


Chapter 1

Circular–Green Economy: Analysis Based on the Theory of Resources and Capabilities

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ABSTRACT

The purpose of this chapter is to analyze the green and circular economy (GCE) model from the point of view of the resources and capacities of the organization. How is the application of the circular economy model related to strategic management? At first glance, it seems that the CE is operating within an operational level with a social impact, but it also has implications that allow us to think that it can be used as an internal resource of the company that, if applied in the right way, it can become a competitive advantage; in other words, the application of the CE is related to strategic management through the point of view based on resources and capabilities. Therefore, the present investigation has a descriptive-correlational nature, which was analyzed through Peng's VRIO framework.

INTRODUCTION

In recent decades, the care of the planet has begun to appear on international political agendas as a matter of urgent concern, since we have begun to notice the consequences of the decisions taken by past generations to obtain economic benefits without worrying about the damage to the environment they caused (Brundtland, 1987). As such, it has been decided that it is time to worry and take measures to survive in a planet of limited resources with a population that does not stop growing.

What can be done? Beyond the individual responsibility of each person, those who can make a noticeable change and chain reaction are the companies that, regardless of size or classification, are important actors in the global scope since they have an active role in the degradation or preservation of its environment close to social, economic and environmental level. Then, it can be considered that it

DOI: 10.4018/978-1-7998-4990-2.ch001

is of vital importance that companies begin to have the main goal of achieving sustainability, but how can they achieve it?

One way to achieve this is through the reengineering of existing products or the creation of new products that are generated from the principles of the Circular Economy. According to the Ellen MacArthur Foundation, an organization devoted to the study and dissemination of the circular economy, the beginning of the concept as such has not been registered, but rather is the result of an evolution of several schools of thought such as Regenerative Design, the Economics of Performance, Cradle to Cradle, Industrial Ecology, Biomimicry, Blue Economy, and Natural Capitalism (Ellen MacArthur Foundation, 2019).

Regenerative Design is a school of thought created by John T. Lyle, whose approach is rooted in the theory of systems oriented to design processes. When speaking of regeneration, the theory refers to the fact that existing processes are modified in order to improve, remove or adhere new sources of energy and / or materials. This school has a base derived from the ecology of systems that is in charge of providing a biokinetic in the ecosystems with the objective of achieving a system of ecological economy that is viable and closed for any industry. In addition to the above, it seeks to ensure that the resulting system does not generate waste, that they are fully effective, to achieve this it is necessary to redesign the culture of human habitats (Heaven Grown, s.f.).

The Economics of Performance was born in the 70's when the economist and architect Walter Stahel, in contribution with Genevieve Reday, created *The Potential for Substituting Manpower for Energy*, a report for the European Commission where they describe the probability of achieving an economy in the existence of processes in a loop (Ecointeligencia, 2017). In addition to the possible impact that these processes would have at the social level with the generation of jobs, in economic competitiveness, in the new distribution in the use of resources and waste. In general aspects, the economy of performance has four main objectives: to extend the useful life of existing products, to generate new products that from their design are thought to be long-lasting, to think ahead about campaigns or activities for the prevention of waste, and reuse of these (Ellen MacArthur Foundation, 2019).

The Cradle to Cradle, also known as cradle to cradle or C2C, is the result of work done by Michael Braungart and Bill McDonough, a chemist and an architect respectively. This research consists of visualizing that from the beginning and during a process it is known if the materials used are technical or biological (Ellen MacArthur Foundation, 2019). McDonough mentions in his work that durability is not applicable to all the materials used, some simply cannot be reused or cannot be recovered easily, for this reason the proposal to design the products is presented so that their components can be reused in completely or completely degrade in the environment (McDonough, Braungart, & Bollinger, 2007). C2C has been one of the models that gave rise to the circular economy as such, highlighted the importance of creating a process in which intelligent design is used to achieve lengthen or improve the life cycle of finished products.

Industrial Ecology or science of sustainability is part of the engineering that aims to support the promotion and dissemination of sustainable development through the efficient use of resources, unleashing improvements in the quality of life. In other words, create sustainable societies. On the other hand, it seeks to reduce the impact that industrial processes have on the environment (Ellen MacArthur Foundation, 2019). Industrial Ecology is composed of several disciplines and not only applies to the products sector but also to the creation of services, seeking to achieve social and industrial well-being (Mejía Dugand, 2010). In itself, this school of thought tries to generate processes in which the raw material is processed, converted into a finished product and when its life cycle ends, it is recycled and, in turn, used by other companies or industries as a supply for production. so a new cycle.

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