

Sustainable Marketing

A Consulting Manual

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Abstract

Due to the current environmental state the shift from conventional business actions like production, manufacturing and design, towards environmentally sustainable business actions is more needed than ever. This change should flow into all companies' departments, including marketing. Research confirms that for a significant improvement of sustainable behavior, institutions and companies of all sizes are required to educate about environmental awareness, provide chances for environmental behavior and guide the consumers towards sustainable choices and an environmentally compatible lifestyle. This thesis comprises a literature review on sustainable marketing and its most crucial functions, as well as a manual that will help small companies and start ups to implement sustainable marketing into their daily business actions.

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1 Introduction

As a result of current environmental issues like global warming and resource scarcity, the importance of applying environmental compatibility into the processes of a company is increasing. This thesis aims at providing a consulting manual about the implementation of sustainable marketing to small companies. The theory chapter outlines the functions of sustainable marketing by reviewing relevant literature of the past four decades. To align the content of the manual to the necessities of small-scale businesses in Finland and Germany, consultation was carried out with Finnish and German representatives of small businesses.

1.1 Motivation

The topic of this thesis derives from a personal background. Being exposed to numerous alerting scientific prognoses about the future of the planet's ecosystems, as well as experiencing the effects of global warming out of firsthand, manifested a deep awareness of the presence of human made marine and terrestrial ecological problems. Additionally, this generated a high sense of responsibility of personal actions and motivated to support the needed decrease of carbon dioxide emissions in order to lower the negative impact on future generations. The participation in a study program that highly emphasized the importance of marketing in entrepreneurship, established a strong interest for the implementation of strategies that influence consumers towards increasing their consumption to the liking of a business. The topic of this thesis combines both passions and answers the curiosity of how sustainability can be compatible with marketing. By providing a manual of how to implement sustainable marketing to small companies, even such are able to join the protection of our home planet, through lowering the negative impact of their business actions on ecosystems.

1.2 Necessity of Environmental Consciousness and a More Sustainable Economy

In the 19th Century Alexander von Humboldt, an explorer, scientist and naturalist conducted worldwide expeditions. One of his major findings on his expeditions through north and south America was that all species of the flora and fauna of the planet are interconnected in a system. He was the first to acknowledge that all species of plants and

animals are dependent on each other, adjusted to each other and their geographical conditions, as well as constitute a perfectly attune system, called nature. Furthermore, he recognized a huge dependency of eco-systems and the climate on nature's forests. He also predicted catastrophic consequences on the eco-systems and climate, if humans were to bring eco-systems such as forests out of balance. In this context, he phrased the human-induced climate change and predicted the danger of it, also for humankind. (Humboldt, 1829, p. 116) (Humboldt, 1800, p. 216) However, in his lifetime the society was of the opinion that the natural environment existed for the use of human beings and represented a chaotic conglomeration that must be put into order by mankind. Already back then natural systems were put out of balance by agricultural practices, for example for the utilization of wood as main source of energy (Schulz, 1993, p. 413).

Since the explorer journeys of Humboldt until today a lot but also very few has changed. The natural environment is not anymore seen as a chaotic system that needs to be put into order. Much rather scientists continued Humboldt's work to find out more about the correlations of nature and the climate, as well as the correlation between carbon dioxide levels in the atmosphere and the climate, now and in the past 800.000 years. Scientific institutions were also able to determine specific consequences a human-induced climate change would have on the world and its inhabitants. However, nature still has to face major impairments and pressure issued by humans. While evidence is provided that human species depend on functioning eco systems, numerous industrial parties make use of nature to generate the most possible profit out of their businesses. Inter alia exploiting resources, producing polluting emissions and disposing waste in oceans and landfills to the point where species are rendering extinct and entire natural systems are collapsing, has become daily practice. Unquestionably, consumers have to bear part of the blame, as consumption habits have developed into a materialistic, global and from the roots disconnected consumerism. This consumerism consists of accumulating goods far beyond our needs, while inducing emissions and waste flowing into the natural environment.

Since pre industrial times the average global temperature rose by 1°C , induced by human actions and will reach 1.5°C between 2030 and 2052 (Masson-Delmotte, et al., 2018, p. 8). This current situation of the planet, which was solely reached by human beings unsustainably pumping greenhouse gas emissions (= carbon dioxide, methane, nitrous oxide and fluorinated gases) into the atmosphere, is already alarming. Due to this global warming, climate already became more extreme, putting in danger species and humans with intense cyclones, rain bombs, flooding and forest fires all over the world. The

temperature rise of 1.5°C, that is predicted for the near future, according to the Intergovernmental Panel on Climate Change (IPCC), involves risks on natural and human systems that vary in their severity, depending on the extent, the velocity, geographical location, the level of development and vulnerability of the region, as well as the execution of adjustment and reduction measures in the according locations (Masson-Delmotte, et al., 2018, p. 9). One of the most significant findings in the last 20 years was that the countries likely to be the most impacted by global warming are the developing countries that are the least guilty of this climate change, including countries in Sub-Saharan Africa, South and South East Asia (Wade & Jennings, 2016, p. 7). Furthermore, scientists prospect impacts such as the expansion of arid climate zones and contraction of polar climate zones, as well as decreasing biodiversity, impacting human health, food systems and infrastructure (Arneeth, et al., 2020). However, also impacts on economies around the world are prognosed, including a weakened economic growth, issued by decreases in labor productivity, damaged capital stocks and higher inflation due to the rise of basic living costs (Wade & Jennings, 2016, p. 10). Ironically, manufacturing industries of the world contribute tremendously to this uneconomical development, by making up almost 20% of all anthropogenic carbon dioxide emissions worldwide (Ritchie & Roser, 2017). Institutions and organizations have to start acting in favor of the natural environment now, instead of putting their long-lasting profitability and consumer demand at danger, which they highly depend on. Therefore, sustainable behavior will secure a production that is independent of resource scarcity and prepares for upcoming governmental regulations that are part of highly necessary mitigation programs. It will also stabilize demand and a positive image of the company amongst generation Y on the long term. While baby boomers, generation X and generation Y don't differ in their sustainable consumption, the high purchasing power of generation Y makes it significant to listen to their wants and purchasing motivation. Research has proven that there is a high need of institutions and companies to guide their consumers towards sustainable actions, as their will is there. This entails investing in environmental awareness and education programs, which demonstrate ways for consumers to exercise environmental responsibility. (Severo, et al., 2018)

The current situation urgently demands for the integration of sustainability in every department of organizations of all sizes. Incorporating the sustainable paradigm into the core values of their business and reducing the contribution to global warming, instead of waiting for futuristic technological progresses that could potentially help overcome impacts of global warming, should be the main vision of all industrial parties. Finally,

companies around the world need to realize that acting in favor of the natural environment is no social engagement, neither an altruistic action, but much rather an act in their own favor.

1.3 Methodical Approach of the Thesis

The thesis contains a theoretical chapter, as well as a manual called “Sustainable Marketing – A Consulting Manual”, provided as an appendix. The theory chapter explains the principles of sustainable marketing, as well as the actions that a company needs to carry out in order to manifest sustainable marketing in its business. In the course of writing this chapter, knowledge and data were conducted from relevant literature including books, scientific journals and research studies. The manual, provided as an appendix, includes the findings of the theory chapter and outlines the information in a way in which companies are able to efficiently conduct knowledge and implement it into their actions. The manual should give incentives for alternative approaches as well as provide reassurance in ongoing processes.

2 Sustainable Marketing

“The Introduction of genuinely sustainable products into economic systems would be a major solution to pollution.” (Fuller, 1999, p. 130)

As outlined in the introduction and stated by Fuller (1999), there is a high need for companies to start acting in favor of the ecological environment, as it will counteract many negative impacts prospected for the future. Marketing, as a major component of companies, was subject to ecological and socio-economic challenges in the last 50 years. As a result of major manmade environmental catastrophes and the acknowledgement of the importance of the natural environment, companies started to manifest social and ecological responsibility in their corporate values in the 1970s. While companies started to shift their operations and products towards actions that were compatible with the natural environment, their approach towards consumers had to be aligned to their holistic perspectives as well. Alternative forms of marketing arose, like green marketing, social marketing and sustainable marketing.

Sustainable Marketing is a form of marketing that specializes on facilitating the consumption of sustainable products. In addition to the usual objectives of reaching

profitability and providing added value to the consumer, a company that implements sustainable marketing seeks for implementing environmental compatibility into the design, manufacturing and consumption of the product. To give the impact that companies have on the natural environment a name, the term “eco-costs” was established. Eco-costs describe the amount of pollution, including carbon dioxide emissions, manufacturing waste and consumption waste, as well as the amount of resources that a company exploits from the planet. In today’s economy it is a normal practice to not pay for these costs. Other than lax regulations issued by governmental bodies, the environment is often neither a respected nor protected system. A company that implements sustainable marketing seeks for either paying for its eco costs, by making up for the environmental harm, or minimize them to the least possible amount. While the main objective of achieving sustainability is in favor of the environment and therefore humanity, sustainable marketing is not a form of altruism. The company still seeks for their financial objectives and facilitating the consumption of their product with their marketing functions. The sustainable paradigm influences the entire company in each step of the product life cycle and should be deeply incorporated in the company’s values. Sustainable marketing also makes use of the sustainable consumer segment that is currently rising, as the discussion about the necessity of lowering the environmental impact of both consumers and companies are more present than ever in media, these days. Furthermore, the increased significance for consumers of aligning their personal values with the ones of the companies is encountered by applying sustainable marketing. Lastly, sustainable marketing is not an excluding concept towards conventional marketing. Moreover, it is a modification of conventional marketing that only accepts processes that holistically fulfill the aspects of environmental sustainability. However, shifting to sustainability does not only concern the marketing team of a business. In times where resources needed for production are scarce and finite, sustainable marketing leads the way to make companies independent of this issue, by for example seeking for the sole implementation of sustainable material. The entire organization shifts towards sustainability and absorbs the sustainable paradigm into its core values, missions and execution.

2.1 Sustainable Marketing Strategies and Marketing Mix

For successful sustainable marketing a company should turn their sustainable marketing values into a commercially viable strategy. (Belz & Peattie, 2012, p. 140) Similarly to conventional marketing, strategies in sustainable marketing serve the achievement of the long-term goals of an organization. While taking into consideration the available and necessary tools and resources, and the activities that need to be carried out, every company's strategy is unique. As mentioned, by implementing a strategy to the sustainable marketing department a company will be able to approach its goals in a tactical and planned manner. Therefore, it is crucial to manifest the objectives that need to be achieved by the sustainable marketing team, first.

2.1.1 Sustainable Marketing Objectives

“Sustainable marketing tries not just to satisfy wants and meet needs but also to generate opportunities and happiness and to achieve lasting satisfaction.” (Belz & Peattie, 2012, p. 122)

As Belz describes, a company that implements sustainable marketing aims for selling a product or service that adds value to consumers' lives as well as works towards achieving certain financial goals. Additionally, the company strives for compatibility with and protection of the natural environment, throughout the whole lifecycle of the product. Unlike green-washing, in sustainable marketing the company genuinely implements actions into their operational business processes that reduce eco-system polluting factors.

Therefore, creating added value, achieving financial goals and acting sustainably are the three main objectives of sustainable marketing.

Changes towards manifesting sustainability in every business activity, including marketing, not only affect issues within the organization but also between organizations alongside the whole supply chain. As Fuller (1999) states in his book, the objectives of a company with sustainable marketing are directly linked to the elements of the marketing mix of the company. Therefore, according to the first element of the mix: “product”, the first objective entails disestablishing waste and

pollution alongside the whole product life cycle of the product or service that is to be sold. Being sustainable throughout the product life cycle entails making decisions about product attributes and manufacturing processes, as well as creating waste programs for disposal post consumption. (Fuller, 1999, pp. 112-113)

The objective within the element “place” is to distribute the product in a sustainable manner, thus minimizing the waste and pollution generated by the transportation, storage, and handling of recaptured products and materials. Here, again, adjustments are likely to affect stakeholders of the supply chain. The third objective derives from the element “promotion” and regards the promotion and communication of the product or service. The objective is to communicate the sustainable vision and the necessity to act sustainably to all of the company’s stakeholders. In this context, the marketing department should strive for being the educator and implementer of sustainable marketing inside and outside the company. This can be achieved *inter alia* by providing stakeholders with information about environmental concerns that will trigger/motivate environmentally friendly consumer behavior. The last objective is obtained from the element “price”. Here the main goal is to include eco-costs into pricing and assign eco-costs to the corresponding product and origin. (Fuller, 1999, pp. 112-113)

2.1.2 Sustainable Marketing Strategy Setting

To come up with a unique strategy that fits the organization Fuller (1999) recommends using the “business as usual” model. This model provides the setting for sustainable marketing management and helps taking into account all relevant factors when developing a strategy.

When making decisions within the five elements of the setting a marketer should subsequently go through the three phases of decision-making: planning, implementing and controlling (Fuller, 1999, pp. 77-78). The first decision-making phase “planning” should determine information about the scope of the decision and the reason why the decision has to be made. The second phase “implementing” includes setting information about what actions need to be taken in order to carry out the plan, as well as who will carry out the action where and when. In the last phase the decision maker should document the progress of the plan, and make adjustments on time, if needed. (Fuller, 1999, pp. 77-79)

The “business as usual” model includes five elements: (1) target market, (2) marketing mix, (3) company resources, (4) external factors and (5) decision boundaries. (Fuller, 1999, p. 78).

For sustainable marketing this framework can be adapted, however changes have to be made regarding the external factors, the marketing mix and the decision boundaries. The first change concerns the physical external environment of the decision process. In conventional marketing the external decision environment consists solely of the traditional external factors like sociology, economy, technology, and politics. For sustainable marketing the ecosystem is adapted as an additional frame around these traditional external factors. As a result, the ecosystem should at all times be considered in and be a part of decision making, as well as the goal of paying all eco costs that arise throughout the value creating process. The second change concerns the main objective of the marketing mix of the business. It is critical now to not only achieve *customer satisfaction* and *organizational goals*, but also the *compatibility* of the value creating process with the ecosystems. Fuller (1999) describes these three aspects as marketing mix decision criteria. He also states that the marketing mix is the core point where pollution and ecosystem degradation linked to consumption stem from. The third change involves the decision boundaries of the marketing setting, which conventionally concerns “only” the immediate channel network, without taking into consideration former and latter events. In sustainable marketing the decision boundaries evolve to a much broader frame, thus the whole product system lifecycle and entire organization. (Fuller, 1999, pp. 80-81)

2.1.3 Integrated Waste Management and Design for Environment

Throughout his book, Fuller introduces two concepts as the source of all sustainable marketing strategies: The *Integrated Waste Management* hierarchy and the *Design For Environment* process (Fuller, 1999, pp. 86-90). As mentioned in the introduction an especially important field of sustainable marketing is the production and handling of waste.

The Integrated Waste Management (IWM) Hierarchy is a framework that includes three approaches to the handling of pollution and waste, all complying with the goal of a more sustainable business and Product System Lifecycle. The three approaches are: pollution prevention, resource recovery and terminal disposal (P2, R2, TD). Each

component of the hierarchy has a different level of effectiveness in reducing pollution and waste, as well as towards overall sustainability. Pollution Prevention stands for the measures that are taken in order to prevent any kind of pollution flowing into the environment during the product system lifecycle. These can include substituting packaging material or manufacturing processes with alternatives that generate less air pollution, water pollution and soil pollution. In resource recovery strategies a company implements sub strategies like product reuse, material recycling and materials transformation in order to responsibly handle finite resources and resource scarcity. (Fuller, 1999, pp. 86-87) Depending on the product life cycle position that the company works in, the opportunities and means of implementing R2 and P2 actions vary. Terminal Disposal stands for recycling, incinerating or streaming waste into the environment that was generated as a consequence of production and consumption of products. In sustainable marketing terminal disposal is in the best-case non-existent. As a result of implementing P2 and R2 strategies, terminal disposal should be reduced to a minimum, but still is tolerated as the last step of waste management. The hierarchy arranges the three approaches in decreasing eco-efficiency, and therefore can help prioritizing in decision-making in waste management.

The second concept is called “Design for Environment”. The concept derives from the idea of implementing aspects of environmental awareness into practices of product development. The goals of design for environment are environmental protection, human health and safety, and sustainable handling of natural resources (Fiksel, 2009, p. 6).

Fuller (1999) claims that any sustainable strategies used in sustainable marketing are developed and implemented in the design-for-environment process. According to him all marketing-mix elements and marketing strategies should pass through the procedure of design for environment in order to be environmentally sustainable (Fuller, 1999, p. 88).

2.1.4 Sustainable Marketing Mix

A crucial part of sustainable marketing is implementing pollution prevention and resource strategies in the marketing mix. This will lead the company to a sustainable state.

As the marketing mix describes all tools and activities that need to be carried out in order to meet the marketing objectives, its elements need to be adapted in order to manifest the sustainable paradigm in the company's marketing. With small modifications the 4Ps approach to the marketing mix by Jerome McCarthy (1960) can also be used in sustainable marketing. The first element "product" stands for the activity of dedicating the design and development of the product or service to the benefit of the consumer. In conventional marketing the interest of the consumer and his needs stand in focus. In contrast in the sustainable marketing mix "product" stands for dedicating the product to meet the needs of the consumer as well as the needs of the environment. Therefore, creating customer and ecological benefits should stand in focus. (Fuller, 1999, p. 111) The second p, "place" stands for distributing and placing the product or service in the market, while considering the distribution channels and means of accessing the product (or service). In sustainable marketing this element of the marketing mix should be screened for possible ways to implement pollution prevention or resource reduction actions, while prolonging the distribution perspective across the whole product system life cycle. Fuller also suggests (1999) the addition of a "green factor" in the selection of a new supplier or channel member. The next element of the mix is "promotion" and usually stands for communicating the benefits of the goods to the consumers. In the sustainable marketing mix this element also entails informing the consumer about the ecological benefits of the product or service, and in the end trigger sustainable consumption behavior. The chapter sustainable consumer behavior sets out several means of pursuing this goal. Alike the second P, this element calls for a longer perspective along the whole PSLC, as communication is not only needed before and while consumption, but also while disposal or "reuse programs". The fourth p, standing for "price", includes which pricing strategies are implemented, generally with the goal of meeting the costs of the product and creating a certain product value perception in the consumers' minds. However, in sustainable marketing an additional component influences the pricing decision: the eco-costs. A product should come up for the ecological price it pays during development, production, consumption and disposal, thus during the whole PSLC. According to Fuller (1999), by applying activity-based costing, eco-costs should be allocated to the product that is responsible for them. An implication for a working sustainable marketing strategy is that the organization truly identifies with the concerns about sustainability and the environment. By taking

into account the sustainable aspect in every element of the sustainable marketing mix a company can manifest this sustainable identity.

2.1.5 Implications for Changing From Conventional to Sustainable Marketing

In his book Fuller (1999) presents the 10 Step Plan by McDaniel & Rylander (1993), as guide for the transition from conventional marketing to sustainable marketing. The first step entails manifesting the sustainable paradigm in the company's corporate policy, so that mission, vision, objectives and operational activity align with each other. Secondly the company should establish a lengthy sustainable focus in the leadership / top / executives of organization. In the next step, Mc Daniel and Rylander advise the organization to set managers or whole departments that are responsible of the sustainable aspect in the company. Here the marketing department could possibly overtake the initiative and leading role. Furthermore, a company should educate and inform all organizational members about ecological issues and the necessity of acting in favor of the environment. The fifth step of the transition process entails the active communication with external stakeholders, like environmental groups and government agencies", in order to capture their needs and agitation (Fuller, 1999, p. 115). As per the next two steps the company should come up with an "environmental action plan" and then include every department of the company into the needed sustainable actions. This calls for fostering dialogue between the departments. The eighth step includes appropriate resource allocation of for example money and personnel, according to the cause. In the last two steps a company should communicate its sustainable product and provide required information to its consumers, in order to enhance sustainable consumer behavior and overall environmental action. Additionally, the marketing department should observe the consumer behavior of the target groups, also by including "an active marketing research program" and subsequently adapting it to new needs. (Mc Daniel & Rylander, 1993) (Fuller, 1999, p. 115)

2.1.6 Sustainable Marketing Strategy Development

When developing a sustainable marketing strategy, the marketing team should first set the objectives and the environment of the strategy, as described above. When this basic setting is determined the marketing team should, as Belz and Peattie (2012)

suggest, visualize two questions: “Which markets should we compete in?” and “How should we compete, within these markets?”. The answers to these questions should play a crucial role in the strategy. In his book “Sustainability Marketing” Belz and Peattie (2012) present a five-step strategy development plan, that can support a marketing team to come up with a unique sustainable marketing. (Belz & Peattie, 2012, pp. 147-148)

1. Screening Sustainable Issues and Actors

In the first step, the marketing team has to review organizational processes and the whole product system lifecycle, for sustainably improvable practices. Here the application of a life cycle analysis on the marketed product or service can highlight improvement opportunities. In this context, the marketing team should also screen the strategy setting for environmental issues and how experts, politics and the market process them. If an environmental issue or problem comes up it usually is first recognized by experts and then gets acknowledged by media. After that the issue either becomes subject to political / law regulations or gets directly addressed by the market. When politics don't get involved, environmental issues are directly dealt with by the market. This can happen by penetrating the market with regulated prices or giving incentives to consumers and producers to behave more ecological. (Belz & Peattie, 2012, p. 150) If the issue first gets addressed by law and politics and then by the market, the issue reaches the market in an indirect process, that entails releasing new regulations or laws, that need to be implemented in the processes of the company.

2. Segmenting Sustainable Markets

The second step entails dividing the market into smaller market segments. Segmenting the market according to homogenous consumer groups will help understand the motivation behind consumers' behavior, their needs and what it takes to satisfy them. In sustainability market segmentation the marketing team divides the consumer market into market segments, by the attributes geographic, demographic, psychographic and sustainable behavior. Segmenting a market by geographical attributes means dividing market segments into geographical regions like rural, suburban, urban areas, cities or countries. When segmenting by demography, which is the scientific study of the human population, a market is divided by age, gender, race, religion, education, occupation and income. (Belz & Peattie, 2012, p. 153)

Differences concerning sustainable consumer behavior in geographic and demographic groups can be observed. As an example, inhabitants of developed countries generally show weaker sustainable behavior than those of developing countries, simply because the inhabitants of developing countries might not have the financial force to consume and behave unsustainable on the bigger scale. However, attributes like race, ethnicity, age or geographical habitat are only weak predictors of sustainable consumer behavior and don't serve as reliable basis for a market analysis or marketing. A market can also be directly segmented by the sustainable consumer behavior and overall sustainable behavior of consumers. Attributes are for example the frequency of taking sustainable action and the reason or motivation (for example: functional benefits, prestige, positive conscience) behind consuming sustainably. In segmentation practices consumers can also be grouped by values and attributes towards lifestyle, health and sustainability. These factors are called psychographic factors. Consumers within segments or subgroups have similar/same sustainable product or service needs and reflect the same potential in demand. The marketing team should adapt their communication strategy according to the attributes of the target segment. In the best case the company finds one segment among all market segments that gets fully satisfied by the marketed product. Consequently, this segment constitutes a promising market opportunity for the company.

3. Introducing Sustainable Innovations

As mentioned at the beginning of this chapter a company with sustainable marketing includes ecological aspects into their entire business, just as into their value adding product and goods. Therefore, as third step of the strategy development process, the company introduces an innovative product that meets the needs of the consumer and is environmentally sustainable pre, during and post consumption. According to Belz (2012) and Tidd & Bessant (2009) there are four different types of innovations that can be introduced to the market. First, there is the sustainable innovation that consists of an already existing product that was improved in terms of ecological sustainability. The second type of innovation stands for a new product or service that was developed to constitute either a sustainable solution for an already existing problem or a sustainable alternative for an already existing product or service. As Belz suggests, the third type of innovation is an already existing sustainable product or service that is applied on a new market area. The fourth sustainable innovation consists of an innovative, sustainable contribution to an entire good system or

industry, and therefore boosts the overall sustainable development of a market significantly. Predominantly the economy right now needs the fourth kind of innovation, the most radical and effective innovation. (Belz & Peattie, 2012, p. 156) (Tidd, 2009, pp. 80-82)

Even though the economy has experienced a major shift towards eco compatibility and preservation of the natural environment, innovations of entire systems are required in order to completely decrease material and resource usage, whilst upholding the wealth and standard of living. (Belz & Peattie, 2012, p. 157)

4. Positioning Sustainable Products

In the fourth step the marketing team makes decisions on how to occupy a competitive position in the market with the marketed sustainable product or service. This entails deciding on the major sustainable attributes of the goods, e.g. energy efficient, waste free or CO2 neutral and their traditional attributes like performance and price. These factors describe how the good differentiates from other goods on the market. Besides that, the marketing team makes decisions according to the competitive advantage over conventional goods and on how the added value can be communicated next to conventional products.

Applied on products or services every balance of sustainability, price and performance appeals on different consumer groups or market segments.

In order to achieve eco system compatibility a company can either just improve products environmentally (mostly resource reduction actions) or fully reinvent products environmentally (mostly pollution prevention actions). In his book, Fuller (1999) summarizes which strategies should be applied in which cases. According to the Matrix “Environmentally Improved and Reinvented Products Strategy Matrix (Fuller, 1999, p. 105) Adapted from Ansoff Matrix”, an improved product is placed in current markets by penetrating the market and adapting a “product improvement strategy”. When placing an improved product in a new market a market development strategy should be applied. In order to settle a reinvented product in current markets a “product development strategy” should be adapted. Whereas, in order to place a reinvented product in a new market, a “diversification strategy” should be applied. (Fuller, 1999, p. 115) (Ansoff, 1957, p. 114)

5. Partnering with Sustainable Stakeholders

Selling a sustainable product requires not only analyzing consumers’ behavior and needs but also working with supply chain members that are crucial for the

development process, as well as government and law bodies. Especially when co-innovation processes take place, taking care of relationships with stakeholders, beyond consumers, should be a priority in the sustainable marketing strategy. Therefore, important factors are balancing claims and interests of stakeholder, managing conflicts, obeying ecological regulations set by the government, and staying in touch with ecological institutions. (Belz & Peattie, 2012, p. 162)

2.1.7 Sustainable Marketing Strategies in the Manual

As implementing a unique strategy into the processes of a company is crucial for achieving businesses' objectives, this chapter is reproduced in the manual. However, modifications were made according to the wording and the format for purposes of precision and vividness. For example, at the beginning of the chapter the logic of using a strategy is formulized with numbered bullet points and the sustainable marketing objectives are rewritten in bullet points in imperative speech. Furthermore, the business setting is depicted in a figure and the changes that implicate the sustainable perspective are listed below.

2.2 Sustainable Product Design

In most companies the product or service is the core of the business, constituting the principle benefit and value adding object for the consumer. In sustainable marketing the product plays an especially important role, as its development and design is the unique point of leverage from which to address environmental problems (Fuller, 1999, p. 129). Therefore the product is the most important element out of all four of the sustainable marketing mix, to reach sustainability in the business (Fuller, 1999, p. 130). To align product design with the sustainable marketing principles, the attributes of the product should be chosen in a way that it won't entail harming the natural environment in the development, production, consumption and post consumption stage of the product.

2.2.1 Prerequisites for Sustainable Product Design

According to Belz and Peattie (2012), in the course of designing a product or service the focus should be on the problem-solving perspective. "The challenge for sustainable marketers is to solve the direct problems of consumers' everyday living and their needs,

while also improving (social) and environmental performance.” (Belz & Peattie, 2012, p. 175) Therefore, the goal should be to create an innovative product that solves a problem in the consumer’s life, while being environmentally sustainable. Hereby the positive side effect of designing for the environment is that possible alternatives for designing this innovation are narrowed down significantly, which will result in higher efficiency in the development of the product. As suggested by Fuller (1999), any flaws in the environmental performance of the product, will not only conflict with other product’s attributes but also equate to a quality defect, which could instantly result in negative consumer satisfaction. Therefore, designing a product that meets the core benefits for consumers, the profitability needs of a company and environmental compatibility, should stay the main objective of sustainable product design. Balancing all three factors simultaneously may require strong cross functional communication between currently available science and the design team of the company (Reay, et al., 2011, p. 7). In some cases, “exnovation” might be needed, which means taking away old products that are outdated in their performance or in their material composition, in order to focus on new products or new processes. (Kimberly, 1981)

In product design and development, the attributes that make up the product are manifested. According to Fuller (1999), a product constitutes of a bundle of attributes. In this context attributes can be intangible or tangible and core or auxiliary. Intangible attributes are characteristics like durability, quality, CO₂ neutrality, climatic neutrality or low waste. Tangible attributes are aesthetical factors such as color, size, weight or material composition. These attributes then categorize again into core attributes, which are basic benefits of the product that repeat within product categories or auxiliary attributes, which are supplementary benefits and differentiate product versions from each other (d’Amico & Zikmund, 1993). By continuously envisioning if the consumer would perceive the product with its set attributes as eco-friendly and not environmentally damaging, the design team can assess if adjustments in the product’s attributes are necessary along the way. However, it is important to note that the perception of a product does not solely depend on the product’s attributes, but on various other factors like the company’s brand and its marketing communication strategy.

The bundle of attributes and benefits that are manifested within the product by the design team, will determine function and form of product, which will again determine waste streams, pollution and energy consumption alongside the product life cycle. Therefore, low technology adaptations and innovational components such as sustainable materials should be

integrated into the attributes of a product. Furthermore, while designing a sustainable product, companies may have to make tradeoffs between ecological attributes. Concretely this means that some attributes are conflicting and can't be implemented in the product at the same time. A classic example is the conflict between low material intensity and high durability. Durable products require a higher material intensity, in order to last longer, which would not suit a low material intensity attribute. Both attributes have the same sustainable intention but carried out they will conflict in the material composition of the product. In these cases, attributes need to be weighed up against each other, in consideration of their impact on ecological sustainability and product performance.

2.2.2 Cradle-to-Grave Product Life Cycle

While in conventional marketing the emphasis is on selling and consumption, sustainable marketing also takes into consideration production and post consumption, thus disposal. Here the product life cycle approach broadens the view on the life of a product and therefore includes all stages between the extraction of raw materials and the very last stage of the product: the post usage stage. This approach is also called Cradle-to-Grave approach and acknowledges every step of the products life as equally important for applying sustainable action. The goal of sustainable product design is that each of the steps from cradle to grave are as environmentally sustainable as possible. The steps of the Cradle-to-Grave product life cycle are: (1) Extraction of raw materials, (2) Transportation, (3) Manufacturing, (4) Distribution, (5) Consumption, and (6) Disposal. (Belz & Peattie, 2012, p. 62)

Stages (1) – (5)

Throughout the entire cradle-to-grave cycle the marketing team should implement simplifying, reducing and investing actions. In the first stages of the life cycle, especially in extraction of raw materials and manufacturing the resources that are implemented into the product should be reduced to the absolute minimum. The task of the product design team is to design the benefits, function and form of the product in a way that a sustainable composition of materials and production is possible, given the available technologies and resources. This includes reducing the materials and processes needed for the product to meet its benefits substantially (Fuller, 1999, p. 144). To meet the sustainable paradigm the extraction of finite or even scarce resources, or the implementation of toxic material should be avoided regardless. Furthermore, dissipative processes, which are processes that include

resources that can not be recovered at a later stage, should be substituted or suspended and unnecessary complex processes simplified. Other sustainable factors to implement in manufacturing processes are waste stream reducing strategies and reduced energy consumption. To form further stages like distribution and consumption equally as sustainable, the company should dematerialize the packaging, as well as design a light weight and downsized product if feasible. Fuller (1999, p. 82) suggests implementing three principles in sustainable product design that will lead to dematerializing: (1) buy products in large, economy sized packages, (2) buy products in concentrated forms, (3) buy products with the fewest layers of packaging. Reducing the amount of used materials and avoiding the implementation of toxic materials will also have a positive impact on the inventory and storage processes of a business. Storing less amount of goods and only dealing with harmless substances, will reduce needed place and cost, as well as moderate risks of accidents and spills (Fuller, 1999, p. 142). Here again the strategic concept of design for environment, that was mentioned in chapter 2.1.3 can be applied.

Stage (6)

Traditionally this stage of the product life cycle consists of the practical disposal of the product, as the consumer can't make use of the product anymore. Implementing the sustainable paradigm in this stage, calls for a design that reduces the waste significantly or makes the disposal of the product obsolete. Terminal disposal where products are dumped on landfills should not be seen as an option as it is highly unsustainable and environmentally damaging. Generally, the sustainable design team should aim for a product that has a longer life span than alternative products, by making it physically durable. Additionally, technological or lifestyle trends should be observed and considered while product design to ensure that the product won't turn obsolete too soon, because of technological innovations and lifestyle shifts. Upgradable or adaptable features can help the product to withstand future innovations and trends, and grow with time. Here the consumer should be provided with necessary information to carry out upgrading actions by themselves. A second option is to provide the consumer with product take back programs. Through such programs consumers will be able to return their product post usage and enable the company to reuse the product or its resources for remanufacturing, reconditioning and repairing (Fuller, 1999, p. 97). Hereby the design team should look out for a product design that will make disassembly and reassembly uncomplicated. To make packaging reusable for consumers, an easy opening packaging should be designed (Baxter & Childs, 2017, pp. 391-404). After all, in order to make resource recovery possible an

upfront investment into the quality of used materials might be necessary. This will enhance durability of the material and prepare it for repeated handling. Depending on the product type, methods like product sharing, also called use-oriented service, can be implemented as a more sustainable alternative to the traditional ownership. If the benefits of a product do not derive from being owned by one single consumer and the product is not being used 24/7 by the consumer (e.g. chainsaw) the available capacity can be split up upon several consumers, in other words the product can be shared by several consumers throughout its product life cycle. This will shift the product from being traditionally owned by one consumer, to a product as a service (Fuller, 1999, p. 82). A study introduced by Schrader, at the University of Hannover examined 200 to 300 participants of different wage categories in their acceptance of sharing a product as a service, instead of traditionally owning it. Overall, the participants showed a basically high acceptance towards use-oriented services, that have sustainable and ecological intentions. A small proportion of participants reported a feeling of lack and poverty when consuming shared products, which could reduce the willingness to consume mentioned goods. (Schader, 1998, pp. 11-29) This should be made up by an excellent price-performance ratio of the use-oriented service, including attributes like easy implementation and accessibility. Another option for reducing disposal in this stage is to make products more durable. The idea is to increase the life span of a product as much as possible through highly qualitative material and composition. As proposed in subchapter 2.2.1 this could entail increasing the material intensity. However, the goal is to enhance the lifetime of the product to the point where the positive impact of non-disposal is higher than the negative impact of the higher material intensity. The last alternative to traditional disposal is biodegrading and composting. To make this disposal feasible a product should consist of biodegradable material, such as cellulose fibers or biodegradable polymers.

2.2.3 Life Cycle Assessment

Throughout sustainable product design a company can make use of several practical tools that simplify the assessment/analysis of the sustainability of resources or actions implicated in the product life cycle of new or existing products. Databases like “ecoinvent” (Website Link: www.ecoinvent.org) provide information about the environmental impact of numerous products of different industry sectors and offer Life Cycle Assessments. Environmental impacts can then be visualized for example by assessing the water or carbon footprint of a product’s whole life cycle. With the gained knowledge the company

will be able to make out flaws and spots of possible improvement concerning the environmental impact of the product. Furthermore, a company can implement strategies like resource productivity, with the help of worksheets, provided by Lettenmeier et al and the Wuppertal Institute (Website Link: [https://www.econstor.eu/handle/10419/59292/.](https://www.econstor.eu/handle/10419/59292/)) (Lettenmeier, et al., 2009, p. 6).

The Cradle to Cradle concept (C2C), is a certification, developed by Braungart and McDonough. The concept seeks for a product design that enables the product's components to infinitely circulate in the natural environment. The materials that are implemented into the product are nontoxic for the environment and either recyclable or biologically decomposable. As a result, the products that followed the cradle-to-cradle concept minimize waste production. (Braungart & McDonough, 2003) A study conducted in New Zealand, reviewed the feasibility of the cradle-to-cradle framework in different industries, by approaching scientists from different scientific fields. (biological, material science/engineering, chemical and process science/engineering, pharmacology and active agent science, microbiology and textile science). The concept was seen as a positive approach towards sustainability, but also as challenging when implementing the concept into the business. Mostly the scientists emphasized the high necessity of scientific work, in order to come up with new sustainable innovations and fulfill the criteria for the cradle-to-cradle concept. However, this high collaboration with science is not always implementable for small companies. (Reay, et al., 2011, p. 7)

2.2.4 Sustainable Product Design in the Manual

This chapter begins with displaying the objectives that the implementer of sustainable product design should envision, in bullet points. Then the chapter introduces attributes, product life cycle and life cycle assessment to the reader by using short sentences and bullet points. Furthermore, for the purpose of visualization the different types of attributes are displayed in a tree structure and the six steps of the sustainable product life cycle are depicted in a circular figure.

2.3 Sustainable Consumer Behavior

Consumer behavior in general is very complex. Being influenced by a vast amount of extrinsic and intrinsic factors, consumers constantly vary in what, how much and how they buy (Frank Martin Belz, 2012, 80). As a marketer this makes consumer behavior especially

difficult to comprehend. However, for successful marketing it is critical to thoroughly understand consumers and their behavior. The same applies on sustainable marketing. Here, sustainable consumer behavior goes hand in hand with sustainable behavior, also called eco-behavior. Sustainable buying decisions are to an extent motivated by an overall ecological interest or the will of decreasing the negative impact on the natural environment, while consuming a product. Nevertheless, being concerned ecologically, doesn't automatically lead to consumption of sustainable products. Despite their awareness about environmental issues, people still don't act sustainably or purchase unsustainable products. Many researches have been subject to not finding a correlation between an environmental attitude and environmental behavior. This issue is called the "attitude-behavior gap". Observers like Carrigan and Attalla (2001, pp. 564-573) state that although consumers report favorable attitudes towards pro-environmental behaviors, they often do not subsequently display sustainable actions (Carrington, et al., 2010, p. 140) (Auger & Devinne, 2007). (Roberts, 1996, pp. 79-84) (White, et al., 2019, pp. 24-25) Therefore marketing research should not focus on self-reported attitudes or perceptions but on the actual actions, in the interest of finding meaningful results for the marketing of a sustainable product or service. In order to being able to explain sustainable consumer behavior, a combination of several studies and theories have to be taken into account.

Since the 1970s numerous empirical studies have been conducted with the goal of capturing the psychological background of sustainable consumer behavior and complementing consumer theories. The perspectives applied in these researches have changed throughout the last five decades. The focus of initial research agendas was predominantly on capturing the individual "green consumer" and his characteristics for segmentation purposes. However, between 1970 and 1990 several studies generated controversial results. Later, the research agenda shifted, taking into consideration external and psychological factors that have an influence on sustainable consumer behavior, such as the "self", as well as institutions and public policy. (Kilbourne & Beckmann, 1998). In her report, Trudel (2018, p. 85) states that in the past three decades, scientific studies about the psychological background of sustainable consumer behavior have been conducted with the focus on four different psychological drivers, three of which are cognitive barriers, the self and social influence.

2.3.1 Cognitive Barriers

In his book Sloman (1996, pp. 4-6), suggests that the human brain includes two systems that influence decision-making. The first system is based on intuitive and rather emotional feelings, whereas the second one is rational. As mentioned earlier the consumption of many sustainable products include some kind of compromise, whether because of a price premium or because of a lower efficiency. When a person needs to make a decision between such sustainable and unsustainable options, both systems will get into conflict. The intuitive system will long for the more comfortable option, the unsustainable one. Whereas the rational system will consider the sustainable option, as its rationally aware of the product's long-term better impacts on the environment. Hence, a sustainable marketing consumer strategy should generally aim for triggering the rational system, as it is able to persuade the decision making of a consumer into choosing the more sustainable option, after all. This can be achieved by for example providing the consumer with clear and credible information that reminds of the necessity of sustainable behavior and of how effectively the considered product pursues sustainability.

Next to the attitude-behavior gap, the biggest challenges in sustainable marketing is that the consumer usually does not recognize a safe environment without a climatic crisis and resource scarcity as a motivation to consume and act sustainably now. This might be due to the present bias that influences human decision-making. The present bias leads the human brain into prioritizing options that pay off closer in time over options that pay off in the future. (O'Donoghue & Rabin, 1999, pp. 105-110) When deciding whether to buy the unsustainable product that has immediate economic benefits, or the sustainable product that has a long term benefit on the environment, a consumer tends to buy the unsustainable product, because of the present bias. As a result of their research study, Zaval, Markowitz and Weber (2015, p. 232) recommend adapting a reinforced future focus in marketing communication in order to achieve sustainable behavior. In their field experiment a group of people was asked to think about what they would like to be remembered for and then was confronted with environmental issues that will occur in the future. As a result, more donations to an environmental charity were issued and pro environmental beliefs were increased. (Zaval, et al., 2015, p. 232) A future focus could be implemented by actively letting the consumers reflect on their current future plans and wishes and encouraging them to connect these thoughts to the environmental issues prospected for the future. In another study 251 Americans and Australians were asked if they perceived the weather on the day of the study as warmer or colder than usual. At the end of the questionnaire the participants

were given the opportunity to donate the fee that they earned by taking part in the study to an environmental charity. On days where the weather appeared to them warmer as usual, the concern about global warming by the consumers was higher. As a result, 63% of the participants who perceived the weather as warmer than usual donated to the charity against climate change, whereas of the participants who thought the weather was colder than usual only 24% donated. (Li, et al., 2011, pp. 5-11) This result confirms the effectiveness of connecting future issues to the present, as it will emphasize the high necessity of sustainable consumption and help overcome the present bias, in order to activate sustainable behavior.

2.3.2 The Self

Several studies and models of sustainable consumer behavior are based on the claim that every consumer has his individual values, preferences and beliefs. In psychological literacy this is described as the self. In the past, individual preferences have been seen as the single key determinant of both individual and aggregate consumption in the conventional consumer theory (Jackson, 2005, p. 15) Now, the self is accepted as being at least as influential on consumer behavior as individual preferences. As Sun and Trudel (2017, pp. 293-305) state in their report, self-conscious emotions have been found to influence pro social, pro environmental thoughts and behavior profoundly (Baumeister, et al., 1994) (Tracy & Robins, 2004) (Tracy, et al., 2007). The self is responsible for leading the consumer to taking into account social aspects like the outcomes of self-signaling (Bodner & Prelec, 2003, p. 105), self-discrepancy (Higgins, 1987, pp. 319-340), self-accountability, self-interest and reputation (Semmann, et al., 2005) while making consumption decisions. In the context of self-signaling and social desirability, a consumer might choose to buy sustainable products over buying others, in order to communicate his preferences and therefore make a (subjective) positive impression to his social environment and in the end gain positive reputation. Similar behavior can also be motivated by a discrepancy between the actual self and the ideal self, and the aim to achieve the ideal self, as explained in the theory of self-discrepancy (Higgins, 1987, pp. 319-340). The consumption of a sustainable product is therefore motivated by the self-discrepancy, if the ideal self is associated with the consumption of sustainable products. In this context a consumer, who wishes to be an environmentally friendly person, buys a product that is sustainable in order to become an environmentally friendly person. However, certain self-discrepancies can also discourage the consumption of sustainable products. In their field study Brough et al. (2016, p. 579),

for example found out that sustainable products are often associated with femininity. The link between femininity and sustainability could affect men's willingness to engage in sustainable products negatively, as some men don't associate femininity with their ideal self. This leads to the assumption that for successful marketing of a sustainable product, marketers should consider what their consumers identify as their ideal self and align characteristics of the products to it.

Another individual (self) factor that might motivate consumers to buy sustainably is self-accountability. What consumers feel committed towards, they will thrive to and hold themselves accountable for. Generally, guilt is associated with acting out of favor of the environment and pride with acting environmentally friendly. As Sun and Trudel found out in their experiment, the positive self-emotions that arise through the opportunity of recycling trash instead of simply wasting, motivated the consumer to use even more resources. (Sun & Trudel, 2017, pp. 293-305) In this context, People will hold themselves accountable for environmentally friendly behavior, in order to feel guilt free and consume sustainable products.

2.3.3 Social Influence

The above-mentioned factors all derive from the individual self, therefore are motivated by what the consumer thinks of him alone. However, consumers also tend to consider the group around them, reflect on its behavior and compare it to other group's behaviors. This collective social identity of the group is described as the collective self. Just like the individual self, the collective self is characterized by the general aim for having a positive view on their self and their group self. This aim alone can motivate collective consumer action. If there is a discrepancy between the positive acting of the self-group and the positive acting of an ought group (because the latter is acting even better), people of the self-group will increase their positive behavior in order to keep up with the ought group (White, et al., 2014, p. 434).

Other social factors that influence sustainable consumer behavior are social norms. According to Cialdini, Raymond and Kallgren social norms should be divided into two types, descriptive norms and injunctive norms. Social norms overall describe actions and behavior that we believe as normal and appropriate. These can include overall sustainable behavior, as mentioned by White et al. (2019, p. 25), like avoiding littering, composting and recycling, conserving energy, or in particular sustainable consumer behavior like

choosing sustainably sourced food, selecting eco-friendly transportation, choosing green hotels, and opting for solar panel. (White, et al., 2019, p. 25) However, descriptive norms give a detailed account of what people or most others typically do, whereas injunctive norms describe what people approve or disapprove of, in other words what they believe as acceptable or not (Goldstein, et al., 2008, pp. 472-473). In order to motivate sustainable consumer behavior both types of social norms can be made use of. In their research Goldstein et al. (2008, pp. 479-480) found out that messages with the aim of enforcing sustainable behavior, should include descriptive norms. The results of two field studies showed that the messages with information about descriptive norms had a higher positive impact on sustainable behavior of the participants, than messages only including information about the importance of environmentally friendly behavior. Therefore, including and emphasizing information about what sustainable actions fellow humans take, will more likely foster sustainable consumption in the recipient.

Considering all of the social factors that play into sustainable consumer behavior, it is important to make sustainable products or behaviors socially desirable and to buffer against potential negative perceptions linked to sustainable consumption, as White and her colleagues (2019, p. 25) suggest. As well as provide information about ecological issues and emphasize the benefits of action for the consumer himself now and in the future.

Sustainable consumer behavior is not solely motivated by the tangible factors of the product. Moreover it is motivated by a number of sociological, psychological and rational factors, as well as individual preferences (Belz & Peattie, 2012, pp. 79-83). By taking into account these factors, adapting a future focus and using situations like self-discrepancy, self-accountability and social desirability in one's favor, marketers can overcome barriers like the present bias and the attitude-behavior gap.

2.3.4 Sustainable Consumer Behavior in the Manual

In the manual this chapter begins by outlining the purpose and the objectives of analyzing the sustainable consumer behavior of the consumer segment. Then both barriers, the attitude-behavior gap and the cognitive barriers are set out, and the "self" and social influence are outlined as chances. The cognitive barriers include the present bias and system 1 and 2. Here, the reader is informed about what the barriers entail and how to overcome them, in short continuous text. The "self" is first explained briefly and then is laid out in a table that presents its divisions self-signaling, self-discrepancy and self-

accountability and shows ways how to use these effects for increasing sustainable consumer behavior. Lastly, the two functions of social influence are shown and how to use them to increase sustainable consumer behavior, as well.

2.4 Sustainable Marketing Communication

Marketing communication plays a big role in the sustainability of a business. While it doesn't have a major direct impact on the environment, as product design or the manufacturing of a product, it has a major influence on how the brand and product is perceived and on how actively consumers behave. By applying the right communication strategies, the company is able to distribute their sustainable products and provide alternatives to conventional goods, which will decrease the harm on the natural environment. The goal of sustainable marketing communication should be to positively influence the behavior of the company's stakeholders in the present and future and lead the consumer to making an informed choice, as well as keeping up the ecologically sustainable credibility of the product (Fuller, 1999, p. 223). Similarly, to other functions of sustainable marketing, the marketing communication should additionally envision fiscal objectives of a product or company.

One very demanding aspect of sustainable marketing communication is that it doesn't simply consist of a one-way information stream from the company to the consumer. Moreover, the communication of a company finds itself in a constant multidimensional dialogue about the economy and the environment with many participants like federal legislators, industrial parties, consumers, scientists and environmental lobbyists (Peattie, 1995, p. 211). Some of which act out of favor and some in favor of the business idea and will motivate sustainable consumer behavior. Additionally, the circumstances about environmental issues and concerns constantly change. With the stakeholders being the final target of the marketing communication, it is helpful to consider the daily information conglomerate that is available to them, which consists of a complex system of objective and subjective reports, and accurate and incorrect news. As well, the marketing team should try to understand their current knowledge stage, their perceptions and misconceptions about environmental issues. The entirety of information shapes the stakeholder's perception of sustainability and sustainable products and therefore influences their sustainable consumer behavior. In order to understand the daily information overload

and consider the observations in the communication of the sustainable product, it is especially meaningful to apply the second step of the sustainable marketing strategy development “market segmentation”, as the information load is individual for each consumer segment.

2.4.1 Sustainable Marketing Communication Message

To come up with a feasible message that triggers the desired consumer behavior, a company should determine the content of the message, the structure and format, and the source and channel that communicates the message (Kotler, 1997, p. 611).

2.4.2 Sustainable Marketing Communication Message Content

An important component of a message is the environmental information. If a company wants to use environmental issues and the need to act sustainable as a credible motivation for consumers to buy their products, they should urge to sustainable behavior as a whole. Sustainable marketers should reinforce informing about the current environmental issues and those prospected for the future, to build a stable information basis in the consumers' minds. According to Nicholas Rescher, (2005) neither instinct nor necessity is the determinative factor shaping humans' actions in this world, but each of these two factors influence choices they make on the basis of the information they are able to secure. This also can be applied to consumer behavior. Therefore, by manifesting current environmental issues in the marketing communication a marketer can make sure that the consumer is constantly informed to the point where it will motivate sustainable consumption. As mentioned in subchapter 4 important for motivating sustainable behavior in general, is providing the target group with information about current environmental issues, like global warming and future outlooks like human caused extinction of species. Additionally, a future focus should be adapted in the communication with consumers, as it will help overcome the present bias. Moreover, Davis (1993, pp. 21-22) gives recommendations that provide guidance in the design of the content of a sustainable communication message. The first suggestion is about the specificity of the message's content. Therefore, a message should be as specific as possible in both terminology and information. As mentioned earlier in the introduction of this subchapter, consumers and other stakeholders are subject to a major information flood on the daily basis. This can foster insecurity in deciding between what is sustainable or environmentally compatible and what is not. A specifically phrased message helps decrease this uncertainty, by fostering credibility and making

information easily understandable. Therefore the message should provide detailed information, clearly set out the benefits of the product and packaging, and lastly present the environmental performance of the product in a transparent manner (1993, pp. 21-22). Specific phrasing avoids terms like *less packaging*, *less waste* and *environmentally friendly* (Alnjacik & Alnjacik, 2012, p. 4). A study conducted by Alnjacik and Yilmaz (2012) measured the effectiveness of vague and specific advertisements, by introducing vaguely and specifically phrased print advertisements of ecologically sustainable products to 180 participants. The results of the study support Davis's suggestions as they showed how participants not only correctly perceive the specificity and vagueness of messages, but also are positively influenced by specificity in their purchase intentions. Another recommendation for generating content for sustainable marketing messages is to base the content on the consumer. This entails creating content that personally and emotionally touches the consumer, as well as emphasizes the importance of the individual acting in favor of the environment, thus making him or her feel as if he or she would be in control of the ecological situation.

A message can conclude different themes-appeals, that all aim to engage with a certain consumer target group. Appeals conduct the underlying theme of the message that intends to motivate the consumer behavior of the consumer. Iyer and Bannerjee (1993) identified the following five appeals categorizes: (1) Zeitgeist appeals, (2) emotional appeals, (3) financial appeals, (4) euphoria appeals and (5) management appeals. The first category includes all messages that advertise on the base of the environmental performance of the product and the current necessity of sustainable behavior. These messages especially emphasize timely relevant topics, like species extinction or natural disasters, caused by global warming. The category of emotional appeals entails messages that foster consumer behavior by triggering feelings like fear, guilt or personal motivation. Advertisements include phrasing like: "If we continue treating our planet this way, we will face bad consequences." or "You can help reducing our waste impact on the planet significantly by purchasing this sustainable product." The third category covers all messages that emphasize financial benefits like price reductions, or charity donation. These are linked to the consumption of the product and sight to motivate consumer behavior. The next category of messages, Euphoria Appeals, advertises with attributes of the product that have certain positive effects on the consumer's well-being. Positive effects could be health benefits, like not integrating industry chemicals, harmful pesticides or an improved immune system and lowered blood sugar, caused by natural ingredients. The last appeal category, Management Appeals, stands for messages that emphasize the positive

environmental performance of the whole company. The focus can be on significant achievements, reached milestones or goals in the sustainable work of the enterprise. Aspects like these, target motivating the consumer to follow along or support the work.

2.4.3 Structure and Format of the Sustainable Marketing Communication Message

The third suggestion made by Davis (1993, pp. 21-22) concerns the emphasis of the environmental performance of the product versus the core benefit of the product. The challenge of communication in a sustainable marketing setting is that the product's value added doesn't only constitute of the product benefit anymore, but also of the positive environmental performance of the product and firm. This adds an additional dimension to the messages that are to be communicated through advertisements, personal selling or sales promotion. As a consequence, the product benefit *and* sustainable performance need to be both communicated via the messages. Here the company can decide whether to emphasize the environmental compatibility of the product or the value that is solely added through the function of the product. The company has a variety of options how to include both aspects into their messages and how to balance them. The company should make this decision dependent on the target group it is selling at. More environmentally concerned consumers will be triggered by an emphasis on the environmental performance, whereas consumers with less interest in sustainability will more likely be motivated by an emphasis on the benefits of the product's form and function. Usually, if more emphasis is put on one factor the other gets less attention. Here again it is helpful to be well informed about the targeted consumer audience and their interest and preferences.

Terminology

In every form of communication message, the terminology used should be clear and genuine. As mentioned under the point Content, vague phrasing should be avoided in sustainable communication messages. Concretely this means implying quantitative numbers that give factual information about the environmental performance of the product. As well as circumvent terms like recyclable, eco-friendly and "reusable". A specific claim for an ecologically sustainable spoon could be: "The bamboo contained in this spoon is 100% organically compostable and exclusively obtained from socially responsible farms, that pay their workers \$8 per hour." A vaguely phrased claim is "The spoon contains bamboo that is recyclable and was obtained from farms that pay their workers responsible

wages.” Additionally, companies should obey regional regulations, that constrain the usage of certain terms.

Eco Labels

A label generally certifies that a company complies with certain criteria. Eco labels either guarantee ecologically compatible products, including their composition and manufacturing, or entire internal processes, like the eco label group ISO 14000. As mentioned in the introduction of this chapter, consumers and other stakeholders face a large amount of information that can constitute a challenge to differentiate truly sustainable brands from others that are not genuinely sustainable. Eco labels account for giving an authentic independent evaluation, protecting the consumer from fraud and voluntarily achieving environmental public policy goals (Fuller, 1999, p. 243). Labeling a product or business can therefore instantly generate trust in the consumer’s minds. A study conducted by Hameed and Idrees (2018, pp. 97-101) revealed that consumers, of different ages, educational and social status, are positively influenced by eco labels, as they are adaptive of the promised product standards and take them into consideration when purchasing certified products.

2.4.4 Source and Channels of the Sustainable Marketing Communication Message

Similarly, to conventional marketing, a company can make use of the following communication tools: (1) Advertising, (2) personal selling, (3) sales promotion and (4) public relations. The first tool, advertising, communicates the message across media channels like television, radio, print and social media. These channels mainly reach the mass audience. The traditional channels like television, radio and print only distribute the messages into one direction, whereas online tools like social media and the Internet provide spaces for a dialogue between company and consumer (Belz & Peattie, 2012, p. 204). Online channels constitute a financially more affordable alternative to traditional media channels. Furthermore, through social media appearances or websites small businesses can manifest a comprehensive visualization of the environmental values and policies of the company, that is constantly available. There has also been a shift towards using social media platforms like Instagram and Youtube in order to get through to the younger generations, which constitute a big sustainable consumer segment. Lastly, websites host opportunities to let consumers navigate through the company’s environmental performance and product range, which facilitates meeting various consumer

interests (Belz & Peattie, 2012, p. 209). Regardless of the themes-appeal that is implemented in the advertisements and the tools through which it is communicated, Ottman (1992, p. 6) suggests to not exaggerate the environmental performance of the company or product, but instead include an environmental claim as an understatement. The second tool personal selling is mostly applied on business-to-business selling actions. It implies advertising the firm's environmental policies, profile, and commitment in a direct contact with stakeholders of the company (Fuller, 1999, p. 255). Belz and Peattie (2012, p. 205) state, the sales staff should assure that they account of a deep understanding of the former mentioned aspects, in order to accurately inform the counterpart. The third communication tool, sales promotion, deals with advertising with value-increasing promotions and value-adding promotions. The former aim at triggering consumer behavior by providing financial incentives, such as seasonal sales. The latter contribute to the product benefit by offering electronic newsletters or waste take-back programs, alongside the product life cycle. (Belz & Peattie, 2012, p. 206) Both functions should always be implemented with the objective of making it as easy as possible for the consumer to access. The fourth tool public relations manages the reputation and image of the company in its internal and external surrounding. While the image of a sustainable company is directly linked to its genuinely positive environmental performance, the right actions will secure trust and credibility. Depending on what the current situation demands Public Relations should aim to improve, maintain or protect the image of the entire company or a product.

In the end, all tools should be deliberately used to educate stakeholders. Important aspects are the benefit of the product, the environmental performance of the company and current environmental issues that account for the necessity of sustainable behavior.

2.4.5 Sustainable Marketing Communication in the Manual

This chapter entails the fourth step and chapter of the manual. Firstly, the objectives of a sustainable marketing communication strategy are presented. Then the chapter provides an explanation and a figure of the communication environment. The content of the communication message and the structure and format are rewritten in numerated check lists and also include ways how to address findings of the literature review from the chapter sustainable consumer behavior. Lastly, the chapter entails a figure and an explanation of communication tools, by especially emphasizing the tool advertising with its low budget function Internet and social media.

3 Empirical Chapter

This chapter informs about the development of the manual. It includes a summary of the consultation that was held with the representatives and a introduction into the structure and format of the manual.

3.1 Methodical Approach of the Manual

The manual contains the information conducted during the review of relevant literature about sustainable marketing. To assure that the manual is strategically useful for small companies that are willing to implement sustainable marketing three representatives of small companies and sustainability in Finland and Germany were consulted.

3.1.1 Consultation with Rasmus Basilier (Boost Turku)

Boost Turku is a student-based enterprise that supports young entrepreneurs and start-ups, by providing consultation and giving the opportunity of sharing knowledge across universities in Turku. I learned about Boost Turku during projects while my exchange year at Novia University of Applied Sciences. By conducting contact data from the Boost Turku website and sending E-Mails to several representatives, I was able to establish contact with Rasmus Basilier, who is the Network Manager of Boost Turku. He kindly assured me his support and offered me a video call meeting, in which I was able to introduce my project and final intentions. Besides sharing his opinion on the idea of the manual, he provided me with book recommendations. Following up, we held six additional video call meetings, in which Rasmus gave me helpful guidance, by clearing the necessities of small businesses and sharing his personal experience in the field of marketing. He also gave me advice according the writing style and the chapters of the manual. The bottom line was to tell a story and guide the reader through the manual, rather than just providing information. Furthermore, he consulted me in how to write capturing and influencing texts, as well as recommended me adding a chapter about practical tools that companies can make use of and including concrete business examples at the end of the manual.

3.1.2 Consultation with Philip Seidl (Buildnis GmbH)

Buildnis is a start-up based in Regensburg, Germany that creates innovative video graphic marketing content for enterprises. The business was founded in early 2019 and follows the mission of creating elegant, minimalistic and pure work. Philip Seidl, executive producer of Buildnis, generously agreed to give me his insights on what small companies and start-ups essentially benefit from, when it comes to consultancy. In addition to that he consented to provide me with his opinion about the content of my manual, by reading through it and sharing his thoughts with me. His biggest suggestion was to keep the wording short and precise, and for example include bullet points instead of long texts.

3.1.3 Consultation with Tove Holm (City of Turku)

Tove Holm, is a sustainable development specialist as well as the coordinator of the Baltic Sea Challenge. The Baltic Sea Challenge is a network initiative that invites organizations, like companies, cities and NGO's to join their action plan to protect the Baltic Sea, by lowering pollution and exploitation. While initial attempts to get in contact with members of the City of Turku failed, my Marketing lecturer recommended me contacting Ms Holm. She kindly granted me her help in the development of the manual, by giving me her opinion on the topic and the content of the manual. She approved that a manual like mine would be helpful for junior companies and gave me suggestions regarding the format of the manual.

3.1.4 Structure and Format of the Manual

In addition to above mentioned consultation with representatives of small businesses and sustainability in Finland and Germany, I conducted information about classical consulting. In classical consulting the current stage is evaluated and then the results, aims and objectives that are to be achieved are set out. Additionally, the consultation should be resourced with the right knowledge.

The manual starts with a title page and then continues to the table of content. Furthermore, the manual provides an introduction into sustainable marketing and then the four important functions of sustainable marketing are outlined in their own chapter. The chapter titles were changed to steps (Step 1- Step 4), to make it possible for the reader to gradually follow through in a list, as well as were rewritten to get across the most important functions of the chapter. (See Figure 1)

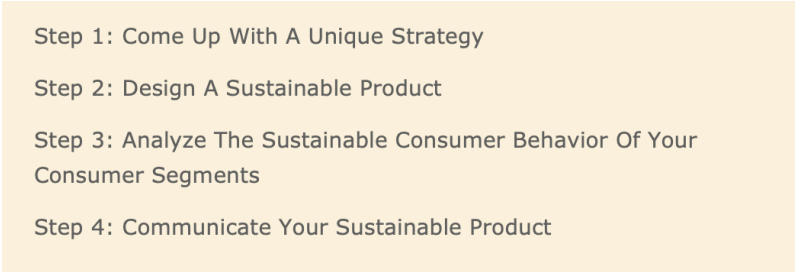
- 
- Step 1: Come Up With A Unique Strategy
 - Step 2: Design A Sustainable Product
 - Step 3: Analyze The Sustainable Consumer Behavior Of Your Consumer Segments
 - Step 4: Communicate Your Sustainable Product

Figure 1 Titles of Manual Chapters

To clear what the purposes of the particular steps are, at the beginning of each chapter the according objectives are outlined. (See Figure 2)

Visualize Your Product Design Objectives

- *Design the product to be ecologically compatible*
- *Design the product to meet the needs of consumers*
- *Design the product to have an excellent price-performance ratio*
- *Design the product to be easily implemented and accessed*

Figure 2 Objectives of Second Chapter

For the purpose of visualization, parts of the content were reframed in figures. The very last chapter contributes to the former chapters by providing tools that can support the practical implementation of sustainable marketing. (See Figure 3 and 4)

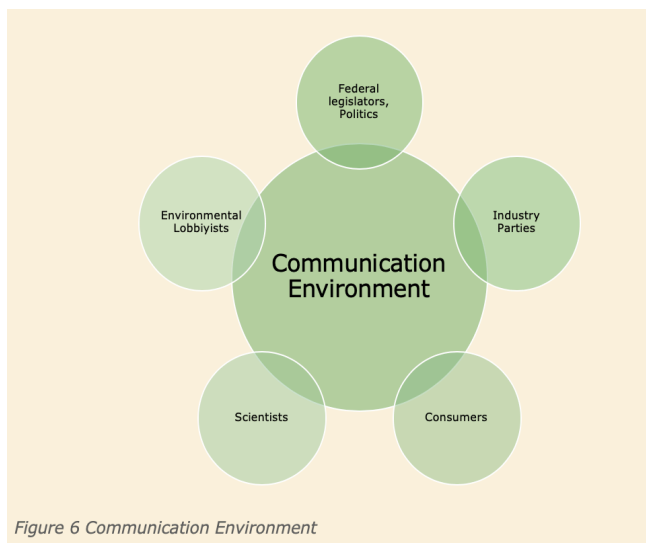


Figure 3 Communication Environment Figure

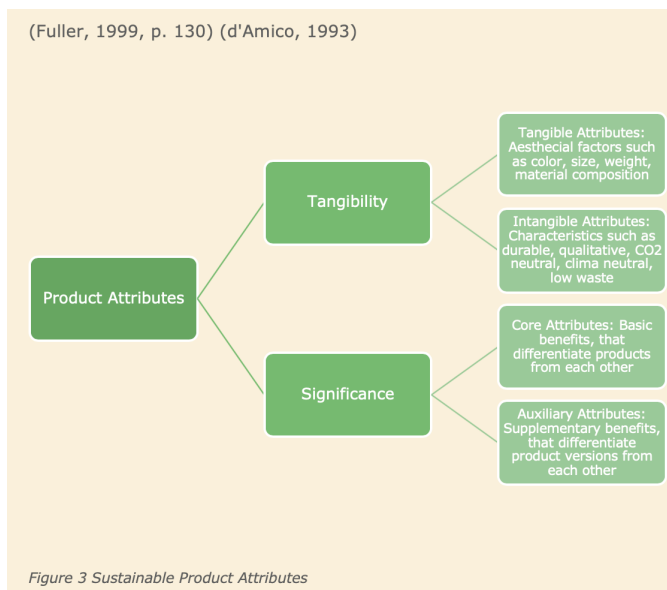


Figure 4 Product Attributes Figure

Taking into consideration the valuable advice received by the representatives, as well as the gained knowledge about sustainable marketing and consulting, the content of the manual was over all developed with following characteristics:

- Contains clear and precise wording
- Sets out objectives of each chapter
- Presents information in the form of bullet points
- Provides practical tools

4 Conclusion

As mentioned in the introduction, marketing has been subject to constant development in the past five decades. And this will not change in the present and future. Sustainable marketing has a strict goal: environmental compatibility throughout the whole product life cycle. However, even though it contains this strict milestone that needs to be achieved, sustainable marketing is no finite process. Moreover, it is an ongoing process that always seeks for improvement. The currently best available sustainable technology can change every day and calls for staying flexible and open towards improving a company's processes along the way. Therefore, sustainable marketing is a function that not only depends on consumer wants but also on innovative findings. Waste stream strategies can change overtime to become obsolete, because better alternatives were developed. Manufacturing material can evolve to not being the most sustainable option on the market anymore and call for substitution. Every year new innovations are revealed and new possibilities of improving the business process are available. Therefore, a company should never stop screening the best available technologies and looking out for product and process substitutions that are more efficient in their eco costs than those already implemented in the business. Here it is the task of political institutions to provide the basic conditions for innovations for a sustainable development. In an international comparison issued by the NewClimate Institute and the Climate Action Network (CAN), that examines the engagement of 61 countries in climate change mitigating actions, Finland is currently on the 10th and Germany on the 23rd rank (Anon., 2019). As members of the European Union, which currently seeks for improving its global competitiveness in energy efficiency and for cutting at least 40% of greenhouse gas emissions until 2030, Finland and Germany have to accept binding targets on national level. Since 2020, the EU also implements the Innovation Fund, which seeks to support small to big scale projects that aim for effective innovations in energy intensive industries, renewable energy, energy storage and carbon capture, use and storage (European Commission, 2019). However, as indicated by the global ranking, both countries implement different climate change mitigating programs. Finland seeks for carbon neutrality by 2035, while prioritizing the involvement of all members of society and cost effectiveness and presenting concrete measures by 2025 (Finnish Government, 2019). Germany, on the other hand, plans being carbon neutral by 2050 and besides announcing "climatic friendly" mobility, the German government predominantly lacks in presenting concrete actions that are implemented for achieving their goal. Considering the constantly evolving available innovations, the developing consumer

preferences and the changing governmental policies the implementation of sustainable marketing can be challenging. However, securing the sustainable paradigm in the marketing functions of a company in spite of the mentioned challenges, will on the long term not only bring benefits for the environment but also for the company itself.

5 Appendix

Booklet: Sustainable Marketing – A Consulting Manual

SUSTAINABLE MARKETING

A Consulting Manual



Alexandra Mischnick
Novia University of Applied Sciences

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SUSTAINABLE MARKETING

„The introduction of genuinely sustainable products into economic systems would be a major solution to pollution“ (Fuller, 1999)

As a result of current environmental issues like global warming and resource scarcity, the importance of applying environmental compatibility into the processes of a company is increasing. Sustainable marketing is a derivative of conventional marketing that facilitates the consumption of environmentally sustainable products, in order to secure demand on the long term and positively impact the planet. It makes use of adjusting functions like marketing strategy, product design and marketing communication to align with an overall sustainable paradigm. This manual guides you through the most important functions of sustainable marketing with the following steps:

Step 1: Come Up With A Unique Strategy

Step 2: Design A Sustainable Product

Step 3: Analyze The Sustainable Consumer Behavior Of Your Consumer Segments

Step 4: Communicate Your Sustainable Product.

In the end you will be provided with websites and tools that will further help you in the implementation of sustainability in your company.

STEP 1: COME UP WITH A UNIQUE STRATEGY

“Sustainable marketing tries not just to satisfy wants and meet needs but also to generate opportunities and happiness and to achieve lasting satisfaction.” (Frank-Martin Belz, 2012, p. 122)

By applying the sustainable paradigm to a company, the usual business goals of reaching **profitability** and **creating value** to the consumer, are completed by being **environmentally compatible** in all business actions. To achieve these goals, you should simultaneously apply the sustainable vision in all marketing elements. Here it can be helpful to manifest a strategy that takes into account available tools, current business setting and goals that need to be achieved in each marketing element.

1. Set out your objectives
2. Analyze your current business setting
3. Develop your strategy
4. Apply tools
5. Achieve your objectives

Set Out Your Sustainable Marketing Objectives

Set your objectives according to the elements of your marketing. These goals could be as follows:

- Product: Disestablish waste alongside the whole product life cycle.
- Place: Distribute the product with generating the least possible pollution.
- Promotion: Communicate benefits of sustainable product or service, as well as necessity of sustainable behavior.
- Price: Assign eco-costs to the Take into consideration eco-costs and assign them to ⁱ

Analyze Your Current Business Setting

Analyze your current business setting, by screening the surroundings of your business that influence your decision making. Then, make adjustments concerning the physical external environment, the marketing objective and the decision boundaries, as shown below.

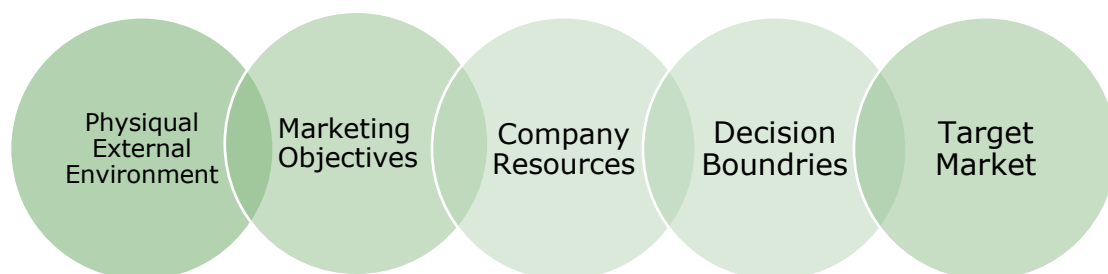


Figure 1 Sustainable Marketing Business Setting

Adjustments:

- Physical external environment: Economy, society, technology, politics, + ecosystem

- Marketing objectives: Customer satisfaction, organizational goals, + compatibility with ecosystems
- Decision boundaries: + Holistic perspective on entire product life cycle and entire organizationⁱⁱ

Apply Your Sustainable Action Tools

In this step you should gather and analyze the tools that are available to you, which you can implement to achieve sustainability in your business activities.

- Pollution Prevention: Substitute material and processes with alternatives that emit less pollution (air pollution, soil pollution, water pollution with plastic)
- Resource Reduction: Responsibly use resources, because of resource scarcity, by implementing product reuse, material recycling and material transformation
- Design for Environment: Implement environmental awareness into practices of product and process development ^{iiiiv}

Adjust Your Sustainable Marketing Mix Elements

To achieve your objectives, you should adapt your conventional elements with the sustainable perspective.

Mix Elements	Conventional Marketing	Sustainable Marketing
Product	Dedicate the design and development of the product or	Dedicate the design and development of the product or service to creating

	service to creating added value	added value and meeting the needs of environment
Place	Distribute and place the good in the market, while considering different distribution channels and accessibility	Implement sustainable action tools in the distribution and placement methods of the good
Promotion	Communicate the benefit of the good and trigger consumer behavior	Communicate the ecological benefit of the good, as well as the value added and trigger sustainable consumer behavior
Price	Allocate costs accordingly and create wished value perception	Allocate conventional costs as well as eco costs accordingly and create the wished perception

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Develop Your Sustainable Marketing Strategy

Your strategy should entail the following five steps.

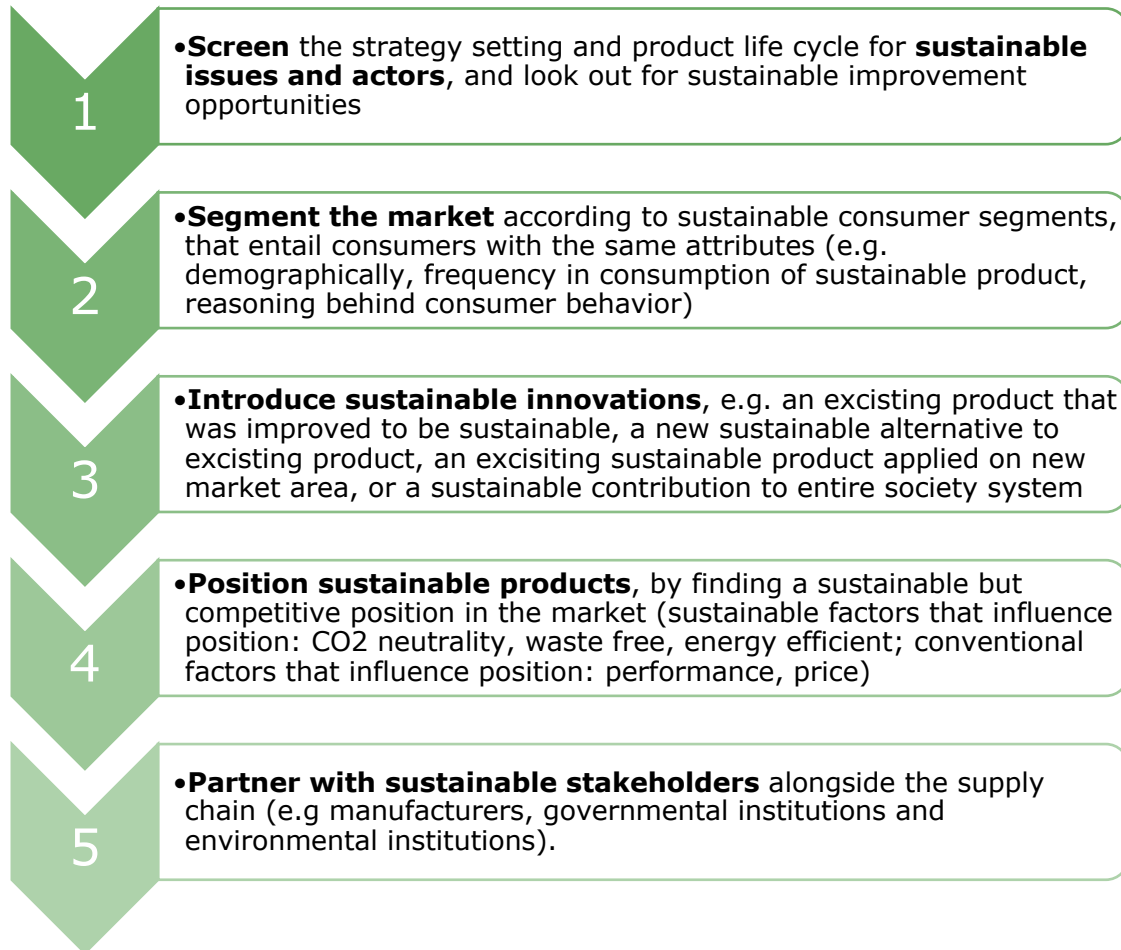


Figure 2 Sustainable Strategy Development

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STEP 2: DESIGN A SUSTAINABLE PRODUCT

“The challenge for sustainable marketers is to solve the direct problems of consumers’ everyday living and their needs, while also improving social and environmental performance.” (Frank-Martin Belz, 2012, p. 175)

Visualize Your Product Design Objectives

- *Design the product to be ecologically compatible*
- *Design the product to meet the needs of consumers*
- *Design the product to have an excellent price-performance ratio*
- *Design the product to be easily implemented and accessed*

Manifest the Product Attributes

In this step, you should determine the attributes of the product. These will determine the form and function of the product, and then also will consequently determine how the product will impact the natural environment alongside its entire product life cycle. The mix of attributes that constitute the product include tangible, intangible, core and auxiliary attributes.

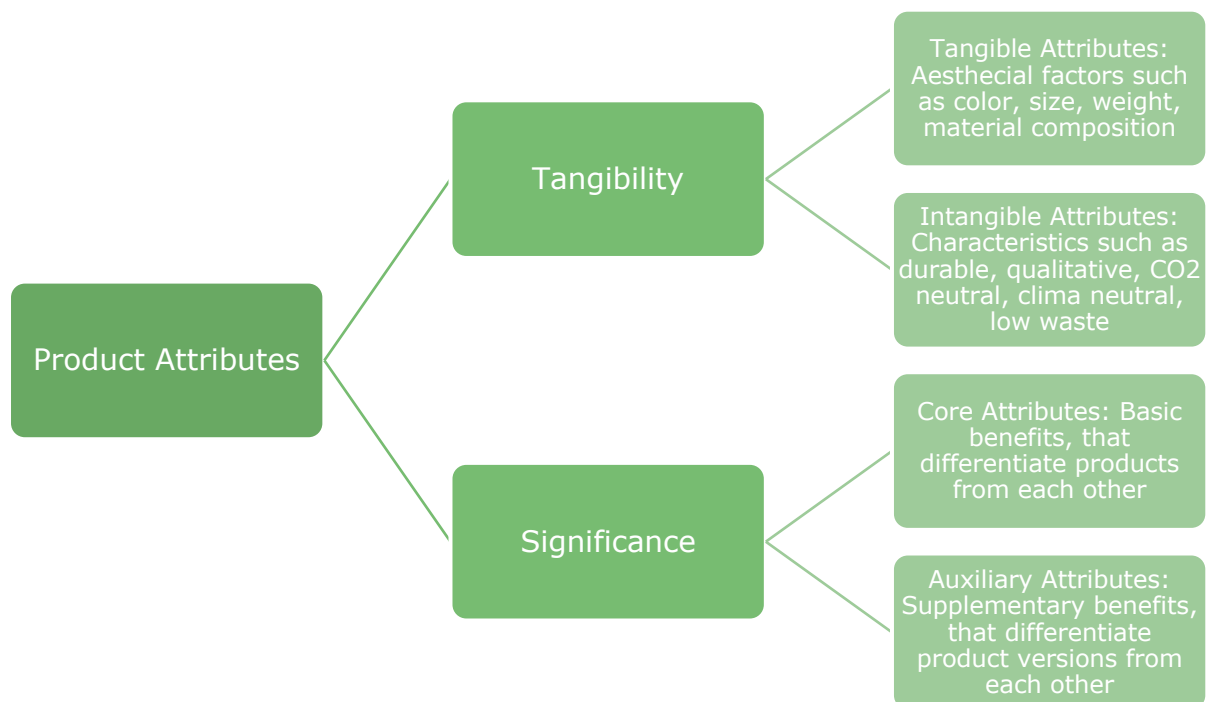


Figure 3 Sustainable Product Attributes

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Apply the Cradle to Grave Product Life Cycle

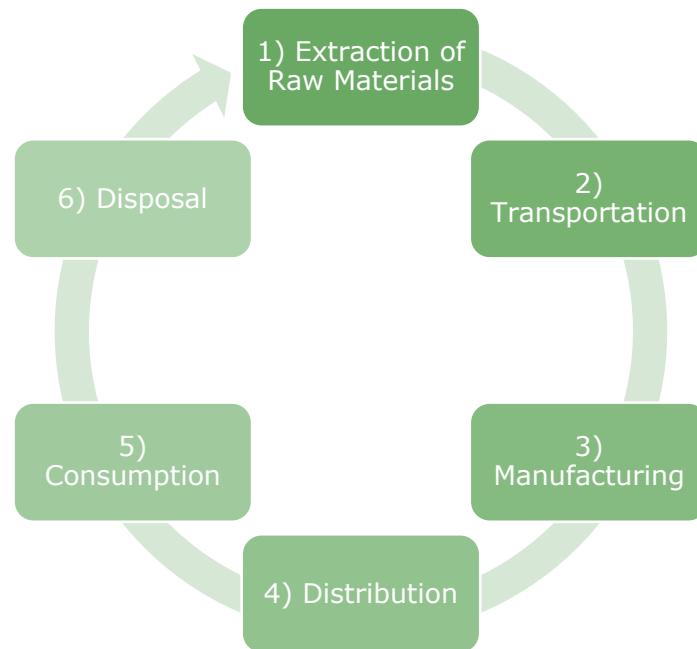


Figure 4 Cradle to Grave Product Life Cycle^{viii}

The task of product design team is to design the benefits, function and form of the product in a way that a sustainable composition of materials and processes is possible, given the available technologies and resources. Therefore, you should implement simplifying reducing and investing action in stages 1)-5):

- *Reduce the use of resources in extraction and manufacturing*
- *Avoid the use of unrecoverable material*
- *Invest in innovative material*
- *Simplify unnecessary complex processes*
- *Implement waste stream, and energy consumption reducing strategies*
- *Dematerialize product and packaging (light weight, downsized)*
- *Store minimalistic and non-toxic*

Usual practices in stage 6), like conventional disposal, and streaming waste into landfills in the natural environment should be substituted in sustainable marketing.

- *Expand the lifespan of the product, by making it more physically durable*
- *Design the product to be waste-free*
- *Design the product to stay useful and beneficial, by screening current technological innovations and lifestyle trends*
- *Design upgradable and adaptable features to withstand innovations and trends*
- *Offer product take back programs (make disassembly and reassembly of product uncomplicated for your own purposes)*
- *Offer product sharing and use-oriented services*

Apply a Life Cycle Sustainability Assessment

A life cycle assessment helps identifying environmental impacts of the product alongside its entire product life cycle. With the right information the water or carbon footprint of a product can be calculated. Here databases can help, by providing information about used materials or products:

- *EarthSmart.com*
- *Ecoinvent.com*
- *Lifecycleinitiative.org*


STEP 3: ANALYZE SUSTAINABLE CONSUMER BEHAVIOR OF YOUR CONSUMER SEGMENTS

When selling your sustainable product or service you should seek to comprehend the behavior of your consumers, in what, how much and how they consume sustainably.

Visualize Your Consumer Behavior Objectives

- *Understand motivation behind sustainable consumption*
- *Understand challenges or barriers of sustainable consumption*

Mind the Attitude-Behavior Gap

 Don't interpret an overall positive attitude towards sustainable products as a safe promise of sustainable consumption. Although consumers state a positive attitude towards sustainable products, research has proven they do not subsequently display sustainable consumption!^{ix} When assessing the purchasing power of your consumers, focus on actual numbers of sustainable consumption and not on attitudes or preferences.

Mind Cognitive Barriers

System 1 and 2

The decision making of a consumer is influenced by intuitive and rational feelings.^x If a sustainable product appears less attractive in its performance, for example by being less comfortable and accessible than a conventional product, intuitive feelings will motivate consuming unsustainable products. This will however conflict with rational feelings, if the consumer is aware of the importance of sustainable consumer behavior.

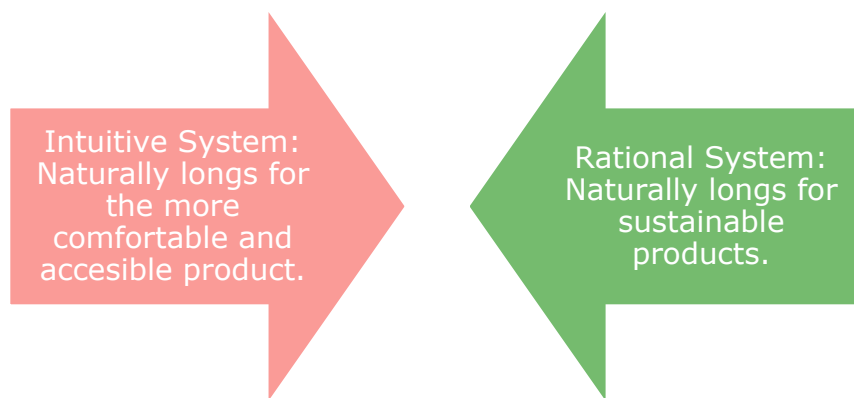


Figure 5 Intuitive System and Rational System

Your sustainable marketing communication strategy should aim at triggering the rational system, as this is the system that will long for sustainability. This emphasizes the importance of a good accessibility and overall great performance of the sustainable product.

Present Bias

The present bias of the human cognition constitutes the preference on activities that bring advantages in the immediate future. Activities that might instantly entail small disadvantages but may pay off significantly in the far future are less preferred. Sustainable products are often more expensive and show worse performance but have a significantly positive impact on the planet and its future generations. Due to the present bias, a consumer could be demotivated to buy your sustainable product because it might not bring significant advantages in immediate future. Here an emphasis on the future

environmental issues and benefits of the product, will help overcome the present bias.

Use the Self in Your Favor

The self is a synonym for all individual values, preferences and beliefs, which intensely influence sustainable consumer behavior. Self-signaling, self-desirability, self-discrepancy and self-accountability are all functions of the self, that are able to motivate sustainable consumer behavior.

Self-function:	Sustainable consumer behavior is motivated by:	How to use this for your own purpose:
Self-Signaling & Self-desirability	The desire of showing off example-behavior and gaining a positive reputation among social environment	Analyze the social environment of your consumer segments (Does it value sustainable behavior as positive behavior?)
Self-Discrepancy	The desire to reach the ideal self, which constitutes a person with a sustainable lifestyle	Analyze the ideal self of your consumer segments (Does it constitute a sustainable self?)
Self-Accountability	The positive self-emotions that arise when fulfilling a self-commitment and not feeling guilty because of disaccording behavior	Analyze if consumer segments feel accountable for environmental consumer behavior (If so, emphasize the bad impact of taking no action)

Self-Signaling and Self Desirability

Here the consumption of the sustainable product is motivated by:

- *The desire of showing off example-behavior and gaining positive reputation among social environment*

Analyze social environment of consumer segments.

Self-Discrepancy

Here the consumption of the sustainable product is motivated by:

- *The desire to reach the ideal self, which constitutes a person with a sustainable lifestyle*

Find out if ideal self of consumer segments constitutes a person with a sustainable lifestyle (Mind negative effect: sustainable lifestyle sometimes associated with femininity)

Self-accountability

Here the consumption of the sustainable product is motivated by:

- *The positive self emotions that arise when fulfilling a commitment and not feeling guilty because of disaccording behavior*

Find out if consumer segment feels accountable for environmental consuming behavior. Emphasize the bad impact of humanity on the planet.

Use Social Influence in Your Favor

The Collective Self

Alike the individual self that was mentioned above, people tend to seek for the best version of their collective self, which constitutes a group of friends, family members or other social environment members. Normally people try to be the best version of themselves, also including their collective actions. In comparison to other social groups and their behavior, a discrepancy between the own collective actions and the actions of their opponent group can motivate sustainable consumer behavior.

→ Analyze Social Environment of Consumer Segments, do they seek for sustainable behavior?

Social Norms

Generally social norms describe actions and behavior that we believe to be normal and appropriate. They describe various different life situations and are different in every culture or country. Social norms can be divided in descriptive and injunctive norms. While descriptive norms express what most other people do, injunctive norms describe what other people approve or disapprove of.^{xi} In their research Goldstein et al. (2008) found out that consumer behavior can be positively influenced by messages that entail descriptive norms.^{xii}

→ Analyze social norms in the culture or country of the consumer segment, as well as use descriptive norms to foster sustainable consumer behavior.

STEP 4: COMMUNICATE YOUR SUSTAINABLE PRODUCT

This step is all about coming up with a communication strategy that communicates your product or service.

Visualize Your Sustainable Marketing Communication Objectives

- *Increase awareness of sustainable product or service and its performance benefits and environmental benefits*
- *Increase awareness of necessity of ecological behavior*
- *Increase sales or meet fiscal objectives of company*

Consider the Communication Environment



Figure 6 Communication Environment

The communication environment is the setting that your communicated message exists in. This environment influences how your message is perceived and also determines the bundle of information that reaches your customer every day.

Form Your Communication Message Content

1. Be specific^{xiii} as it:
 - clears uncertainties issued by the daily information flood
 - fosters credibility
 - makes information easily understandable
2. Be individually, personally and emotionally touching
3. Emphasize direct and future benefits of sustainable consumption (see step 3: sustainable consumer behavior)
4. Include descriptive norms (see step 3: sustainable consumer behavior)
5. Aim at triggering the rational system of the human brain (see step 3: sustainable consumer behavior)
6. Choose between five appeals that conduct the underlying theme of the message:
 - Zeitgeist appeal (Advertise on the base of the current necessity of pro environmental acting)
 - Emotional appeal (Advertise on the base of triggering emotions like fear, guilt and personal motivation)
 - Financial appeal (Advertise on the base of financial benefits like price-reduction and charity donations)
 - Euphoria appeal (Advertise on the base of attributes that benefit the well-being of consumers like natural ingredients and no harmful pesticides or industrial chemicals)
 - Management appeal (Advertise on the base of positive environmental performance of the company)

Structure and Format of Communication Message

1. Balance between the emphasis on the beneficial sustainable performance of the product or service, and the beneficial function of the product or service
2. Make use of ecolabels, if financially affordable, as they
 - give an authentic independent evaluation
 - protect consumers from fraud
 - generate trust in consumers^{xiv}
3. Use a clear and genuine terminology
 - Imply quantitative facts about environmental performance of the product
 - Avoid wording like *recyclable, reusable, less packaging, less waste, eco-friendly, environmentally friendly*^{xv}
 - *Bad example: "The spoon contains bamboo that is recyclable and was obtained from farms that pay their worker responsible wages."*
 - *Good example: "The bamboo contained in this spoon is 100% organically compostable and exclusively obtained from socially responsible farms, that pay their workers 8\$ per hour."*

Choose your Source and Channels

For communicating your message, you can make use of all available communication tools. However, mind that each tool reaches different consumer segments, is perceived differently and also brings different financial costs.



Figure 7 Communication Tools

Advertising communicates across media channels like television, radio, print and internet. Usually through these channels the mass audience is reached. For small companies that are financially limited, the use of the Internet should be emphasized. With comparably low costs, a company can still visualize their environmental values and products towards their consumers, while being constantly available. Here, you should imply using a Website, Online Shop or Social Media campaigns. The latter is often used to sponsor regional eco influencers and have them show the products to their followers.

Personal Selling is an important communication tool for business-to-business selling actions when communicating with a stakeholder other than a consumer. Important aspects hereby are advertising the firm's environmental policies, profile and commitment correctly.^{xvi}

Sales Promotion is applied when the consumption should be increased by value-increasing or value-adding promotions. Value-increasing promotions imply financial incentives, such as seasonal sales. Value-adding promotions imply offering electronic newsletters or waste take-back programs alongside the product life cycle.^{xvii}

Public Relations are applied to manage the internal and external reputation of a company. Hereby it is important to stabilize a genuinely positive environmental performance, as it will directly influence the image of the company. The right activities will secure trust and credibility and include improving, maintaining and protecting the image of the entire company and its products.

TOOLS AND WEBSITES

Sustainable Product Design:

- Resource Productivity in 7 Steps:
<https://www.econstor.eu/bitstream/10419/59292/1/716261502.pdf>
- Sustainability Rating System: <https://www.asce.org/envision/>
- Center for Energy Efficiency and Sustainability:
<https://www.tranetechnologies.com/en/index/sustainability/cees.html>
- European Commission on Sustainable Product Policies:
<https://ec.europa.eu/jrc/en/research-topic/sustainable-product-policy>
- European Commission on Sustainable Production and Consumption:
https://ec.europa.eu/environment/basics/green-economy/sustainable-development/index_en.htm
- Environmental Impact of Packaging Material:
https://www.researchgate.net/publication/229796182_The_Environmental_Impacts_of_Packaging

- *Finnish Bioproduct Mill:*
<https://www.metsafibre.com/en/about-us/Production-units/Bioproduct-mill/Pages/default.aspx>
- *Life Cycle Sustainability Assessment by the UN:*
<https://www.lifecycleinitiative.org/>
- *Wuppertal worksheets provided by Lettermeier (2011), resource productivity:*
- *Intergovernmental Panel on Climate Change Reports:*
<https://www.ipcc.ch/srccl/>

Sustainable Marketing Communication:

- European Ecolabel: <https://www.eu-ecolabel.de/>
- Ecolabels in Finland:
<http://www.ecolabelindex.com/ecolabels/?st=country,fi>
- Ecolabels in Germany:
<http://www.ecolabelindex.com/ecolabels/?st=country,de>
- Sustainable Certification: <https://gfaw.eu/en/cse-products-from-sustainable-companies/cse-information-for-enterprises/>

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