and climate change adaptation and mitigation), policies and other institutional frameworks of the country” (UNEP, 2012). On the one hand, it underscores the Seychelles' dedication to fulfilling its obligations and achieving higher ambitions for a climate-smart, resilient, sustainable, and prosperous future. On the other hand, I personally see that there are still some misconceptions about how feasible it is to seamlessly integrate climate considerations into various sectors. Some critics argue that the challenges posed by climate change are complex, making it difficult to implement effective strategies across different industries (Pellow 2011; Bergthaler 2020). They believe that economic realities may hinder the smooth integration of climate-smart practices, raising concerns about potential trade-offs between sustainability goals and economic growth. From my perspective, this highlights the need for a realistic assessment of the complexities involved in achieving a balance between climate considerations and sector-specific interests in the Seychelles' development agenda. “Additionally, it wouldn't be inaccurate to assert that a significant hindrance to the timely execution of pending projects and initiatives within the institution and its affiliated state entities is financial constraints. The Ministry of Environment is the least funded in the Seychelles. So, the one body that distributes the money is the Ministry of Finance. That's how funds are allocated. So, the money constraint is a big problem” (Lawen, 12.08.2023, interview). Specifically, the hierarchical structure of state institutions contributes to challenges in the effective implementation and processing of their tasks. As revealed during interviews at LWMA, there are instances where files containing initiatives aimed at enhancing waste management and promoting environmental awareness were archived but remained

shelved due to a lack of project funds anticipated to the Ministry of Agriculture, Climate Change, and Environment (MACCE). Indirectly necessary money for waste management remediation cannot be achieved by LMWA. Hence, as state entities occasionally struggle to implement socio-environmental practices due to inadequate funding, the government finds itself increasingly reliant on foreign investors and subject to the global dynamics of capitalist powers. While ministries depend on donations and foreign aid funds facilitated by local organizations, these interim measures fall short of adequately addressing the country's pressing needs. In this regard, Alvenia Lawen puts forward that “I believe it is the government's responsibility to explore international funding opportunities. When presented with diplomatic opportunities for funding from countries capable of providing support, the government should have dedicated staff with the expertise to identify and secure these opportunities. Additionally, the government should actively engage in the search for funding sources” (12.08.2023, interview).

Indeed, the country's reliance on foreign interventions, international conventions, and project investors, on the one hand, and the state's prioritization of tourism and rapid economic gains in development areas to strengthen state power, on the other hand, have resulted in the subordination of nature and a lack of emphasis on environmental protection and waste management. Studies and field observations reveal that the Seychelles delegates the responsibility for environmental awareness, addressing environmental pollution, and awareness-raising activities mainly to independent NGOs and international community organizations.

Within the scope of the studies carried out by the state in terms of environmental education, the MACCE has been taking a leading role with the primary organ Ministry of Education. The ME actively engages in international collaborations, partnering with organizations like UNESCO and the Commonwealth Secretariat to foster sustainable development, elevate teacher training, and enhance the overall quality of education in the Seychelles. As stated in SSDS 2012-2020, partially derived from our responsibilities under UN Agenda 21 and associated global commitments, the Seychelles demonstrates a robust dedication to Education for Sustainability (EfS) (UNEP 2012). The concept of education for sustainability, gathered under the umbrella of the United Nations, is followed faithfully by the Seychelles government, and the necessity of environmental education and awareness programs for national development and sustainability is emphasized in official declarations (SSDS 2012-2020, SNWP 2018-2023). At the same time, another point emphasized is that this situation,

resulting from systematic and infrastructural deficiencies such as availability of environmental goods and services (opportunities for recycling, equipment related to renewable energy) within the country, creates challenging conditions for environmental educators because of the core reason that it also intersects with almost every other sector in society. Moreover, this commitment is intrinsically tied to our acknowledgment that, as a small island state, the emphasis on environmental sustainability stands as a cornerstone for national development (UNEP 2012). To raise the environmental consciousness of different groups of society, they initiate social educational programs at schools such as organic garden building. Another one is holiday camps. This aims to bring together children from different schools, fostering a shared interest in engaging and educational activities. It aims to provide sensory engagement opportunities to explore the environment using all five senses. One of the aims of the program is to provide children with the time and environment to learn by doing and to encourage them to actively participate in hands-on discovery and research, which is important in developing active environmental management. Next important point that stands out is that it offers experiential learning opportunities that enable children to make connections in the real world and apply what they have learned through experiential learning about the environment and the world surrounding them in a way that promotes a good relationship with it.

Last but not least, it is necessary to mention the eco-school program as an important step in environmental education. “In times when the environment's throwing us curveballs, eco-schools have become this awesome ray of hope. They're all about teaching kids to love the planet and do practical stuff to make our future more eco-friendly.” (Ducret, 11.05.2023, interview). Eco-school, a global initiative that originated in the late 1990s, focuses on embedding environmental consciousness within the education system and equipping students with the knowledge, skills, and motivation to become stewards of the planet. The eco-school programs are designed to transform educational institutions into sustainability hubs, seamlessly integrating environmental awareness into curricula and campus practices. This holistic approach covers various environmental issues, fostering a sense of responsibility and agency in students. Actively involving students through eco-committees empowers them to contribute ideas and participate in decision-making processes, developing leadership and teamwork skills. The program extends its impact beyond schools, engaging parents, local authorities, and the community. By fostering shared responsibility, eco-schools break down barriers between educational institutions and their surroundings. The multi-faceted benefits

include nurturing environmentally conscious citizens, contributing to critical thinking skills, and preparing individuals to address diverse challenges.

In the archipelago of the Seychelles, the eco-school programs, spearheaded by the Ministry of Education and the Ministry of Agriculture, Climate Change, and Environment, have emerged for sustainability, guiding Seychellois youth toward a future of ecological responsibility. Firstly, the eco-school program started in 1994 with the mission of conservation and education, but sustainability development was added to the agenda over the years. In total, 35 schools have participated in eco-schools across four islands, which are La Digue, Praslin, Mahé and Silhouette Island (Raguain and Burt, 2019). The program adopts a holistic approach, integrating environmental education into the curriculum to instill conservation values early on by weaving these concepts into subjects like science, geography, and even the arts. While emphasizing the interconnectedness between humans and the environment, the initiative covers diverse topics like marine conservation and renewable energy. The Ministry's dedication to sustainable education is a testament to the Seychelles' commitment to a greener future. By cultivating eco-conscious leaders, the program contributes to the nation's long-term vision of harmonizing progress with environmental preservation. As emphasized by an activist from Seychelles who was actively involved in the eco-school work, “As Seychellois students step up as the heroes of taking care of our environment, their adventure goes way beyond the classroom. They're making a cool difference in the special ecosystems of the islands and adding their bit to the worldwide push for a greener planet. The thing is, with eco-schools, we get to shape a bunch of kids who not only get why it's crucial to save our home but also have the smarts and guts to actually do something about it.” (Capricieuse, 19.05.2023, interview). Some contributory partners of this eco-school practice are the Wildlife Club of Seychelles (WCS), a non-government organization that has school-based environment clubs in all 34 eco-schools in Seychelles, produces and donates learning support materials, facilitates environmental learning, and sponsor projects. Sustainability for Seychelles(S4S), a non-government organization, facilitates workshops for in-service teachers, produces learning support materials, sponsors projects, and provides technical support for projects. In addition to these, The Ocean Project Seychelles (TOP), Global Vision International (GVI), Save Our Seas Foundation, Seychelles Island Foundation etc. are involved in unifying cooperation with ME and MACCE.

The Aldabra Cleaning Trip, carried out within the scope of Eco-School, can be considered work supporting environmental education. Aldabra is located in the Indian Ocean;

Aldabra Atoll, a UNESCO World Heritage Site, is an example of a raised coral atoll. Due to its remoteness and inaccessibility, the Atoll has remained largely untouched by humans and is highly protected today. Aldabra is one of the largest atolls in the world and is home to a number of endemic and wonderful species. “The world’s largest tortoise population roams the atoll and the beaches along the vast coastline host one of the largest populations of endangered green turtles in the Western Indian Ocean and the mass garbage flow coming from international waters. It is estimated that at least 14 million tons of plastic end up in the Ocean every year stuck in the small island states like the Seychelles that acts as nets where vast quantities of plastic pollution are captured”. (Raguain and Burt, 2019). To prevent these rising garbage dumps in the atoll which is threatening the lives of many creatures and humans, the Seychelles Islands Foundation (SIF) has joined forces with the Ministry of Education, and after that with a co-partnership of the MACCE. This collaboration has been manifested through the Seychelles' eco-school program, which aims to motivate students to comprehend and engage in environmental preservation and sustainability. The initiative entails schools participating in diverse environmental undertakings and contests in the frame of their curriculum activities that accrue points for each school over the course of the year, with the schools amassing the highest points being awarded the coveted grand prize – an all-inclusive, week-long educational excursion to Aldabra. This opportunity, fully sponsored by SIF, serves as a compelling incentive for schools to actively participate and contribute to the program's environmental goals. The mission is to “ensure future generations will continue traditional conservation of this exceptional place” (Raguain and Burt, 2019).

The first Aldabra excursion occurred in 2000, commending the winners of the 1999 competition. Since then, there have been a total of 15 trips, facilitating 194 schoolchildren and 41 school teachers in visiting Aldabra. A volunteer leader in the 2019 Aldabra trip and member of Fresh Focus organization interprets that “they continue to act as ambassadors for the preservation of this remarkable place” (Capricieuse, 19.05.2023, interview). To show the reason why Aldabra is chosen location for such eco-friendly outdoor activity, the analysis from 2019 can help. As a result of the project data carried out by a team of 12 people, student and volunteer project leaders, with a deep commitment to environmental protection in Aldabra Atoll Beach Clean-up 2019, over 500 tons of garbage (83% fishing related, 7% shoes, 4% parts and the remaining packaging, consumer products, and other types of garbage) were collected. The project serves as a poignant reminder of the global challenge of marine pollution and the urgency of preserving ecologically valuable areas (Raguain and Burt 2019).

From my point of view, by shedding light on the extent of debris accumulation in a remote and pristine location like Aldabra Atoll, the project underscores the need for concerted international efforts to reduce plastic waste, promote sustainable practices, and protect the world's most fragile and essential ecosystems. Also, it is undeniable that it is a great investment for youth. It is recorded that 70% of children returned home with a greater understanding of nature, conservation and environmental management, while 76% agree that the eco-school Aldabra trip had a significant positive impact on their lives. (Raguain and Burt 2019). In the case of the Seychelles, the majority of responsibility is on the shoulders of NGOs, which is why, basically it is stated by Alven Lawen "we face numerous barriers, including economic and, to a lesser extent, policy barriers, although we have passion and a strong drive to make a difference. It feels like, unfortunately, we lack political will, political authority, and government support." (12.08.2023, interview).

4.2. Educating for Change: Environmental NGOs in the Seychelles

The most noteworthy aspect of my ethnographic exploration in the Seychelles is the role played by environmental non-governmental organizations (NGOs) in addressing the ecological challenges faced by the nation. These NGOs, driven by individuals and supported by local and international communities, are at the forefront of environmental conservation efforts in the Seychelles. After participant observation, interviews with prepared semi-structured interview questions, and engagement with the conservation activities, I gained valuable insights into their mission, impact, and the challenges they encounter. During the fieldwork, I made sure to be in contact with as many international organizations as possible. In this study, my objective is to explore the application areas of local NGOs in enhancing the Seychellois attitude and perspective towards nature, specifically focusing on their sensitivity to the environment. I aim to investigate the struggles faced by these NGOs in instilling environmental education, considering the existing conditions and opportunities. The ethnographic focus of this study is The Ocean Project, and I will delve into the organization to understand how it addresses environmental issues in the region. Key questions include the strategies employed by the organization in combating environmental problems, the approaches taken in educational activities, and the challenges encountered in their initiatives. Meanwhile, other local and international NGOs also contribute to the research, namely the organization of Parley Seychelles; Save Our Seas and SeyNoPlastic.

According to my observation, on the island of Mahé, active observation-based education programs carried out outside the course curriculum, that is, informally, in touch with nature, are common. Most education practices by the state are predominantly conducted with the copartnering of NGOs working on environmental sustainability, such as Wildlife Club, Nature Seychelles, and The Ocean Project Seychelles (TOP). However, I can say that such experiential awareness programs have problems in terms of frequency and regularity due to the dependency of funds on the projects. Advocated also by sustainability environment consultant at The Ocean Project Seychelles, Victoria Alis, who is a marine biologist, “since around 2010, numerous NGOs have depended on grant money, often from private or international donors, to sustain themselves and launch projects. These grants, categorized as small, medium, and large, come with limited funding. Despite the maximum duration being two years – a relatively short time frame – financial constraints restrict the organizations from planning too far into the future” (18.05.2023, interview). Before discussing the central organization of my ethnographic fieldwork, I will briefly give information about other NGOs within the scope of my research and the information I have collected.

First of all, the D'Arros Research Centre (DRC) has been in operation since 2004 and has been under the management of the Save Our Seas Foundation (SOSF) since 2012. SOSF primarily directs its financial support towards research initiatives aimed at the preservation of marine species, especially sharks and rays, on a global scale. With a global reach, the Save Our Seas Foundation has financially supported over 480 projects in 91 countries. Each of these endeavors is dedicated to advancing marine research, conservation, and education, aiming for deeper understanding and the development of innovative solutions. The foundation centers are in South Africa, the Seychelles, and the United States. The central objective of the DRC is to safeguard and present the ecological vitality of D'Arros and St. Joseph Atoll, located in the remote Outer Islands of the Seychelles. Initially founded with a primary focus on marine biology and the conservation of endangered or endemic species, the organization has expanded its mission due to the interconnected nature of environmental pollution, encompassing both marine and terrestrial waste. Recognizing the integral link between protecting animal species and addressing pollution, they actively implement waste reduction practices. Additionally, the organization places significant emphasis on organizing environmental workshops and camps, aiming to disseminate environmental knowledge and raise awareness effectively. The program director of the SOSF D'Arros Research Centre argues that “while plastic pollution is present in the Seychelles, the country maintains a relatively clean environment in most public spaces

compared to other nations. Littering occurs but is not as prevalent as in other countries within the Indian Ocean region. The small population size, limited land, and insufficient infrastructure result in a waste management approach that primarily involves burning waste. Mahé, the main island, has multiple large landfills for non-burnable waste. The outer islands, to some extent, manage such waste locally but often transport items like electronics, batteries, and FADs back to Mahé for proper disposal (Anonymous, Program Director, Questionnaire, 30.05.2023). The response from an organization specializing in comprehensive studies on marine ecosystems heightened my curiosity about diverse viewpoints. During my fieldwork in the Seychelles, I observed a limited discussion on plastic pollution in other African states. Through my research, it became apparent that the Seychelles faced a distinctive challenge compared to other African nations grappling with environmental pollution—specifically, the inadequacy of infrastructure capacity and strategy. Essentially, it is emphasized by a research officer who is a Seychellois and has been working in the DRC for years that the waste management system in the Seychelles needs improvement, particularly in terms of better waste collection and transportation to dumping sites. “The presence of litter in the areas thriving with tourists is often caused by inadequate bin emptying. Those places have a few bins that don’t get emptied often enough, causing stray people to throw them over, allowing plastic to enter the environment. Trucks carrying waste have metal doors to secure all waste inside. Certain trucks do not close this and plastic still ends up going into the environment” (anonymous, Questionnaire, 30.05.2023). In summary, despite Save Our Seas’ projects primary focus on marine ecology rather than climate change or plastic pollution, the organization actively engages in practical efforts to protect nature. This includes conducting weekly beach cleanup events with a dedicated team of four people, adjusting plans based on prevailing conditions, logistical considerations, and the required manpower. It is stated like “We have included weekly beach clean-ups on D’Arros in our schedule as the amount of waste that washes ashore is manageable if regularly picked up. Some efforts have been made in St Joseph atoll on small islands but a full clean up there requires a lot more logistics, resources, and manpower” (anonymous, Program Director, Questionnaire 30.05.2023). “Besides beach cleaning, as an educational practice, we have organized an educational camp for the secondary school children aged 10-14. However; education camps are mainly on marine ecology. Pollution and climate change are a very small part of that” (anonymous, Program Director, Questionnaire 30.05.2023).

The next influential organization in the Seychelles environmental landscape is Parley. It is an international organization headquartered in New York, and it has representatives in more

than 30 countries (e.g., Brazil, Mexico, Chile, Argentina, South Africa, Hawaii, Sri Lanka, the Caribbean, Australia, etc.). During my research period, I conducted a digital interview with Alvania Lawen. She is from the Seychelles and is a county coordinator in Parley for the Ocean. Parley's mission is rooted in the belief that the oceans are the lifeblood of the planet, playing a critical role in regulating climate and sustaining life as it is stated by Lawen that “Parley’s aim is to bring together leaders, thinkers, young people and creators together to find a solution to the marine plastic problem” (12.08.2023, interview). Parley was founded by Cyrill Gutsch in 2012, Parley strives to raise awareness about the dire state of our oceans, inspire creative solutions, and foster collaborations with individuals and organizations worldwide. Parley operates under three core missions, summarized as Parley AIR (Avoid, Intercept, Redesign). The first mission is ‘avoid’, focusing on awareness-raising activities to enlighten people about the detrimental impact of plastic. The second mission is ‘intercept’, involving beach cleanups as a way to address marine pollution. Through these efforts, plastic and other debris from natural environments are aimed at being removed as much as it can be done, emphasizing the organization’s commitment to marine conservation. The final mission is ‘redesign’, encompassing the transformation of mindsets and products. Parley international collaborates with manufacturing companies to transform collected plastic into new products. Examples include Adidas shoes, Dior merchandise, sunglasses, and even American Express credit cards. This innovative approach not only addresses environmental concerns but also promotes sustainability through the creation of new, usable objects from discarded waste on a global scale. Lawren (12.08.2023, interview) outlines key principles guiding efforts to mitigate environmental damage and promote sustainable practices. According to what Lawren remarks, one primary focus is on “highlighting the ocean's beauty, emphasizing its fragility, and offering alternatives to plastic usage through community-based tasks, such as workshops” (12.08.2023, interview). This approach aims to cultivate eco-friendly behaviors, including responsible consumption habits and the reduction of plastic pollutants. In addition, she emphasizes an interceptive approach to address the escalating risk of environmental pollution. This involves “engaging in educational initiatives, including training sessions in schools and workplaces” (Lawren, 12.08.2023, interview). These efforts are designed to catalyze a shift in perspectives, fostering a commitment to a more sustainable environment. A critical point is that the first two principles are applicable to the case of the Seychelles, but the process of recycling merging with the process of transformation and the redesigning process cannot be implemented by Parley Seychelles due to the constraints on the foundation's ability to fulfill its third mission of reproduction. This mission's execution is contingent upon the conditions and eligibility of

Parley Seychelles, which are currently “limited by the foundation's inadequate financial capacity” (Lawren, 12.08.2023, interview).

Parley Seychelles sees its jurisdiction as encompassing beaches, coasts, and coral reefs. In the Seychelles, the NGO began its journey as a response to the escalating plastic pollution issue, drawing attention to the fragile marine ecosystems that surround the islands. Parley's presence in the Seychelles evolved through partnerships with local environmental organizations, government agencies, and individuals dedicated to preserving the country's natural wonders. Parley Seychelles has taken building trust within the community as an essential instrument of the organization. They engaged in collaborative efforts with Seychellois artists, scientists, educators, and government officials to create a platform that resonated with the local population. Parley's educational initiatives have been a cornerstone of their work in the Seychelles as stated by Lawren: “in the Seychelles we focus mainly on educational talks and beach cleanups because of the lack of capacity for recycling, redesigning, and shipment of waste” (12.08.2023, interview). The island's limited recycling facilities are attributed to the high costs involved and its geographical remoteness from the main continents, making it a common situation in small island developing states. Currently, Seychelles only has recycling capacity for PET plastics, such as bottles. However, the PET recycling process is not conducted through a collaboration with Parley, an organization with the capability to engage in more extensive recycling initiatives. “We are not yet able to operate Parley at full capacity because, even though Parley possesses the capability to do so, we still require funding to support its initiatives in Seychelles. As an organization, Parley Seychelles needs financial resources for any recycling activities, but currently, Seychelles lacks the necessary funding to support these endeavors. Therefore, any initiatives that Parley wishes to undertake in the Seychelles would necessitate us seeking funding locally...While diplomatic avenues are being sought for support in addressing the environmental challenges facing the country, it should also be the government's responsibility to secure international funding opportunities” (Lawren, 12.08.2023, interview). While Parley has the potential to enhance recycling efforts, the key obstacle remains funding. The call for the government to secure international funding opportunities raises questions about the continued reliance on external sources for financial support as discussed in the literature. Post-colonial perspectives may scrutinize the extent to which the Seychelles, despite gaining independence, remains entangled in the global economic structures that shape its environmental policies. It could prompt reflections on the agency of post-colonial nations in navigating international financial systems and negotiating equitable partnerships.

In the realm of environmental education initiatives, Parley collaborates with schools and educational institutions to create curricula and programs that promote awareness of ocean conservation. Students are educated about the impact of plastic pollution and the significance of preserving marine life through workshops, field trips, and interactive sessions. Collaborations with local artists and artisans result in artworks showcasing the Seychelles' marine life and the threats it faces. Showcases and wall art works in public spaces serve as potent reminders of the alarming situation of the mitigation effort on the environment. Parley consistently organizes beach clean-up events that involve local communities, tourists, and volunteers. These events not only remove tons of plastic waste from beaches but also provide opportunities for education and dialogue about the environmental consequences of plastic pollution. Furthermore, Parley has established partnerships with Seychellois businesses and tourism companies to implement sustainable practices, including the reduction of single-use plastics and the promotion of responsible tourism. These collaborations contribute not only to conservation efforts but also to economic sustainability in the Seychelles. Parley's journey in the Seychelles showcases the power of collaboration, education, and art in generating awareness and action for environmental conservation. Through multifaceted initiatives, the organization has created a ripple effect in the local community, inspiring individuals and organizations to take responsibility for the protection of the Seychelles' invaluable marine ecosystems. As the organization continues to evolve and address environmental challenges, its work in the Seychelles remains a testament to the potential for positive change through creative, community-driven approaches to conservation. In addition to waste interception, each cleanup event serves as an opportunity for education and motivation. Parley Seychelles actively involves young people in both the planning and implementation of cleanup missions. Parley “targets everyone and does not solely focus on children. However, we recognize the need for increased education efforts directed towards older individuals, as changing their mindset is challenging. Despite acknowledging the difficulty of changing some people's views, we remain committed to the organization's mission” (Lawren, 12.08.2023, interview).

Another local organization working on plastic pollution and environmental awareness is Seynoplasic. Irene Ducret, social media manager of Seynoplasic, shared the origin of its name, revealing it to be a clever play on words. The name is pronounced both as the shortened version of Seychelles, "Sey," and as "Say," conveying the message "Say no to plastic.” This creative decision stemmed from the conviction that the name is distinctly Seychellois, embodying a purposeful call to action against plastic usage. The genesis of Seynoplasic traces

back to the collaboration between Yes Consulting and the French Institute of Research for Development (IRD) on "The Future of Plastic Waste," a project supported by the Seychelles Government and endorsed by the Indian Ocean Commission. This initiative has resulted in three small-scale projects focusing on awareness, plastic collection, and transformation. Additionally, Yes Consulting spearheaded SeyNoPlastic, a project for raising awareness, educating and disseminating scientific knowledge on the pre- and post-consumer life cycle of plastics. SeyNoPlastic was funded by the French Ministry of Foreign and European Affairs through a solidarity fund for innovative projects. In 2023, Yes Consulting is overseeing an IRD project on coral reef education, directly linked to ocean plastic waste. Moreover, a proposal for a plastic awareness project has been submitted to SEYCCAT, where Yes Consulting will serve as a partner for communication targeting the general public, educational institutions, and corporate entities.

Seynoplasic, which started as a project, has continued to work for social awareness since 2020, albeit on a small scale, even after the funding support ended. Calling it a social organization wouldn't be entirely accurate as its activities are primarily focused on minimal social and media initiatives before transitioning into the organizational phase. However, the rationale behind referring to Synoplasic as an NGO lies in its significant support from international funds and organizations. This support underscores its broader scope and impact, aligning with the characteristics typically associated with non-governmental organizations. In a one-on-one interview, Ducret, who is from Holland and has been living in Mahé for years, made her career in the media marketing sector and inside the organization she works as a social media manager. Her job responsibilities include creating media promotional videos (e.g. SPC News-television) and advertising campaigns, primarily on social media channels, to instill conscious and sensitive attitudes and behaviors in the local community, as well as among seasonal visitors. The focus is on promoting responsible practices regarding the use of plastic, its proper disposal into nature, and the recyclability of waste. She expresses her ongoing efforts to secure funding aid, emphasizing Seynoplasic's unwavering determination and future vision for a broader spectrum of activities. In nutshell, when reviewing past environmental awareness initiatives, it becomes evident that the efforts primarily revolved around the use of visual media tools and collaborative participation in local activities organized by NGOs, such as beach cleanups. However, the lack of financial grants halted the continuity of the project work. "The Future of Plastic Waste project includes an initiative aimed at educating Seychellois individuals on plastic transformation and how to establish a profitable business in this domain.

Currently, this project is actively seeking additional funds and the acquisition of land to facilitate the purchase and deployment of the necessary machines for its implementation” (anonymous, project director, 11.05.2023, interview). The funds for the Future of Plastic Waste Seychelles (TFOPW) came from Monaco Explorations, as this project was linked to the IRD project DIDEM, which uses science-based information for sensitization of the government and the general public seeking adoption of sustainable practices by learning facts about plastics, the production-related emissions, related health risks for consumers and when dumped or landfilled. The project director (anonymous) of Seynoplasic is from France, and her professional journey centers around sustainability and the circular economy, particularly specializing in solutions for plastic waste. Residing in Seychelles since 2006, she has established herself as a prominent figure conducting field studies and related research, gathering insights on small island states with unique cultural and socio-economic characteristics. She founded a consulting company that operates in the corporate sector, leveraging her expertise from scientific studies to advance knowledge in the realms of the circular economy and diverse technologies for plastic transformation, including recycling. She has collaborated with several environmental organizations, focusing on plastic reduction initiatives in hotels and student education and with young and dedicated Seychellois individuals working with NGOs such as The Ocean Project (TOP), Sustainability for Seychelles (S4S), and other associations within the tourism sector, such as the Seychelles Hospitality and Tourism Association (SHTA) and the Seychelles Sustainable Tourism Foundation (SSTF). “These associations and NGOs are regularly running projects on national scale and funded by UNDP, UNEP or GEF etc.” (anonymous, 11.05.2023, interview). Regarding the question of whether the sponsored projects led by international NGOs align with the needs and lifestyles of local people, the project director strongly disagreed with the perspective shared by many scholars agreeing with the necessity of culturally adaptive principles. She expresses a divergence in views, emphasizing his own observations and beliefs regarding the implementation of activities within the organization she oversees with the following words: “The projects for awareness building and education run by NGOs are designed locally for cultural adaptation, and financing organizations know well the value of locally designed campaigns led by specialized NGOs with track records on their work” (anonymous, 11.05.2023, interview). I believe that there are independent institutions and organizations built with a sustainable environmental consciousness that do not seek profit by modifying the environment. These entities have principles far from the ideology of exploitation, utilizing their power not for gaining superiority, dominance, or ruling but to address climate and environmental problems that are escalating daily. Most importantly, they leverage

organizational dynamics as a unifying element. However, the extent to which methods and strategies aimed at different social and cultural structures can be adapted to that group and yield the right results will always be a matter of debate. Because social dynamics vary, it is crucial, through long-term studies, to select methods that can be most integrated into society. This ensures that permanent solutions, aligned with society's perception, learning styles, and way of life, can be obtained in the long term.

Another aspect she emphasizes regarding waste management in the Seychelles revolves around the costs associated with recycling and exporting. She personally has a resource proposal to raise awareness among members of the Seychelles Chamber of Commerce and Industry about the concept of extended producer responsibility (EPR), which is presently under discussion in Parliament. Her point is to lead “the government to recognize the importance of making the disposal of recyclable waste in landfills. the cost for a private company to convert or prepare this recyclable waste for export is more expensive than recovery of products in the state” (anonymous, 11.05.2023, interview). By doing so, the aim is to create a financial incentive for businesses to prioritize more sustainable waste management practices, such as recycling and exporting, over the traditional method of landfill disposal. This approach aligns with the concept of extended producer responsibility (EPR) and aims to promote environmentally friendly alternatives by making them more economically attractive.

Education is seen as a required element to contribute to lasting conscious habits towards the environment, as demonstrated by the project director, who advocates that “there has been a lot of sensitizations in this regard, and Seychellois who are educated on the topic are aware. However, the majority still perceive the issue as if it will be solved one day, without considering the long-term harm each discarded plastic item does once it ends up in nature or a landfill” (anonymous, 11.05.2023, interview). In parallel, “we have certain people who are still very blunt about waste. They don't see the beauty so much. They hear that we have a beautiful country from others, but we're going around their house. It's a mess... In this big group, there are people at the bottom, many dealing with addiction, and they don't seem to care much. Changing these people might be tough. They're open to some things but not so much to others. That's why it's really important to make sure everyone, including tourists, understands and cares about these issues.” (Irene Ducret, 11.05.2023, interview). As a problem-solving proposal, she argues, “awareness campaigns need to be inclusive and run for at least a whole year, utilizing differentiated tools such as media campaigns, school and district education, advertisements, and a strong message from the President addressing the constituents.” (anonymous, 11.05.2023,

interview). Basically, this underlines that a comprehensive and sustained approach involving various communication channels and authoritative figures is essential to effectively permeate societal consciousness and drive meaningful change in environmental attitudes and behaviors. Ducret shares the same perspective on the lack of enforcement in environmental conservation by state actors. As a final point stressed environmental inequalities, it is stated that “Looking at human evolution, humans can best manage extreme challenges when they experience catastrophes. Given that major decisions are made by rich industrialized countries, we are not well positioned. Once the huge catastrophes are at our doorstep, we have no margin for remedy anymore. That's why a prescription, done by an elected commission like a multi-stakeholder and ego-transcendent entity for all nations, is crucial regarding the most stringent topics leading to drastic greenhouse gas reduction” (anonymous, 11.05.2023, interview).



Figure 1: National News about TFOPW <https://www.didem-project-en.org/blog/33/the-future-of-plastic-waste-program-reaches-out-to-seychelles-students> Accessed 12 November 2023

the three interlinked TFOPW projects but also shared their apprehensions about plastic pollution and discussed proactive measures to mitigate its impact.

Collaboration between non-state actors and between state and non-state actors is crucial for evaluating the impact of conservation strategies, particularly in small states. “It's crucial to work together because we are small and we know all together we are stronger. At times, these associations are more closely connected to the local population than our government agency. We aspire to collaborate with them and explore the possibility of supporting their initiatives through our budget. If they can apply for grants or other resources to develop their own waste management projects, we are eager to facilitate and encourage such endeavors” (Mondon,

In November 2022, Katrin Perchat, managing the Recycling Machine initiative, and Victoria Alis, overseeing Connect Collect, two key projects within the TFOPW (The Future of Plastics Waste Seychelles) program, addressed a class at the International School of Seychelles. The session involved an interactive discussion where students not only learned about

17.05.2023). In these contexts, effective coordination among in-country stakeholders is essential to achieving consistent and efficient outcomes in reducing human-induced environmental damage. After conducting interviews with various environmental organizations in the region, a distinct interrelationship among them has been observed. However, in contrast, the collaboration with state agencies appears to be less efficient. The Ministry believes that it should be informed about research-based results and observations taken place by local NGOs, asserting that addressing structural deficiencies is possible in this manner. However, organizations like the Ocean Project, among others, contend that” the approach should also be the other way around – initiatives and approaches need to originate from the government and be directed towards NGOs” (Alis, 18.05.2023, interview). The reasons for the inadequate efficiency of the state initiatives might be various, some of which I realized are: Firstly, extensive bureaucratic procedures within state agencies are known to impede decision-making processes, creating delays and hindering effective collaboration. Additionally, differing priorities among environmental organizations and state agencies can pose a challenge, as distinct objectives, timelines, or focus areas may complicate efforts to align seamlessly. Moreover, resource constraints within state agencies, such as limitations in budget, manpower, or other resources, can impact their capacity to engage effectively with external partners. These factors collectively contribute to the complexity of fostering collaborative efforts between environmental organizations and state agencies, necessitating a strategic approach to overcome these challenges. In this small and developing land, news of humanitarian attempts related to natural conservation spreads quickly, fostering a sense of familiarity among these organizations. Many individuals within these organizations know each other, and collaborative efforts between institutions seem well-coordinated, based on my observations. However, despite this collaborative spirit, there remains a noticeable lack of state incentives to strengthen the connection between NGOs and local communities. To exemplify the partnership between environmental NGOs and public entities, The University of Seychelles and the Wildlife Clubs of Seychelles signed a Memorandum of Understanding in September 2012 to establish the Unisey Centre for Environmental Education (UCEE). This collaboration aims to prevent project duplication, provide a foundation for effective cooperation, and make lab facilities available to Unisey students. The UCEE, located at the Anse Royale University campus, focuses on environmental education, discovery, investigation, and learning. It features ecosystems for field studies and serves as a visitors' center offering presentations, workshops, displays, and field trips. The UCEE, operated by the Wildlife Clubs of Seychelles and the Unisey Environmental Science Program, emphasizes environmental awareness and prepares students for

environmental challenges. Despite challenges in measuring behavior changes, the UCEE has been active in delivering conservation education programs since 2013, fostering partnerships, and promoting environmental stewardship.

It's essential to recognize that these NGOs in Seychelles face their own set of challenges. Limited resources, funding constraints, and the sheer scale of environmental issues demand a concerted effort from both local and international partners. Moreover, maintaining a delicate balance between environmental protection and the economic interests of a country heavily dependent on tourism is a persistent challenge for these organizations. While environmental NGOs in the Seychelles play a crucial role in conserving the country's natural wealth and instilling environmental responsibility among its inhabitants, they must navigate the intricate balance between economic interests and environmental protection. Striking this balance is especially challenging to avoid becoming subservient to the capitalist system and global powers. To achieve this, breaking away from foreign-dependent policies is essential, emphasizing the pursuit of educational and environmental policies unique to the Seychelles.

4.2.1. THE OCEAN PROJECT SEYCHELLES

As an ethnographic case, this paper delves into the environmental conservation shaped around the prominent organization, The Ocean Project Seychelles (TOP). The Ocean Project Seychelles (TOP) was co-founded in November 2016 by Zara Pardiwalla and Karine Rassool, in response to the urgent issue of marine plastic pollution in the Seychelles. Their mission centered on combating this environmental challenge through a triad of strategies: education, action, and research. In a concerted effort to safeguard the oceans and seas, TOP has progressively evolved to address this pressing concern. The underlying belief is that “Seychelles has a high awareness of environmental issues, although behaviorally there are a lot of things that we need to work on. So, we also work on behavioral change” (Mascarenhas, 18.05.2023, general manager, interview). At its inception, TOP initiated a series of educational programs, action-driven initiatives, and research endeavors. Before going into detail about organizations and organization initiatives, I will introduce the discussants of my research interview. Victoria Alis, a Franco-Seychellois sustainability consultant heading her own consultancy firm, formerly serving as the President/Chairperson at TOP during the time of an interview, currently holds the position of Project Manager at the Programme Development & Coordination Section of the Ministry of Agriculture Climate Change & Environment. Magali

Rocamora Solé, from France, has been the general coordinator at TOP since 2022 and Alice Mascarenhas, Portuguese, is a general manager of TOP.

Recognizing the gravity of plastic pollution, which is “a major concern for small island states where over 90% of goods are imported” (Alis, 18.05.2023, interview), the organization swiftly rallied communities, schools, NGOs, businesses, and hotels as well. Approximately 400-600 people participate in TOP’s beach cleanings (TOP,2019), in monthly coastal clean-up campaigns since April 2017. These endeavors drew an average of 30-50 participants per event, not only contributing to a cleaner environment but also instigating shifts in consumer behavior through educational components. “By combining education and action on the issue, TOP aims to spark positive changes in consumer habits and promote anti-littering behavior” (TOP,2019). The cornerstone of TOP's initiatives has been its monthly coastal clean-up activities, which began in April 2017. By engaging an array of participants from various sectors, including community groups, non-governmental organizations, schools, and businesses, these clean-ups have consistently gathered momentum. According to TOP recordings in 2019, on 14 islands more than 60 beach clean-ups was carried out, resulted in over 12 tons of waste was collect throughout the year (2019). Combining the cleansing of coastal areas with educational activities and family-friendly events, the clean-ups embody the organization's philosophy of integrating education and action to drive behavioral change. That’s why they call out ‘#StopandSwitch’ as their slogan, representing their goals of education to instill constant habits towards nature in favor of a sustainable future. TOP emphasize that stopping the wrong actions and switching to positive behaviors are two key pillars of protecting nature and securing a better tomorrow.

A core emphasis is placed on engaging people of all ages and ensuring local community participation to foster diversity, inclusivity, and a sense of community ownership. These clean-up activities are designed to be brief, lasting approximately two hours, and are structured to be both educational and enjoyable. They provide participants with practical experience in addressing the issue of marine debris and also offer deeper insights into the importance of individual actions in combating the prevailing "throw-away" culture of contemporary society. In addition to their educational aspect, these clean-ups contribute to preserving the Seychelles' pristine image as a tourist destination by removing unsightly debris from its beaches and waterways. One noteworthy feature of these clean-up efforts is their commitment to data collection. By promoting citizen science, participants are actively involved in categorizing and documenting the debris they collect. This collected data serves as a valuable resource, informing other TOP projects and supporting the broader effort to address marine debris issues,

which researches possible origin of the materials, rates of accumulation of plastic debris and so forth. (TOP,2022) and has gained increasing global attention. Furthermore, this data has been shared with organizations such as the Department of Environment and the Land Waste Management Agency (LWMA) in response to the growing importance of tackling marine debris on a global scale because “it is important for Seychelles to consolidate its knowledge base by developing formal systems for collecting and maintaining data to support informed decision-making and adaptive management related to climate change adaptation and mitigation targets” (Republic of Seychelles, 2021) to shed the national and international perception of “Seychelles as a victim of climate change.” (Alis, 18.05.2023, interview).

To eliminate market tendencies related to the production and consumer habits of using plastic materials, TOP has undertaken significant initiatives along with state regulations. Among the campaigns that yielded efficient results is the ‘Last Straw Seychelles’ aimed at discouraging the use of a high-risk item for the environment. This object poses significant threats as it can be easily carried by the wind to other locations due to its lightweight nature and susceptibility to breaking into pieces under varying climate conditions. Such fragments could lead to detrimental problems for all living creatures, with humans at the top of the pyramid. Complementing clean-up efforts, TOP launched the ‘LastStrawSey’ campaign in July 2018. This initiative, supported by the GEF Small Grants Program, sought to curb plastic straw usage by encouraging individuals to commit to stopping their use and by urging venues to cease their distribution. In addition to the posters and many visual resources created to raise awareness during the ‘LastStrawSey’ campaign, they have also called on other businesses in Seychelles to change their attitudes and behaviors on this issue which means that hotels, restaurants, cafes, etc. can become part of the organization by committing to stop serving plastic straws when they become a member venue of the LastStrawSey campaign. As numerical evidence, around 20 businesses joined the campaign. (TOP,2019) The campaign's success lies in its capacity to not only reduce plastic straw consumption but also to catalyze broader conversations about plastic waste. According to Alis (18.05.2023, interview), "One key lesson is the importance of evidence-based decision-making and researching alternatives before implementing bans." Alis criticizes state regulations on stopping the usage of plastic straws, still in everywhere after the ban, emphasizing that implementing laws, policies, and regulations for a circular economy might not be the most effective way to reduce waste unless there is a better replaceable option for customers. Moreover, the affordability of alternative products plays a crucial role. On the other hand, Mondon stresses that “The cost of purchasing these alternatives is often quite high.

If someone cannot afford it, they will obviously go with whatever option is cheaper. But it's really difficult because there aren't so many choices. This is a natural way of the population's behavior."(17.05,2023, interview). The state has instituted regulations against the use of plastic products by both sellers and consumers. However, the effectiveness of these regulations comes into question: is the state able to enforce and control these regulations? Does it possess the authority to impose sanctions on those who do not comply with the imposed restrictions? According to observations and what is said "the other issue is the enforcement limitation. Like any law, if you talk to some lawyers, they'll say, yeah, that's definitely illegal. But in order to capture somebody, identify who did it and how that is reported and then penalized them in a legal framework, it is very complex. So, when we're cleaning up beaches and there's rubbish left from picnics or whatever, there's no mechanism to penalize people" (Mascarenhas, 18.05.2023, interview). It demonstrates that the government lacks a systematic deterrence policy and behavioral change needs to be targeted. Alice Mascarenhas also expresses common concern about exemptions in the plastic bag ban and the use of biodegradable bags, citing their unsuitability for the Seychelles' infrastructure and potential harm to the oceans. This situation urges the government to reconsider its approach based on lessons learned from the plastic bag ban. To address this issue, it is imperative to allocate appropriate and sufficient resources and create an environment conducive to the enforcement of these sanctions, as advocated as "I think there should have been more involvement of the Ministry of Government before the ban to try and really push the message (Alis, 18.05.2023, interview).

Another campaign for reducing the harm of plastic items to nature is SeyNoToBalloons campaign at the beginning of the year of foundation, 2016. Like other prohibitions on plastic bags and straws, this campaign seeks to raise awareness about the detrimental impact of balloons on the environment and promote eco-friendly alternatives, ultimately aiming to eliminate the use of balloons in the Seychelles. Balloons, linked with celebrations, pose a major threat to marine life, particularly turtles and seabirds, often mistaken for prey. Research indicates that ingestion of soft plastics like balloons increases the risk of mortality due to blockages and starvation. Despite being marketed as biodegradable, latex balloons can take years to decompose, posing ongoing environmental risks. In the Seychelles, despite the scenic beaches, there's a widespread use of balloons, with a troubling trend of leaving them as litter after celebrations. The campaign advocates for alternatives such as paper lanterns, kites, and bunting, aligning with the global movement to ban or restrict balloon use. The Ocean Project seeks support from businesses and venues to endorse the campaign, furthering its mission to

protect Seychelles' fragile ecosystems and biodiversity. Additionally, TOP engaged in developing educational exhibits for various locations and crafting content for their social media channels to promote awareness of the issue. At the end, in a brief timeframe, the petition garnered more than 1,000 signatures, resulting in a meeting between TOP and the Ministry of Agriculture, Climate Change, and Environment to deliberate on future actions. Ultimately, MACCE declared a prohibition on plastic balloons. (TOP,2019)

The new campaign, 'Refill Seychelles', is a crucial step in The Ocean Project's ongoing efforts to combat the use of single-use plastic bottles. In response to feedback from the community, which expressed concerns about the quality of tap water, especially desalination water, the campaign aims to address the pressing issue of excessive plastic bottle production. While access to safe and clean drinking water is a fundamental human right, the campaign acknowledges the need for the exact purpose of immediate action to reduce the environmental impact of plastic bottles. RefillSeychelles collaborate with various organizations and businesses to transform the way water is purchased and sold, thereby mitigating the production of plastic bottles and its detrimental consequences, including greenhouse gas emissions and ocean pollution. In addition to the practices to prevent single use plastic bottles, the "Little Splash X TOP" reusable bottle is a remarkable initiative designed to champion sustainability and support The Ocean Project's vital mission of keeping plastic out of the oceans. With each purchase of this eco-friendly bottle, Little Splash generously contributes a portion of the profits directly to TOP's projects aimed at combating ocean plastic pollution. "For just SR500 (appx. 5,60€), not only you acquire a durable and stylish alternative to disposable plastic bottles for yourself, but you also become a part of the solution" (Mascarenhas, 18.05.2023, interview). Over the years, the proliferation of single-use plastic bottles has witnessed a notable surge, primarily driven by concerns over the trustworthiness of tap water. As people increasingly question the quality and safety of their municipal water supplies, they have turned to the convenience of bottled water as a perceived alternative. This trend reflects a growing apprehension about contaminants and pollutants in tap water, leading consumers to opt for the seemingly portable and disposable packaging of plastic bottles. However, this surge in plastic bottle consumption has come at a significant environmental cost, exacerbating the global plastic pollution crisis and necessitating a reevaluation of sustainable water access solutions to reduce the dependence on this harmful and unsustainable convenience.

In the Seychelles, the story of increasing single-use plastic bottle consumption mirrors the global trend, as concerns about the reliability of tap water have fueled the rise in plastic

bottle usage. Seychelles has become a popular tourist destination, and “visitors, often unsure about the safety of local tap water, have contributed to the demand for bottled water” (Ducret, 11.05.202, interview). This surge in plastic bottle consumption has presented a unique challenge for Seychelles, a nation acutely aware of its vulnerability to climate change and committed to protecting its stunning ecosystems. Consequently, the Seychelles has been working diligently to address this issue by implementing plastic-reduction initiatives, promoting reusable alternatives, and striving to strike a balance between providing clean, safe drinking water and preserving its pristine environment. But concerns remain about the adequacy and sustainability of this situation. During my fieldwork, I observed that drinking tap water was neither recommended by the locals nor preferred by the tourists. My research results, coupled with the insights from locals, made it clear that the municipal water supplies lacked the required cleanliness standards. Consequently, upon realizing the extent of plastic bottle usage per day, I calculated the potential consumption per person if individuals opted to meet their water needs solely through plastic bottles, neglecting the practice of refilling and reusing. The resulting figures were remarkably high. This became a challenge for me over time, as the consistent preparation of potable water by boiling and cooling was not always feasible. Consequently, I eventually resorted to the convenience of purchasing plastic bottles from the supermarket. The fact is that the Seychelles faces a distinctive set of challenges in providing a reliable supply of drinkable water to its relatively modest population. One of the foremost obstacles lies in the nation's limited freshwater resources. Unlike some other regions, the Seychelles lacks substantial rivers and lakes, relying predominantly on rainfall as its primary source of freshwater. This rainfall is collected in natural reservoirs, including underground aquifers and freshwater lenses, creating a finite supply that is vulnerable to variations in precipitation patterns. Adding to these concerns is the Seychelles' heightened susceptibility to climate change, with rising sea levels and shifting weather patterns threatening freshwater accessibility. Moreover, the rapid growth of both the population and the tourism industry places additional strain on the available water resources. The influx of tourists and residents drives up demand, raising concerns about over-extraction and depletion of these precious reserves. Infrastructure and distribution challenges are also a recurring issue, as the need to develop and maintain water supply systems across a multitude of scattered islands is both logistically complex and economically demanding. In response to these pressing issues, the Seychelles has to recognize the paramount importance of sustainable water management. Here the small note put forward by Victoria Alis (18.05.2023, interview): “A cap of 400,000 tourist arrivals has been suggested, though it appears that there has been no official decision, legally binding, to enforce this limit.

This lack of a concrete stance raises concerns, as it implies a potential risk that requires investigation. Reports have indicated that there is acknowledgement of this risk, but a genuine political will to establish such a cap seems absent. The tourism industry, contributing over 60% to the GDP, involves numerous stakeholders, making the implementation of a cap a complex challenge⁷. The focus of criticism lies in the apparent hesitation to take decisive action despite recognizing the need for it, particularly when the industry's significant economic contribution is at stake.

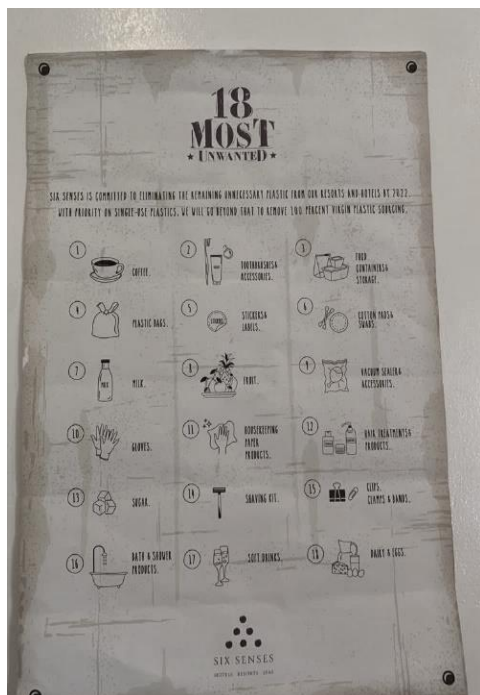


Figure 2: Poster showing Unwanted Materials in Six Senses Hostel (photograph taken by author)- May 20,2023

As an example of a tourism industry that might be a rare exception in fostering sustainable environmentalism, Six Senses Luxury Resort is present in over 19 countries spanning Asia, Europe, and Africa. Their sustainability initiatives are not merely token gestures but deeply ingrained in the very fabric of the resort's operations. One of their notable partnerships is with the United Nations Environment Programme. (UNEP), the Global Tourism Plastics Initiative UN World Tourism Organization, in collaboration with the United States Coalition on Sustainability and Sustain Chain which underscores their global commitment to environmental sustainability. The resort's core mission revolves around the idea of harmonious coexistence with nature. Lucie Bennett, the sustainability manager of Six Senses Resort Felicite believes that luxury and sustainability can go hand in hand, and their mentality is rooted in the

belief that responsible tourism is not only possible but essential for the preservation of our planet's natural wonders⁷. Six Senses Seychelles actively minimizes its environmental footprint through innovative measures such as renewable energy sources, waste reduction programs, and biodiversity conservation efforts, (some of which in reduction of unwanted materials are shown in Figure 2) Their guests are invited to be active participants in this mission, fostering an understanding and appreciation for the Seychelles' unique ecosystems. In essence, Six Senses Seychelles demonstrates a pioneering example in luxury hotel by leading the charge in

⁷ Informal conversation with Lucie Bennett, and fieldnotes May 8,2023.

sustainability practices. In other words, their dedication to environmental conservation, partnerships with organizations like UNEP, and their overarching mentality of responsible luxury set a remarkable example for the industry. The activities that demonstrate the hotel's commitment to the common principles of environmental sustainability, such as on-site organic farming, efforts to minimize waste and a special emphasis on recycling, the hotel is also supported by environmentally sensitive policies in the tourism sector with its water treatment facilities. As seen in Figure 3 and Figure 4, I had the privilege of sampling the purified drinking water at Six Senses facilities personally, following a comprehensive tour of the entire establishment, including recycling areas, glass bottle cleaning, and the water purification plant (depicted in the attached figures below).



Figure 3: Purifying Tap Water Technology at Six Senses Hostel (photograph taken by author-) - May 20, 2023



Figure 4: Refillable Glass Bottles at Six Senses Hostel (photograph taken by author-) - May 20, 2023

Launched in 2011, Plastic Free July, a global movement, has reached over 100 million participants across 190 countries to adopt lifestyle changes aimed at addressing plastic pollution. Six Senses Luxury Resorts aligns with this mission, emphasizing its core principles of sustainability, wellness, and curated experiences. Opting to stay at a Six Senses property automatically contributes to local environmental sustainability projects targeting the cleanup of plastic waste. Internally, Six Senses is steadfast in its commitment to liberating itself from plastic in day-to-day operations, actively seeking innovative solutions to minimize single-use and virgin plastics.

The establishment has set a goal to eliminate plastic from its hotel and spa operations by the conclusion of 2022. The journey towards sustainability at Six Senses commenced in 1995 with the introduction of refillable ceramic dispensers. Since then, the resort has implemented various initiatives such as establishing facilities for reusable glass bottling, eliminating plastic straws, and providing plastic-free amenities. Moreover, Six Senses has adopted several practices to enhance reusability, exemplified by the practices illustrated in the accompanying images (regeneration of soups, paper, lip balm, etc.) Apart from restrictions and remedial policies, such as banning plastic straws, the renewable potential of old or obsolete products, and access to clean, potable water, depends on high-investment technologies and capital. As argued by scholars like Anguelovski and Roberts (2011), the level of capacity and technological advancement plays a crucial role in the successful implementation of effective environmental practices. In this context, it can be emphasized that these factors are the primary determinants in establishing the capacity needed for the adoption of environmentally friendly principles by tourism initiators.

Returning to the environmental initiatives undertaken by the Ocean Project, prioritizing education by the Ocean Project is paramount. The acquisition of screening rights for ‘A Plastic Ocean’, aiming at raising awareness through film demonstration (TOP,2019) facilitated its incorporation into school curricula, expanding awareness among the younger generation. Numerous screenings have taken place. The initial screening occurred at Deepam Cinema, catering to school students. Subsequently, a private screening was organized for the educators from Montessori Children’s House. In addition, TOP arranged a screening for both teachers and students from the International School Seychelles. Furthermore, an open-to-the-public screening was conducted on Praslin at Deepam Cinema. The Plastic Arts project, in collaboration with the Meraki Foundation, harnessed the emotive power of art to convey the severity of plastic pollution. These installations, supported by the GEF Small Grants Program, fostered a profound impact, generating a sense of responsibility and action among the populace. In addition to that, TOP has already involved in educational projects at schools with developed art creations, especially #CaptainFanPlatic, will be mentioned later, is one prominent factor for TOP to make progress in creating art from plastic as an instrument for educating towards environmental consciousness. However, art production made of plastic waste was criticized by the LWMA, with the following statement: “At the end of the day, ultimately, it’s a burden for us because we have to manage it anyway. So, it is also good to consider it a source of plastic pollution”. (Lau Tee, 17.05.2023, interview). The targeting of different age groups is another

prominent feature of TOP. For example, the documentary "A Plastic Ocean" was thoughtfully showcased at the International School Seychelles, with the primary aim of fostering awareness about the pressing global concern of marine plastic pollution within the school community. This event served as an enlightening opportunity for children, educators, and even parents to gain insights into the gravity of the issue (Racamora, 18.05.2023, interview). The response from the audience was incredibly encouraging, as viewers were visibly taken back by the staggering statistics and compelling visuals presented in the documentary. Beyond just screening the film, the occasion also provided a platform for open discussions, allowing attendees to share their thoughts and concerns about the environmental challenges posed by plastic waste in our oceans. This educational initiative not only informed but also equipped with meaningful conversations, reinforcing the importance of collective action to combat marine plastic pollution.

The Next event completely worthy of mention is national festivals, which can be seen as a good atmosphere for the diffusion of information on the path of environmental awareness. People joining events receive beneficial knowledge in terms of global environmental issues. The Ocean Project Seychelles took great pride in its active participation in the 2018 Seychelles Ocean Festival (SOF), held from Friday, November 23rd to Sunday, November 26th, 2018. This annual event was designed to celebrate the Seychelles' rich marine diversity, highlight its natural beauty, and underscore the fragility of its marine ecosystems, with a particular focus on commemorating the International Year of the Reef. The highlight of this launch was the screening of the documentary 'A Plastic Ocean,' a film secured by TOP through funding under the GEF Small Grants Programme. 'A Plastic Ocean' compellingly revealed the latest scientific findings, demonstrating how plastics, once they enter the oceans, disintegrate into tiny particles that permeate the food chain. These particles act as magnets, attracting harmful toxins, which accumulate in the fatty tissues of seafood and ultimately find their way into our own consumption. Like Irene Ducret said during an interview, social media manager of SeynoPlatic Organization, "the primary concern lies in shellfish and similar organisms found in bodies of water, as they consume tiny particles. Research has shown that the highest concentration of microplastics is found in shellfish. Therefore, when consuming shrimp or similar seafood, it is advisable to thoroughly remove their digestive tracts before consumption" (11.05.2023). The most observable 'anthropogenic impact on the environment' is associated with the human behavior of throwing garbage away without considering not only long-term damages like ecological degradation but also a lack of awareness, causing a high risk about what they

consume at the dinner. To clarify what it means, take a look at one of the billboards created by the Ocean Project Seychelles, includes a metaphorical message (see figure 5 below).



Figure 5: TOP Infographic Billboard (photograph taken by author) May 17,2023

This billboard message created a huge impact on me when I saw it, so the realistic reflection of visualized harsh realities, I think, is also a remarkable driving force for the living people in the Seychelles. It means that “What we throw in the ocean ends up on our food plates”. This social campaign by The Ocean Project not only aims to raise awareness about plastic pollution in the streets but also incorporates a sustainable approach. Plastic pollution, amounting to 8 million tones yearly, poses a severe threat to many terrestrial and marine species. They often mistake plastic, especially bags, for food, leading to ingestion, starvation, and buoyancy syndrome. This issue is pervasive, impacting oceans globally and affecting humans through the food chain. Microplastics, generated as plastic degrades, accumulate in fish, posing health risks when consumed by humans. This bioaccumulation cycle amplifies the danger, highlighting the urgent need to address plastic pollution for the well-being of marine life and, ultimately, human health. As indicated at the bottom of the billboard, the poster itself is a testament to their commitment to fostering a circular economy. “All plastic waste collected from beach cleanup events was used in the production of this poster and has been given a second life through art projects”.

'A Plastic Ocean' film has been used as an effective tool in many awareness projects and organizations, targeting not only children or their parents, but the staff members in schools, more importantly, teachers who are seen as vital initiators of the process of delivering environmental thoughts and behaviors or role models for children in the outer environment. In most cases, they are deprived of adequate training and competence, particularly in the realm of experiential learning. Helen Kopnina highlights a crucial aspect of teacher education,

emphasizing the necessity of training local teachers instead of those educated in the Western-style system. This approach aims to address potential harms stemming from the influence of European cultural biases and mitigate the risk of exploitation. (2013). That's why the training and experience of teachers and other individuals responsible for environmental education are as important as the education of young generations. As can be seen, TOP advocates the importance of addressing different aspects of environmental problems that people do not think much about in their daily lives, but that are increasing day by day, by narrating information that people try to convey through visual sources. Additionally, making teachers integrated into the progressive educational sessions is strongly fostered by the missionary goals of TOP as well.

Beside verbal and visual materials, encouraging civic involvement practices on site through the idea that being an effective role player for the sustainability of nature is inevitable in TOP's mission. On the closing day of the festival, TOP, in collaboration with the Seychelles Tourism Board (STB), rallied over 65 dedicated volunteers for a rapid beach cleanup at Beau Vallon Beach. In just one hour, the group managed to collect 229 kilograms of waste. Moreover, the Ocean Project Seychelles played an active role in the festival's stalls near the Savoy Hotel. Their booth featured an array of TOP merchandise and offered environmentally-conscious products such as stainless-steel straws and reusable bottles for sale. A portion of the proceeds from these sales supported TOP projects and the efforts of partner organizations like ECOLOZIK and Little Splash. The Ocean Project's educational initiatives with the help of interactive social activities are also evident in such events. They organized competitions, including the 'What's Our Next Campaign' contest, where supporters had the opportunity to suggest the next plastic-related issue for TOP to address and explain why it should be a priority. In this way, The Ocean Project actively engaged its community, encouraging participation and ensuring that the campaigns were reflective of the concerns and priorities of its supporters. Last but certainly not least, the Ocean Project Seychelles, in collaboration with Ben Taylor from Wise Oceans, hosted a live interactive session on K-Radio during the festival. This session delved into the pressing issue of microplastics, engaging the audience in a dialogue that aimed to raise awareness and foster behavioral change. With a couple of words, the Ocean Project Seychelles' involvement in the 2018 Seychelles Ocean Festival was not only about participation but also about education, inspiration, and motivating individuals to embrace sustainable practices. Through documentaries, clean-up efforts, merchandise sales, competitions, and interactive sessions, they successfully ignited a sense of responsibility and sparked behavioral

change in the fight against marine plastic pollution and the protection of the Seychelles' pristine marine environment.

Another unifying event held on August 11th, 2018 is a Sea Turtle Festival combined with a beach clean-up event. The Sea Turtle Festival on Praslin was a collaborative event organized by Sea Turtle Friends Seychelles. This festival aimed to celebrate and raise awareness about sea turtles and their conservation. The collaboration involved representatives from various NGOs and governmental organizations, emphasizing the strength of unity in conservation efforts. Activities at the Sea Turtle Festival included a march, with teachers and students showcasing their dedication through costumes, artwork, songs, and dances. The event also featured a judging panel, including TOP, to recognize outstanding contributions. The purpose of the festival was to promote sea turtle conservation and educate the community about these important marine creatures. The collaboration among diverse organizations demonstrated the power of collective action in achieving conservation goals. Following the festival, participants engaged in a beach clean-up at Anse Madge, in partnership with GVI Seychelles Curieuse. This clean-up aimed to raise funds for the Terrestrial Restoration Action Society of Seychelles (TRASS), an NGO dedicated to tree planting and restoration efforts on Praslin. By bringing together 13 different organizations, including Island Conservation Society Aride, Nature Seychelles Reef Rescuers, and Turtle Action Group Seychelles, the festival showed how collaboration can make a significant difference in environmental preservation and awareness.

Maybe last but not least, Climate Action Week 2019 held significant importance for the Seychelles as it marked a pivotal moment in the global climate movement. Inspired by the impassioned advocacy of youth climate activists worldwide, this event galvanized over 150 countries, including the Seychelles, to recognize the urgent need to address climate change. The Ocean Project (TOP), under the leadership of project managers Victoria Alis and Zara Pardiwalla, played a central role in orchestrating a series of impactful activities during the week, including marches, clean-ups, and educational events. These initiatives collectively shed light on the climate challenges facing the Seychelles and underscored the country's commitment to proactive climate action. The week's activities included landfill tours, climate action marches with over 400 participants, a climate action fair, a climate change Word Up open mic night, mangrove planting and clean-up efforts, a dive clean-up, mural painting, and a climate change pub quiz. By mobilizing citizens and sending a powerful message to leaders, TOP contributed to raising climate awareness and advocating for immediate action to mitigate climate change, further highlighting the crucial role of grassroots movements in addressing global

environmental challenges. After all, The Ocean Project Seychelles has been known as a proactive and dedicated participant in collaborating with both local and intergovernmental actors and institutions to address critical marine and environmental issues, with the successful people carrying and representing the issue at international level greatly.

Locally, the organization has forged strong partnerships with government agencies, non-profit organizations, and community groups to collectively work towards the sustainable management of the Seychelles' marine resources. This collaborative approach extends to intergovernmental cooperation, where the Ocean Project Seychelles actively engages with regional and international bodies, such as the Indian Ocean Commission and United Nations agencies, to address broader ocean-related challenges. Through these partnerships, the organization has been instrumental in shaping policies, promoting conservation efforts, and advancing research initiatives that contribute significantly to the preservation and responsible stewardship of Seychelles marine ecosystems. However, on the other side, relationships with IOs have been built through international binary procedures, project-based agreements, or similar associations, so this potentially paves the way for negative outcomes. To be clearer, like discussed by several anthropologists, from a post-colonial perspective, this reliance can be interpreted as an extension of enduring power imbalances rooted in history. Former colonial powers or economically advanced nations often play a significant role in shaping the development trajectory of former colonies or less economically advanced nations. In the case of sustainability initiatives, the reliance on foreign investment and financial grants from developed countries can create a dynamic where the economic and environmental policies of the developing nation are influenced and, to some extent, controlled by external entities. This situation can perpetuate a sense of dependency and limit the agency of the developing nation in determining its own sustainable development goals. “Seychelles, like all the projects funded in the NGOs, the money mainly comes from exterior grants because there's not a lot of funding capacity within the country” (Racamora, 18.05.2023, interview). Based on my observations and the information I obtained during my interviews, I can say that TOP, like other institutions and individuals, reported that the power of the state was not sufficient in areas such as environmental protection activities and educational initiatives. The passive actor model of the state has made local and international organizations dependent on foreign aid and financial funds. As expressed by Mascarenhas in an interview, “we feel we don't always get the support that we need locally from the government and these funding agencies” (18.05.2023). Some state aids are mentioned: “There was a fund called the Environmental Trust Fund, generated from

money given by tourists at the airport to fund environmental activities. However, accessing this fund is a challenge, and the process is not well understood. Before 2021, there was the Corporate Social Responsibility (CSR) policy, requiring enterprises with profits over 1 \$ million to contribute 0.5% tax to an NGO, but it was removed in 2020 with a change in government” (Racamora, 18.05.2023). Additionally, the terms and conditions attached to foreign investments or grants may not always align with the local context, leading to projects that are more attuned to the interests of the donor country than the actual needs and priorities of the recipient nation. Therefore, while international cooperation and support are crucial for sustainable development, a careful consideration of the power dynamics and potential pitfalls of dependency is essential to ensuring that the path to sustainability is driven by the genuine needs and aspirations of the people in the developing nation.

In terms of beach-cleaning, The TOP works with other institutions, taking environmental cleaning as their core initiative. On September 15th—16th, 2018, Seychelles' Biggest Beach Clean Up was organized by The Ocean Project Seychelles in collaboration with the Seychelles Sustainable Tourism Foundation. Under the theme "Laprote I nou responsabilite (Creole/French)," meaning "The right to take responsibility” emphasizing the shared responsibility, for maintaining a clean country, this event became a testament to the power of collective action in safeguarding natural treasures. With the participation of more than 50 organizations, including NGOs (Aldabra Clean Up Project, Seychelles Islands Foundation, Terrestrial Restoration Action Society of Seychelles, Six Senses Zil Pasyon), public bodies, and private entities (community groups, hotels, self-catering establishments, schools, etc.), this beach clean-up event showcases the unity of diverse stakeholders towards a common goal. The impressive outcome of 3.5 metric tons of rubbish collected across 7 islands, including 2 clean-ups at sea in just one hour by 700 volunteers, underscores the pressing need for continued efforts in preserving the Seychelles' beaches and marine ecosystems. The successful execution of the beach clean-up initiative, "Seychelles' Biggest Beach Clean Up," owes its realization to the generous financial support provided by several pivotal stakeholders. The GEF Small Grants Programme, renowned for its commitment to environmental conservation, played a crucial role in funding and facilitating the event. Likewise, this exemplifies the critical role of collaborative efforts between governmental, non-governmental, and corporate entities in advancing environmental conservation and sustainability initiatives. After I did a review of the areas where the organization is active during the fieldwork, I understood that The Ocean Project Seychelles'

role in driving environmental education and fostering a sense of responsibility among the local community reinforces the importance of preserving the Seychelles for future generations.

Moreover, in 2019, between the 18th and 31st of March, a group comprising 40 individuals, including 20 top-notch surveyors affiliated with the TOP organization, embarked on an expedition to explore one of the Seychelles' thirteen pristine outer islands. This endeavor, known as the Seychelles Outer Islands Clean-Up, was orchestrated by the Islands Development Company (IDC). The total weight of litter collected was 10,627kg across the islands over 3-7 days (WIOMSA, 2019). TOP's role in this venture was to spearhead marine litter assessments on these remote islands, which inevitably indicates another role of the NGO, which is in aligning its initiatives with the scientific rigor underlying TOP's research-driven approach. In other words, the Marine Litter Monitoring Program (MLMP), funded by the Western Indian Ocean Marine Science Association (WIOMSA), has been showing TOP's mission for scientific data observation mechanisms as well. The Marine Litter Monitoring Program by WIOAMSA in partnership with the African Waste Academy (AWA), is the educational branch of Sustainable Seas Trust. The AWA facilitates cross-continental knowledge exchange and skill development, with a primary focus on addressing the educational needs of professionals in plastic waste management in Africa through lectures, webinars, online courses, and educational resource development⁸. This program, scheduled between 2019 and 2021, received support from various sponsors, including international organizations, governmental agencies, NGOs, and research institutions, including the signed agreement of the Ministry of Agriculture, Climate Change and Environment (MACCE Seychelles), the Landscape and Waste Management Agency (LWMA), The Islands Development Company (IDC) and the Island Conservation Society (ICS) (WIOMSA, 2019). Seychelles actively engaged in the program, given its strategic location in the Western Indian Ocean and its commitment to preserving its pristine environment. As a project investigator, Victoria Alis has played a role in the Marine Litter Monitoring Program, like she said, with the help of her professional background in Marine Biology. As a result of collaborative relations with state institutions, outcomes translated into policy recommendations as stated by Alis: "We see the evolution of the monitoring program based on the results, and then we can actually define and develop policy recommendations from that" (18.05.2023, interview). This process is not only beneficial for

⁸ Monitoring and mitigating marine litter (specifically, macrolitter (>25mm), mesolitter (5-25mm) and microplastics (<5mm)) in the Western Indian Ocean region, in countries which are Seychelles, Kenya, Tanzania, Madagascar, Mauritius, Mozambique, and South Africa (WIOMSA,2019).

enhancing environmental conservation efforts but also contributes to the sustainable development of Seychelles, fostering a harmonious balance between ecological preservation and socio-economic progress and policy advancements.

In the Seychelles Outer Island Clean-up Project, the overarching goal was to comprehensively assess the quantity, composition, and possible sources of litter strewn along the shorelines of Alphonse, Astove, Coetivy, Desroches, Poivre, Platte, Remire, as well as various islands within the St. Francois Atoll and Farquhar Atoll. This critical data collection initiative not only aimed to clean up these natural habitats but also to amass valuable insights into the environmental impact of marine debris. This expedition served as a testament to the dedication of these 40 participants, who were committed to safeguarding the Seychelles' outer islands and preserving their unique ecosystems for future generations. In addition to its ongoing commitment to environmental conservation, The Ocean Project (TOP) launched several additional projects to further its mission, like the mangrove planting.

In the grand tapestry of TOP's journey, education and advocacy efforts remain pivotal. Visual materials have emerged as a compelling educational tool, elucidating the dire consequences of environmental negligence. In essence, since its establishment, TOP's trajectory has evolved from tackling marine plastic pollution through clean-ups to integrating education, action, research, and strategic partnerships. The organization's multifaceted approach has positioned the Seychelles for a sustainable future, fostering shifts in individual behavior, corporate practices, and the policy framework.

#CaptainFanPlastic

Captain Fanplastic is a primary school program with a mission to raise awareness about the dire consequences of plastic pollution in the oceans and, at the same time, emphasize the value that lies within this issue. It recognizes that plastic pollution poses a significant threat to marine life, ecosystems, and human well-being, and it endeavors to be part of the solution. The program's mission is to educate primary school students about the environmental consequences of plastic pollution while instilling the idea that plastic waste can also hold value, like Parley's principles. This dual-purpose approach aligns with the hashtag #notrashbuttreasure, underscoring the program's commitment to changing perspectives and behaviors surrounding plastic use. "In an era where environmental degradation threatens our planet, initiatives like Captain Fanplastic emerge as a sign of encouragement, striving to contribute significantly to the United Nations Sustainable Development Goal 14 (SDG 14), Reduce pollution in our oceans" (TOP 20223)

Behind the general perspective of the establishment of the initiative, there is a thought that the natural wonders of South Africa are truly unique, but sadly, many children in this country don't have the opportunity to witness the beauty of their surroundings, instead they reside in communities with inadequate service delivery and are surrounded by mountains of trash. This first-hand experience exposes them to the degradation and pollution of essential resources like rivers and wetlands. Ultimately, this waste finds its way into the sea, adversely affecting marine life. Addressing this waste problem and the lack of environmental awareness became a mission for Ruben Hazelzet, the founder of SoapboxSA. The question arose under the roof of the projects: How could deeply ingrained behaviors that contribute to environmental degradation be changed? The answer is simply stated: through education. In 2018, SoapboxSA conducted a series of focus groups with primary school children in Khayelitsha, Cape Town, to assess their knowledge of plastic pollution. The goal was to develop a relevant narrative that could inspire positive behavioral change. This endeavor gave birth to "The Legend of Captain Fanplastic," a program that seamlessly integrates theory, creativity, and gamification to create a comprehensive learning experience. The program invites students into a world of learning and action with the aim of nurturing a sense of environmental stewardship, and together, through collective endeavors, it is believed that all people can play a role in fostering cleaner, healthier environments for their own communities, rivers, beaches, and oceans, thereby ensuring a sustainable future for both the current and future generations. At present, Captain Fanplastic operates in South Africa and the Netherlands, with plans to expand its reach to other countries. "Educating young people about adopting an environmental mindset is paramount to reversing the devastating effects of plastic pollution on water systems and marine life" (Racamora, 18.05.2023, interview). There are some fundamental core implementations behind the environmental literacy program fostering good behavioral change in environmental sustainability, which are storytelling events, learning, creating, cleaning, and closing the circle.

To extend practices, the 'Storytelling' practice of Captain Fanplastic serves to engage and educate learners. It begins with the captivating tale of The Legend of Captain Fanplastic, featuring Captain Fanplastic as the central hero. Through vivid illustrations and narrative, children are introduced to the consequences of plastic pollution on birds and marine life. The story also emphasizes the value of plastic as a resource, fostering a new perspective on this environmental issue. 'Learning' practice combines engaging Q&A sessions with hands-on treasure hunts to teach kids about plastic's impact on marine life and the importance of the 5 R's: Refuse, Reduce, Reuse, Repurpose, and Recycle. This practical approach empowers

children to make responsible choices and view plastic waste as a valuable resource. In this way, the kids gain a comprehensive understanding of plastic, its environmental impact when mismanaged, and the importance of responsible plastic use. Next, the 'Creating' practice of Captain Fanplastic is designed to instill a #NoTrashButTreasure mindset in learners by fostering creativity and hands-on crafting. In the third lesson, children actively engage in reusing and repurposing plastic materials to create personalized Captain Fanplastic eye-patches and Fin the Turtle. This hands-on activity not only reinforces the importance of responsible plastic use but also encourages resourcefulness and imagination. "By turning plastic waste into something fun and functional, this practice empowers children to view plastic in a new way" (Racamora,18.05.2023, interview), and creative light while promoting sustainability and environmental consciousness. Another fundamental approach is shaped around the engagement with the experimental worlds which is beach 'Cleanings'. In the cleaning practices of CaptainFanPlastic, learners actively engage in a fun and educational treasure hunt that reinforces the principles of the 5 R's, or Rrrrr representing 5 Rs among children, in their natural surroundings repeatedly. They are equipped with treasure maps that guide them to specific types of litter in their school's vicinity or nearby natural areas. This outdoor activity not only raises environmental awareness but also teaches practical skills for responsible waste management. The term "little pirates" is affectionately used to encourage a sense of adventure and enthusiasm among the participants as they embark on their mission to clean up and make a positive impact on their surroundings. Prizes for the most successful teams add an element of competition and reward, further motivating the learners to actively participate in environmental stewardship. Last but not least, the "Closing the Circle " approach of CaptainFanPlastic ensures that the environmental education journey doesn't end with a visit but continues long-term. After Captain Fanplastic's visit, a treasure bin is left behind, serving as a tangible reminder for learners to maintain their commitment as 'little pirates' who follow the learned environmental literacy and gain positive behavioral change. Additionally, the program facilitates partnerships with recycling organizations, creating an ecosystem for waste collection and recycling within the school. This sustainable approach not only reinforces the importance of responsible waste management but also ensures that waste is consistently removed from the environment and treated, resulting in lasting benefits for both the learners and the planet. In other words, Captain Fanplastic emphasizes value that plastic waste holds. Rather than simply demonizing plastic, the program educates students about the potential for recycling and repurposing plastic materials. This perspective shift promotes sustainability and empowers young learners to become part of the solution to plastic pollution.



Figure 6: News in Nation Info- CaptainFanPlastic (<https://www.nation.sc/articles/19249/top-brings-captain-fanplastic-initiative-to-primary-schools>)- Accessed in August 27,2023

the Seychelles. Within an eight-month period, TOP sustained at schools in collaboration with other local institutions and NGOs: Beau Vallon Primary School, Independent School of Seychelles, Au Cap Primary School, Baie Lazare Primary School, Takamaka Primary School, Perseverance Primary School, Praslin Baie St Anne Primary School, Plaisance Primary School and The Children's House.

It takes advantage of the nation's natural beauty to provide firsthand experiences of marine ecosystems, allowing students to witness the potential devastation caused by plastic pollution. The well-known fact is that the Seychelles, nestled in the Indian Ocean, faces the dual challenges of being a pristine natural habitat and a nation susceptible to plastic pollution due to its geographical location and dependence on coastal tourism. "Plastic waste, particularly single-use plastics, poses a significant threat to the Seychellois ecosystem, affecting marine life, disrupting coastal ecosystems, and compromising the allure of its beaches"(anonymous, program director of Seynoplactic,04.08.2023, interview). This necessitated proactive

The practices of Captain Fanplastic have found a fitting home in the Seychelles, an island nation in the Indian Ocean known for its biodiversity and pristine marine environments. That educational initiative by the South-African company SOAPBOX "expanded to the African and Indian Ocean Developing Island States (AIODIS) with the support of the Indian Ocean Commission and the World Bank" (TOP,2023). In the Seychelles, the program, which was planned to be implemented between February-September 2023 in 15 primary schools (preferably public) on Mahé island (and Praslin and La Digue has adapted its curriculum to suit the local context. The Ocean Project is the contracted organization for the project launched in

intervention, resulting in the establishment of CaptainFanplastic. The collaboration between CaptainFanPlastic and The Ocean Project Seychelles is a powerful partnership aimed at tackling plastic pollution and promoting environmental awareness in the landscapes of Mahé, Seychelles. Through this collaboration, CaptainFanPlastic extends its educational outreach to Mahé, leveraging the local expertise and resources of The Ocean Project Seychelles. Together, they implement initiatives that engage primary school students and the community at large in educational programs, public cleanups, and storytelling events. These initiatives not only raise awareness about the detrimental impacts of plastic pollution on marine ecosystems but also emphasize the value of responsible plastic use and recycling.

When addressing plastic pollution in the Seychelles, the prominent role in the local base belongs to the CaptainFanplastic which has gained prominence due to its multifaceted approach that integrates education, community engagement, and experiential learning to combat plastic pollution. The initiative's emphasis on fostering behavioral change through education and awareness sets it apart from many other local projects that might focus primarily on clean-up efforts. In terms of its impact on environmental education, CaptainFanplastic's approach stands out as comprehensive and forward-looking. By partnering with schools, collaborating with other organizations, and engaging communities, CaptainFanplastic aims to instill a deep understanding of plastic pollution and its consequences. This not only has the potential to create immediate changes in behavior but also to cultivate a 'culture of sustainability' that can endure over time. It's essential to consider the potential challenge of these initiatives, ignoring the cultural context of the implementing area. Cultural differences play a significant role in shaping people's behaviors and attitudes. The imposition of foreign sustainability practices without considering local cultural nuances may face resistance or not achieve the desired long-term impact. Hence, striking a balance between global sustainability goals and respecting the cultural context of the area is crucial for sustainable initiatives.

CaptainFanplastic's initiatives implemented by TOP in the Seychelles are part of a broader tapestry of efforts by various non-governmental organizations (NGOs) addressing plastic pollution. A comparative analysis underscores the organization's distinctive approach, characterized by its emphasis on education, community involvement, and interdisciplinary collaboration. While some NGOs may focus predominantly on clean-up operations, CaptainFanplastic's integration of education complements these efforts by targeting the root causes of plastic pollution. This approach is aligned with a growing recognition within the environmental community that lasting change necessitates a shift in attitudes and behaviors.

Furthermore, CaptainFanplastic's inception in response to the plastic pollution crisis is emblematic of a paradigm shift in environmental activism. The success of TOP and the contribution of CaptainFanplastic lie in their ability to bridge the gap between scientific research and public understanding. Furthermore, the organization's collaboration with schools and educational institutions enhances its reach, embedding environmental awareness within curricula and nurturing a generation that is inherently conscious of its ecological footprint. The effectiveness of CaptainFanplastic's initiatives is perhaps most pronounced in the observable behavioral changes they have induced. Surveys conducted before and after engagement with the organization consistently reveal heightened levels of awareness and commitment to reducing plastic waste among participants. Local communities that have partnered with CaptainFanplastic report decreased plastic consumption, increased recycling rates, and heightened advocacy for plastic-reduction policies. To sum up everything that has been stated so far, CaptainFanplastic stands as a testament to the transformative power of ocean projects focused on environmental education. Through its dynamic roles, clear mission, and impactful initiatives, it has succeeded in reshaping public perceptions and behaviors regarding plastic pollution, in the Seychelles case. The case of CaptainFanplastic underscores the potential of such initiatives to catalyze tangible change by instilling a sense of urgency, responsibility, and stewardship for the oceans. As we confront the escalating environmental challenges of the modern era, "projects like CaptainFanplastic illuminate a promising path towards a more sustainable and harmonious relationship between humanity and the oceans (TOP, 2023). Ultimately, in light of the work it has carried out in 2023 in collaboration with TOP, it positions CaptainFanplastic's projects in the Seychelles as a pioneer in addressing plastic pollution through multi-pronged strategies that inspire, educate, and empower.

4.3. Local perspectives: plastic pollution and the work of NGOs in Seychelles

In this ethnographic exploration of plastic pollution in the Seychelles, this section delves into the diverse array of local perspectives that both shape and are influenced by the prevalent issue of plastic waste. Set against the backdrop of the pristine landscapes and vibrant marine ecosystems that characterize this island nation, the narratives of Seychellois communities provide invaluable insights into the severe impacts of plastic pollution on their daily lives. This ethnographic inquiry seeks to amplify the voices of individuals whose everyday experiences intersect with the environmental challenges posed by plastic debris. By unraveling the intricate interplay between local perspectives and the collaborative endeavors of NGOs, this segment aims to address key questions, such as the concerns of local people regarding plastic pollution

in the Seychelles and their perceptions of government and NGOs' initiatives aimed at fostering environmentally conscious behaviors in society. Conducting a comparative study, this research explores the perspectives of both local citizens and European individuals who have chosen to settle in Seychelles (not tourist). The objective is to ascertain whether individuals from distinct cultures and backgrounds hold similar views regarding the environmental pollution crisis in Seychelles, and if there are notable points of divergence. Through this analysis, the study aims to provide insights into the shared and differing perspectives on the environmental challenges within the Seychelles. This method permits a detailed exploration of the perspectives held by individuals living in the community, providing valuable insights from those who have closely observed the environmental dynamics of the region.

The emerging environmentalist community, although not officially organized as an institution, has already undertaken significant initiatives. While it may not be aptly termed an organization at this stage due to the lack of a formal structure, this community serves as a pioneering force for the establishment of a structured institution in the Seychelles dedicated to environmental causes. Their proactive efforts and groundwork lay the foundation for a future institution that aims to make a substantial impact on environmental conservation in the region. This group calls themselves Fresh Focus, founded in 2020 by two Seychellois people and known as one of the most efficient groups in doing beach clean-ups after TOP and Parley. A recently established self-sufficient community has gained recognition through its collaboration with local organizations mainly on Praslin Island, expanding social networks, and garnering support from the local populace, particularly through their impactful beach cleanups. The founders of this community, Ivan Ray Capricieuse and Jason Edward Gomme, Seychellois, united with the shared goal of fostering a cleaner future by encompassing forest, sea, and coastal protection within the community's ambit. "What we try to do is create lifestyles...So, we are not only about the cleanup" (Capricieuse, 19.05.2023, interview). They push themselves to cover any piece of nature issue such as replantation, prevention of black-market sale of sea turtles, protection of coral reefs and mangroves which are under threat, etc. Coral reefs and mangroves provide essential benefits such as biodiversity hotspots, shoreline protection, carbon sequestration, and sustaining fisheries, making their protection crucial for ecological balance and human well-being. Additionally, their principle of "3 in 1" representing 3 fundamental environmental areas, namely forest, ocean, and beach gives the organization a holistic environmental approach. However, their initial priority under this principle is promoting lifestyle, through environmental events incorporating "traditional methods, cultural music,

dance and food” (Gomme, 19.05.2023, interview) in communal projects. This is coupled with fostering environmental awareness through informative sessions, workshops, and cleanup practices. I realized that this is a sensitive topic that nobody mentioned among interviewees. However, as it is stated by Michael Omolewa, education lies at the core of cultural values and practices including music, cultural rituals and etc. (2007). Preserving cultural ways of living, habits, customs, and more is a matter of significant concern for the leaders of Fresh Focus. Related to this issue, they are eager to keep national values safe from westernized ways of living. In other words, “even the new generation is inclined to adopt the European and American lifestyle, aspiring to a more materially comfortable way of living. Therefore, we risk losing our authentic identity—the true richness and value that define us. The desire for more buildings, cars, and wealth seems to overshadow our genuine cultural heritage” (Gomme, 19.05.2023, interview). To add, the thoughts of Dr. Jerome Harlay would be beneficial. He is a senior lecturer in the University of Seychelles, Blue Economy Research Institute. His extensive expertise in oceanography, particularly his research on the effects of dissolved carbon dioxide on calcifying phytoplankton in the context of climate change, offered invaluable insights into the challenges facing Seychelles' marine ecosystems, along with participation in projects related to waste management. He stresses on this subject that “In the last 50 years, people were pretty aware of environmental pollution, and they were very keen to do their best to limit their intrusion to the ecosystems. But there has been a change of mentalities pretty recently ... with the new generation adopting Western style attitudes of consuming, with imports being much more so ... But everything takes a lot of time in Seychelles, so I'm pretty sure that it's going to be okay within a few years, but it needs some time. (Jerome Harlay, 18.05.2023, Interview). Another person on the same page is management officer Camille Mondon. She says “The population's behaviors in the Seychelles and Europe differ, Seychelles currently in a stage of wanting to consume and resisting a return to traditional ways of life” (17.05.2023, interview). Also in the literature, adopting a consumerist Westernized lifestyles highlight a prevalent discourse on cultural assimilation. This phenomenon stems from globalization and external influences on social and cultural structures, posing a risk of eroding the unique cultural heritage that defines the Seychellois identity

The primary concern here is identifying the responsible party for the current situation. The central problem stems from the state's policies, which lack a sufficient focus on environmental discourse. Government offices are notably ill-equipped and insufficiently concerned with addressing environmental issues, both internally, such as waste management,

and externally, in the context of international policies. Fresh Focus members, like many others, think that state funding for local initiatives is quite insufficient, and with limited financial and infrastructural resources at their disposal, the government faces constraints in implementing comprehensive strategies to combat pollution and manage waste accumulation in coastal and marine areas. For instance, state practices in waste management have faced criticism for their reliance on delays, unfulfilled promises, and the short-lived nature of temporary solutions. For example, “most of the bins don't remain on the road for more than six months. So, they get damaged easily, and money is spent on that. Moreover, they are made of plastic. Thus, there are many areas where we could spend less and achieve more” (Gomme, 19.05.2023, interview). From a different perspective, the problem belongs to the companies, not people. “From a personal perspective, I believe companies producing plastic should take responsibility, not consumers. They should provide products with no plastic. If they make plastics that can be recycled multiple times, it would save a lot of plastic, and oil, and reduce the impact of climate change. So, it's crucial for companies, with their resources and expertise, to make a significant impact rather than doing things halfway (Lawen, 12.08.2023, interview). This viewpoint underscores that the global use of plastics as packaging and product materials poses the most significant risk to the world and should be averted. However, when assessing on a regional or country-specific basis, Seychelles, not being an industrial country and lacking production activities, “lacks autonomy. Especially regarding food, we import a significant number of things” (Mondon, 17.05.2023, interview). Consequently, due to limited alternatives, consumers face challenges in changing their purchasing habits. Even if there were plastic-free alternatives, they would be more expensive. Consequently, individuals who cannot afford these alternatives may opt for cheaper options” (Lau Tee, 17.05.2023, interview). As a result, the global problem of plastic pollution, primarily driven by producers, is worsened by consumer unawareness. But also, the severity of this issue is closely tied to the economic and political structure of the countries.

Fresh Focus has added another dimension of social awareness by engaging Stephanie Wichmann, leader of MyBeachProject, who gained prominence through environmental art initiatives. She, coming from Germany, has been living in Praslin since 2019 and has been a prominent stakeholder in Fresh Focus since 2020. Stephanie's journey began with individual beach clean-ups and evolved into awareness-raising projects. Her goal is to heighten environmental sensitivity, and she has successfully reached a broader audience through visuals created from beach waste. Currently, she has not monetized her work, but during the interview,

it was emphasized that through this work, she could potentially offer financial support to Fresh Focus and its targeted projects. Beside her art initiatives, other members of the community, committed to integrating various forms of art into their initiatives, participate in diverse activities aligned with the principles of sustainability. This includes crafting accessories made from sea glass and engaging in individual art production, along with repurposing fishing nets for agricultural purposes. Notably, the community has erected signboards near garbage bins from recycled materials displaying constructive and affirming messages such as 'Study Nature, Love Nature, Stay Close to Nature; It Will Never Fail You' and 'Leave Nothing, but Footprint'. These initiatives, encompassing both social awareness and waste reduction actions, underscore their commitment to encouraging respect for nature. Due to the pervasive lack of awareness that they consistently encounter. Gomme describes the situation as follows: “We put those recycled bins, but they are not used properly because sometimes people pass by the bins empty, but all the trash is outside... with these boards taking people’s attention by using a bit more of a reversing psychology approach, and instead of just saying this smelly bin next to the road, they see something like a sculpture or something. In this way, we try to play with it to make it attractive” (19.05.2023, interview). Also, he highlights that the tourists have more careful attitudes compared to the locals. The question of whether locals or tourists are more environmentally aware and cautious about sustainability practices is debatable. From my field notes taken while seated by the Marina in Mahé, I aim to articulate the perspective conveyed by a local employee regarding this matter. Due to the insufficient availability of ashtrays at the cafe, the worker suggested that I dispose of the cigarette butt in my hand into the sea, looking at the piles of rubbish on the marina next to me.

According to interviewees in my research, there is a common argument about the impact of tourism on the country, leading to increased waste generation due to hotels and the food industry, which has detrimental consequences. To exemplify, Jason Gomme states the risk of excessive tourism dependency of state as “Seychelles will be uninhabitable in 50 years..., but for a tiny island state, they should think about the harm rather than the benefits of over-tourism” (Gomme, 19.05.2023, interview). However, some argue that tourists pay greater attention to environmental issues, for example Lara Gutser, who is German, and has lived in Mahé for 6 years. She argues that “The tourists are the ones that are obeying that or taking a picture of infographics. For the locals, it is a bit difficult...if you see it every day, you will just pass by and not pay attention to it” (Gutser, 14.05.2023, interview). On the contrary, Alvania Lawen, coordinator of Parley Seychelles, argues that “I think Seychelles is doing a lot for the

environment. Africa, as a whole, uses way less electricity and food than Europe, even though it's much bigger. And here in the Seychelles, we don't even need heating because of our warm climate, unlike Europe with its heavy winters. Our carbon emissions are super low, just 0.01% of the global climate change problem. Many African countries have similarly low emissions. So, even though it might seem like Europe is more environmentally conscious, African nations, including the Seychelles, are making a significant impact, especially considering our larger population. We're doing our part to tackle environmental challenges.... When tourists come to Seychelles, they might notice there aren't bins everywhere, and it might seem like we're not too eco-conscious. But the thing is, we Seychellois, just live our lives in a way that's good for the environment. We don't shout about it or call it "environmental action," but it's in everything we do. We reuse stuff, cut down on waste, and it's all just part of our everyday culture. We don't need protests to care about the environment; it's second nature to us" (12.08.2023, interview). This can also be attributed to the advanced waste management practices and better environmental education in Europe with strong infrastructure. In other words, acquired environmental sensitivity is parallel to behavioral patterns. That's why education is recognized as a crucial tool for the exact purpose of creating lasting impacts on the environment, rather than viewing it as a short-term investment. "We take everything into our initiatives and that's why we need to focus on educating the youth, especially we do. We do work with lots of children, kids and as artists, especially within the group, we have individuals with their own responsibility" (Gomme, 19.05.2023, interview). As an environmentalist who actively follows the eco-school program after his participation in excursion of Aldabra Atoll, Ivan Capricieuse says the following on this subject: "The success of the Aldabra Eco-School Project lies in its unique approach. The competitive element taps into students' desire to excel, turning sustainability into a source of pride. With a multi-year duration, the project fosters a lasting commitment to environmental responsibility among students" (19.05.2023, interview). By emphasizing collaboration, it involves students, teachers, parents, and the local community, amplifying its impact. At this point, looking ahead to the future is dependably created by a new generation who will become the next fighters of environmental issues and continue the work it has been started. That's why youth empowerment with the collective responsibility to mitigate has a tremendous importance within the purpose of building a more equitable, knowledge-based, sustainable, and prosperous future for Africa. What I observed is that to achieve more constant improvement for reducing the impact of climate change triggered by humanitarian treatments on nature and natural resources, it is believed by many that environmental education needs to start at young ages and continue life-long, not only at schools but also at the center of

life. By fostering a culture of environmental consciousness and stewardship from an early age, the Seychelles can empower its citizens to become informed advocates and responsible participants in environmental preservation.

Fresh Focus operates as a self-sufficient entity, maintaining financial sustainability without relying on funding from domestic or international organizations. “So, money is not an issue. If we're doing something for our country, for tomorrow, for the future generation. I don't mind taking it from my salary” (Gomme, 19.05.2023, interview). Also, they lead projects with the help of social cooperation and networking which reduce financial limitations. “During events, our network proves invaluable. For example, friends in the coconut branding business generously provided 60 coconuts for free, dedicating their evening to brand them without payment. This mutual support extends further; for another cleanup event, when I intended to purchase 20 liters of something, the response was, take it. Such gestures create a positive cycle of support. Partnering with a local takeaway owner, a skilled chef, allows us to showcase local culture. Each participant brings unique skills, fostering a beautiful and interconnected collaboration (Wichmann, 19.05.2023, interview). In terms of logistics, they claimed that they do not have difficulties in terms of providing equipment for events, but I think this is due to the fact that they are currently organizing small-scale events. Nevertheless, unlike other organizations that cannot sustain their work in the long term without international funding, the internal dynamics of the group have shown a consistent resistance to the criticized self-interested and exploitative humanitarian aid in the field of sustainable environmental work.

5.CONCLUSION

This master's thesis undertakes a comprehensive exploration of environmental protection, specifically delving into the causes, effects and management strategies of environmental pollution in the Seychelles archipelago, with a particular emphasis on plastic waste. The Seychelles, grappling with plastic pollution exacerbated by its location in the Indian Ocean, faces challenges in combating environmental issues due to logistical and infrastructural deficiencies, economic instability, and ineffective waste management strategies. The escalating global production of plastic, coupled with historical factors such as the industrial revolution, population surge, and demand for luxury goods, has contributed to a critical environmental issue affecting small island states like the Seychelles. The study has highlighted the complexities of environmental resilience and sustainability within the broader framework of

African studies, shedding light on the vulnerabilities faced by developing nations, especially those in the Global South.

The research critically assesses the initiatives of non-governmental organizations (NGOs) in the Seychelles, with a focus on their role in hegemony debates within the anthropological context. Against the backdrop of global politics and economics, the thesis explored the nexus between environmental anthropology, humanitarianism, and environmental NGOs, emphasizing the challenges faced by developing states aspiring to Western lifestyles. Participant observation method is used for the field work in Seychelles, and as an ethnographic focus, the Ocean Project was selected as environmental NGO initiating environmental education having environmental education initiatives. Through interview sessions and formal and informal questionnaires, observation and data gathering on organization's practices enacted for conscious raising tool in the society. With taking into account of other NGOs working in the field of environmental protection and sustainability, and perspective of local people on environmental issues, following questions were attempted to answer: What do educational NGOs operate in Seychelles, and how do they implement their practices? Specifically, how do these organizations strategize the dissemination of knowledge and stimulate behavioral change among the local population; What challenges do educational NGOs in Seychelles commonly face in their pursuit of successfully establishing a sustainable environment? How do these challenges impact their ability to achieve their goals; What humanitarian initiatives and discourses are initiated by environmental NGOs to combat plastic pollution? How do these organizations incorporate Western environmental ideas into local practices with the aim of reducing plastic pollution? And What socio-cultural conflicts may arise in this process?

The examination of the impact of international organizations like UNESCO on the promotion of environmental awareness in Seychelles reveals a critical perspective, highlighting potential conflicts and the overshadowing of local socio-cultural needs and perspectives by non-governmental organizations (NGOs). The reason is that capitalist powers, often through international NGOs, endeavor to integrate their principles into the cultural fabric of perceived disadvantaged countries, perpetuating passive exploitation in the global south. In this critical analysis, concerns arise regarding the manner in which the influence of these international entities might not align seamlessly with the unique context and priorities of Seychellois communities. One major point of contention revolves around the potential conflicts that can arise when global environmental agendas, advocated by organizations, clash with the specific needs and values of local communities in Seychelles. While international organizations may

emphasize universal environmental goals, the imposition of standardized approaches may inadvertently neglect or undermine the distinctive socio-cultural intricacies of the Seychellois population. Moreover, the overshadowing of local socio-cultural needs and perspectives by NGOs poses a significant challenge. The initiatives spearheaded by international organizations may inadvertently drown out the voices and priorities of Seychellois communities, as the focus tends to shift towards globally accepted norms. This phenomenon raises concerns about the genuine integration of local insights into environmental strategies, potentially resulting in a disconnect between the intended goals and the actual needs of the Seychellois people.

Notably, the study delves into the significance of environmental education, particularly in schools, as a paramount objective to cultivate environmentally conscious individuals and promote sustainable living. The research findings underscore a deficiency in environmental awareness within society, necessitating the importance of involving local communities in decision-making, preserving traditional practices, and acknowledging the role of non-governmental organizations. However, the integration of Westernized education systems through NGOs' international projects raises questions about the direct impact on local culture. Balancing global environmental imperatives with the preservation of Seychellois socio-cultural values is crucial to ensuring that advocacy efforts are not only effective but also considerate of the unique context in which they are implemented.

The thesis concludes by highlighting the necessity for meticulous policy formulation and localized planning tailored to specific regions and sectors, addressing the Seychelles' heavy reliance on foreign funding and support, which weakens its autonomy. Lastly, the research aims to contribute to the literature gap on environmental education and NGO initiatives in the Seychelles, urging further exploration of post-colonial debates and sustainable strategies for environmental management in developing nations.

6. REFERENCES

- Agricole, Julio and et al. 2016. "Solid Waste Management in the Seychelles: USYS TdLav Transdisciplinary Case Study 2016". Edited by Adelene Lai, John Hensley, Pius Krütli and Michael Stauffacher. ETH Zürich.
- Agyeman, Julian and Carmin, JoAnn. 2011. "Introduction: Environmental Injustice Beyond Borders" In *Environmental Inequalities Beyond Borders- Local Perspectives on Global Injustices*, edited by JoAnn Carmin and Julian Anyeman. 1-18. London. The MIT Press.
- Wim, M. Andrik, Breusegem, Van, Pitzner, Fredrik and Cowing, Michael. 2020. *Solid Waste Masterplan for Seychelles (2020-2035). Delegation of the European Union to the Republic of Mauritius and to the Republic of Seychelles*. Framework Contract SIEA 2018/402272.
- Angelovski, Isabella and Roberts, Debra. 2011. "Spatial Justice and Climate Change: Multiscale Impacts and Local Development in Durban, South Africa". In *Environmental Inequalities Beyond Borders- Local Perspectives on Global Injustices*, edited by JoAnn Carmin and Julian Anyeman. 19- 42. London. The MIT Press.
- Appadurai, Arjun. 1996. "Modernity At Large: Cultural Dimensions of Globalization". University of Minnesota Press.
- Bergthaler, Georg. 2020. "Exploring Local People's Agency in Community-Based Nature Conservation: Lessons Learned at the iSimangaliso Wetland Park". In *Bewildering Borders- The Economy of Conservation in Africa*, edited by Werner Zips and Manuela Zips Mairitsch. 285-302.
- Breidlid, Anders and Botha, Royce Louis. 2015. "Indigenous Knowledges in Education: Anticolonial Struggles in a Monocultural Arena with Reference to Cases from the Global South ". In *Indigenous Education- Language, Culture and Identity*, edited by Jacob, W. James, Cheng, Yao Sheng and Porter, K. Maureen. 319-340. USA. Springer.
- Caniglia, Schaefer Beth. 2011. "Global Environmental Governance and Pathways for the Achievement of Environmental Justice". In *Environmental Inequalities Beyond Borders- Local Perspectives on Global Injustices*, edited by JoAnn Carmin and Julian Anyeman. 129-153. London. The MIT Press
- Charnley, Susan and Durham, William. 2010. "Anthropology and Environmental Policy: What Counts?". *American Anthropologist*. 112(3):397–415,
- Comaroff, J. and Comaroff, L., 2003. "Ethnography on an Awkward Scale: Postcolonial Anthropology and the Violence of Abstraction", *Ethnography*, 4 (2), 147–179.
- Eriksen, H. Thomas. 2020. "Implications of runaway globalization in the Seychelles". *Small*

- States & Territories. 3(1): 9-20. Malta.
- Farmer, Paul. 2004. "An Anthropology of Structural Violence". *Current Anthropology*, 45(3): 305-325.
- Fenny, David, Berkes, Fikret, McCay, J. Bonnie and Acheson, M. James. 1990. "The Tragedy of the Commons: Twenty-Two Years Later". *Human Ecology*, 18(1). Pelenum Publishing.
- Ferguson, James. 2006. *Global Shadows, Africa in Neoliberal World Order*. Duke University.
- Fisher, F. William. 1994. "Doing Good? The Politics and Antipolitics of NGO Practices". *Annual Review of Anthropology*. 26:439–64
- Gupta, Akhil and Sharma, Aradhana. 2006. "Globalization and Postcolonial States". *Current Anthropology*. 47(2): 277-307.
- Hackmann, Heide, Moser, Susanne. 2013. "Global environmental change changes everything: Key messages and recommendations". *Changing Global Environments. World Social Science Report*. International Social Science Council. UNESCO Publishing.
- Halden, U. Rolf. 2010. "Plastics and Health Risks". *Annual Review of Public Health*. 31:179–94
- Hilgers, Mathieu. 2010. "The three anthropological approaches to neoliberalism". In the *International Social Science Journal*. Blackwell Publishing. 351-363.
- Hitchcock, K. Robert. 2020. "Ecotourism, Heritage Tourism and Community-Based Development in a Southern African Borderland." In *Bewildering Borders- The Economy of Conservation in Africa*, edited by Werner Zips and Manuela Zips Mairitsch. 61-90.
- Kelleher, Jennifer. 2020. "Communities, Conventions, and Conservation: The Spectrum of Participation and Power". In *Bewildering Borders- The Economy of Conservation in Africa*, edited by Werner Zips and Manuela Zips Mairitsch. 205-230.
- Kopnina, Helen. 2013. "Future Directions in Environmental Anthropology. Incorporating the Ethnography of Environmental Education". In *Environmental Anthropology, Future Directions*, edited by Helen Kopnina and Eleanor Shoreman-Ouimet. 77-95. UK. Routledge.
- Landscape and Waste Management Agency. 2009. *Environment Protection Regulations*. Accessed May 24 2023. Landscape and Waste Management Agency archives. Mahé
- Lewis, T. Tammy. 2011. "Global Civil Society and the Distribution of Environmental Goods:

- Funding for Environmental NGOs in Ecuador”. In *Environmental Inequalities Beyond Borders- Local Perspectives on Global Injustices*, edited by JoAnn Carmin and Julian Anyeman. 87-103. London. The MIT Press.
- Meiu, P. George. 2020. “Panics over Plastics: A Matter of Belonging in Kenya”. *American Anthropologist*. 122(2): 222–235
- Milton, Kay. 2002. *Environmentalism and Cultural Theory: Exploring the role of anthropology in environmental discourse*. Routledge Publishing.
- Ministry of Environment, Energy and Climate Change. 2018. “Seychelles National Waste Policy 2018-2023”. Accessed May 24 2023. Landscape and Waste Management Agency archives. Mahé.
- Mols, Andrik, Breusegem, V. Wim, Pitzner, Fredrik and Cowing, Michael. 2020. Solid Waste Masterplan for Seychelles (2020-2035): Delegation of the European Union to the Republic of Mauritius and to the Republic of Seychelles. Framework Contract SIEA 2018.
- Nixon, Rob. 2011. *Slow Violence and the Environmentalism of the Poor*. Harvard University.
- Omelewa, Michael. 2007. “Traditional African Modes of Education: Their Relevance in the Modern World”. *International Review of Education*. 53: 593-612.
- Pathak, Gauri. 2023. “Plastic Pollution and Plastics as Pollution in Mumbai, India”. *Ethnos. Journal of Anthropology*. 88(1): 167–186.
- Pattiaratchi, C., Mheen v.d. M., Schlundt, C., Narayanaswamy, E. B., Sura, A., Hajbane, S., White R., Kumar, N., and Fernandes, M. 2022. “Plastics in the Indian Ocean – sources, transport, distribution, and impacts”. Copernicus Publications.
- Peet, Richard and Watts, Michael. 2002. “Liberation Ecology-Development, sustainability, and environment in an age of market triumphalism”. In *Liberation Ecology-Environment, Development, Social movements*, edited by Richard Peet and Michael Watts. 1-46. New York. Routledge.
- Pellow, N. David. 2011. “Politics by Other Greens: The Importance of Transnational Environmental Justice Movement Networks”. In *Environmental Inequalities Beyond Borders- Local Perspectives on Global Injustices*, edited by JoAnn Carmin and Julian Anyeman. 247-265. London. The MIT Press.
- Raguain, JA. and Burt, AJ. 2019. “The Aldabra Clean-up Project. Tackling Ocean Plastic Pollution Through Action, Education and Research”. Accessed May 19 2023. Local journal. June 24, 2023. Praslin.
- Reno, Jashua. 2015. “Waste and Waste Management”. *The Annual Review of Anthropology*.

- Republic of Seychelles. Seychelles' Updated Nationally Determined Contribution: Submission under the Paris Agreement, July 2021. Accessed August 12, 2023. <https://unfccc.int/documents>
- Shizha, Edward. 2015. "Reclaiming Indigenous Cultures in Sub-Saharan African Education". In *Indigenous Education- Language, Culture and Identity*, edited by James W. Jacob, Sheng Yao Cheng, and Maureen K. Porter. 301-318. USA. Springer.
- Sterkl, Christian. 2020. "The Nature of Conservation: An Inquiry into the Practices of In and Exclusion of Local Communities in the Management and Benefits of iSimangaliso Wetland Park". In *Bewildering Borders- The Economy of Conservation in Africa*, edited by Werner Zips and Manuela Zips Mairitsch. 231-256.
- Spindler, Georg and Spindler Louise. 2000. *Fifty years of anthropology and education, 1950-2000: A Spindler Anthology*. Lawrence Erlbaum Associates.
- The Ocean Project Seychelles. 2019. "TOPNEWS". Accessed June 6, 2023. <https://www.theoceanprojectseychelles.com/news>
- The Ocean Project Seychelles. 2023. Captain Fanplastic in Seychelles Schools. Accessed as a first hand source. October 30, 2023. TOP archives. Mahé.
- UNEP. "Sustainable Development Strategy of Seychelles Action Plan 2012-2020 (Volume 2)." 2012. Accessed August 7, 2023. <https://faolex.fao.org/docs/pdf/sey185105.pdf>
- UNESCO.1978. "Intergovernmental Conference on Environmental Education. Final Report, 14-26 October 1997". Organized in co-operation with UNEP. Tbilisi (USSR). Paris.
- United Nations Framework Convention on Climate Change (UNFCCC). 1992. <https://unfccc.int/resource/docs/convkp/conveng.pdf>
- WIOMSA (Western Indian Ocean Marine Science Association), 2019. "Litter Catch Up: Marine Litter Monitoring Project Newsletter. October 2019".
- Zips, Werner and Mairitsch Z. Manuela. 2020. "Weathering the Storms". In *Bewildering Borders- The Economy of Conservation in Africa*, edited by Werner Zips and Manuela Zips Mairitsch. 303-342.

Interview List

Capricieuse, Ivan Ray and Gomme, Jason Edward. Fresh Focus. Praslin. Date: 19.05.2023

Harlay, Jerome. University of Seychelles. Mahé. Date: 18.05.2023

Wichmann, Stephanie. My Beach Project and Fresh Focus. Praslin. Date: 19.05.2023

Ducret, Irene. Seynoplasic. Mahé. Date: 11.05.2023

Gutser, Lara. SeyhellesBeachCleanup. Mahé. Date: 14.05.2023

Lau Tee, Estelle and Mondon, Camille. Landscape and Waste Management Agency (LWMA). Date: 17.05.2023

Solé, Racamora Magali, Alis, Victoria and Mascarenhas, Alice. The Ocean Project Seychelles (TOP). Date: 18.05.2023

Other Sources

Lawen, Alvania. Parley. Digital interview. Date: 12.08.2023

Anonymous. Program Director - D'Arros Research Centre Save Our Seas Foundation. Questionnaire. Date: 30.05.2023.

Anonymous. Project Director. Seynoplasic. Digital interview. Date: 04.08.2023

Figures

Figure 1- National News about TFOPW (<https://www.didem-project-en.org/13/tfopw>)

Figure 2-: Poster showing Unwanted Materials in Six Senses Hostel (photograph taken by author)

Figure 3- Purifying Tap Water Technology at Six Senses Hostel (photograph taken by author)

Figure 4- Refillable Glass Bottles at Six Senses Hostel (photograph taken by author)

Figure 5- TOP Infographic Billboard (photograph taken by author)

Figure 6-: News in Nation Info- CaptainFanPlastic (<https://www.nation.sc/articles/19249/top-brings-captain-fanplastic-initiative-to-primary-schools>)

7.APPENDIX

ABSTRACT

This thesis critically examines how non-governmental organizations (NGOs) impose Westernized ideas from the Global North to address environmental challenges in developing neoliberal states within the Global South, with a specific emphasis on plastic pollution. The study delves into the potential clashes and overshadowing of socio-cultural values, local practices, and perspectives emerging from post-colonialist debates. It explores the intricate power dynamics and potential conflicts between global and local approaches to addressing environmental challenges, with a particular focus on plastic pollution. Drawing on data and observations from fieldwork conducted in Seychelles, an archipelago country in the East African region, the thesis analyzes policies pursued by both state and non-state actors, taking into account the socio-cultural and economic conditions of the society. Through interview and participant observation methods, the primary objective is to investigate both internal and external/global factors influencing the ideologies and implementations of educational NGOs. The ethnographic focus of this study centers on the Ocean Project Seychelles (TOP) to unravel the humanitarian initiatives and discourses initiated by environmental NGOs in Seychelles.

Keywords: Environmental Education, Plastic Pollution, Non-governmental Organizations, Waste Management, Post-colonialism, Humanitarianism

ABSTRAKT

In dieser Arbeit wird kritisch untersucht, wie Nichtregierungsorganisationen (NRO) westliche Ideen aus dem Globalen Norden zur Bewältigung von Umweltproblemen in neoliberalen Entwicklungsländern des Globalen Südens durchsetzen, wobei der Schwerpunkt auf der Plastikverschmutzung liegt. Die Studie befasst sich mit den potenziellen Konflikten und der Überlagerung von soziokulturellen Werten, lokalen Praktiken und Perspektiven, die sich aus postkolonialistischen Debatten ergeben. Sie untersucht die komplizierte Machtdynamik und die potenziellen Konflikte zwischen globalen und lokalen Ansätzen zur Bewältigung von Umweltproblemen, mit besonderem Schwerpunkt auf der Plastikverschmutzung. Die Arbeit stützt sich auf Daten und Beobachtungen aus Feldforschungen auf den Seychellen, einem Inselstaat in Ostafrika, und analysiert die von staatlichen und nichtstaatlichen Akteuren verfolgte Politik unter Berücksichtigung der soziokulturellen und wirtschaftlichen Bedingungen der Gesellschaft. Mit Hilfe von Interviews und teilnehmender Beobachtung sollen sowohl interne als auch externe/globale Faktoren untersucht werden, die die Ideologien und die Umsetzung der Bildungs-NGOs beeinflussen. Der ethnografische Schwerpunkt dieser Studie liegt auf dem Ocean Project Seychelles (TOP), um die von Umwelt-NGOs auf den Seychellen initiierten humanitären Initiativen und Diskurse zu entschlüsseln.

Stichworte: Umwelterziehung, Plastikverschmutzung, Nichtregierungsorganisationen, Abfallwirtschaft, Postkolonialismus, Humanitarismus.