

Customer Satisfaction and Sustainability Initiatives in the Fourth Industrial Revolution

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Chapter 9

B Corp Certification for a Circular Economy Approach and a Sustainable Pathway

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ABSTRACT

The “loop” approach of the circular model, which aims to live in the business or market environment, requires a radical evolution of the production techniques, management, and skills in a new concept or idea for the market. Circular Economy results from a long awareness-raising process connected with problems concerning environmental protection. The dissemination of circular economy supposes the adoption of business models which will eventually enable environmental sustainability oriented behaviors, an efficient use of resources, and the respect of ethical, social, and environmental values. Benefit Corporations are companies pursuing these objectives. This chapter identifies and discusses the potential of B Corp certification to apply the principle of Circular economy. In particular, a compared multiple analysis of case studies is used to evaluate how the requirements of the scheme of certification influence the potential circularity of the enterprises analyzed.

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B Corp Certification for a Circular Economy Approach and a Sustainable Pathway**INTRODUCTION**

The new paradigm of circular economy was developed in response to production of the current linear model and to address critical issues due to scarcity and inadequacy in the management of virgin resources by organizations and to the volatility of their prices (Michellini, Moraes, Cunha, Costa, & Ometto, 2017). With proposals that address the full lifecycle of products, new business models aim to increase resource efficiency while respecting the environment so that material from bio-waste is reintegrated, technical waste is refurbished and unused material is re-entered within the industrial cycle, as key resources to close the loop (Ellen-MacArthur Foundation, 2013). Therefore, the transition to circular economics arises as a challenge to slow climate change and to address resource scarcity. Circular economy is applied not only to sustainable development issues, such as environmental or industrial ecology policies (Ghisellini, Cialani, & Ulgiati, 2016) but it extends towards concepts or solutions inspired by “biomimetics”, “bioeconomy”, sustainability and the green economy (Pomponi & Moncaster, 2017). The new business model goes beyond the economic concept of profit, encouraging the attainment of improving the social-cultural context. In particular, it advocates for minimizing the generation of waste and having as a main objective that of reaching a greater awareness in consumers’ perceptions. Therefore, it can be defined as “an economic system that represents a change of paradigm in the world in which the society is correlated with nature and aims to prevent the exhaustion of resources, the circuits of energy and materials” (Prieto-Sandoval, Jaca, & Ormazabal, 2018). There are quite a lot of problems associated to a non-rational use of resources thus technological innovation can represent a valid help for attaining a more favorable transition, by promoting modularity and versatility (Nižetić, Djilali, Papadopoulos, & Rodrigues, 2019). In this context, the stakeholders become an integral part for radically improving this achievement (Højberg, Troldborg, Stisen, Christensen, & Henriksen, 2013). The change must then adopt top-down policies, expressed in policy terms, but even more bottom-up policies for the implementation of production and consumption models increasingly efficient and at the same time environmentally sustainable. The take-make-consume and dispose model (Urbinati, Chiaroni, & Chiesa, 2017) leaves room for circular systems. Products retain their value for as long as possible for subsequent reuse, there by generating value throughout the entire circular lifecycle and reactivating its functionality or use by symbiotic cascade processes, leading towards new production cycles (Holgado, Benedetti, Evans, Baptista, & Lourenço, 2018). Therefore, a characteristic of the circular economy model is given by the interdependency of phases and cascade cycles. This makes it is possible to avoid or at least partly prevent resources from escaping the circle by reducing waste as much as possible. La Ellen MacArthur Foundation has long been committed to strengthening and communicating principles related to circular economy (CE), as well as promoting ideas and opportunities of a new social and environmental business (Ellen-MacArthur Foundation, 2013). The Foundation’s contribution was fundamental in the launching of this initiative and to facilitate a transition at the European level of the process change. Among the essential elements that it proposes, there are a series of indicators, including: design (design-of-waste), “the extension of the lifecycle of the product”, “renewable energies”, the “eco-system” approach, the “recovery of material”, the “sharing”, the “product as service”. The “design-of-waste” contributes to the reduction of waste, promoting a more efficient production, cable of restoring a supply chain through a virtuous process of environmental management. The extension of the lifecycle of the product, together with the repair, resale, regeneration, and reconditioning, allows to affect the profitability of companies, thanks to offer of a new range of services. The use of “renewable energy” contributes to reduce the environmental impact and the use of non-renewable sources, while the eco-system approach operates

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as a new “Thinking System”. That is a way of rethinking the economy, by taking into consideration all the factors that intervene between the action and the consequences that they have on society and on the environment. The recovery of materials through recycling and their subsequent reuse, preserve the quality characteristics, by decreasing their use and at the same time, through sharing models, which act through on-demand platforms, by promoting a facilitation of trade, where the product takes the form of the service.

The concepts expressed by Ellen Mac Arthur (Ellen-MacArthur Foundation, 2013) lead to reconsider and regenerate systems already existing in nature, to build resilience through flexibility. This means equipping organizations with a ductility to cope with / absorb an unexpected or unpredictable event that negatively affects its sustainability. This implies a constructive change based on “resource awareness”, “interior strength”, on the set of principles needed to address the challenges of global sustainability through the creation of shared value” (Genovese, Acquaye, Figueroa, & Koh, 2017).

The reduction in consumption is the additional factor for the application of CE. Circular Economy aims to reduce the consumption of raw materials and energy by applying the cascade system to the linear economy model. Unal and Shao define the concept of Circular Economy as “a sustainable development initiative with the objective of reducing the societal production-consumption systems linear material and energy throughout flows by applying materials cycles renewable and cascade - type energy flows to the linear system” (Ünal & Shao, 2019). Circular economy can manufacture resilience-friendly products, using natural systems and likewise contemplate a “vision” that knows how to go beyond the immediate benefit. In Circular Economy systems the re-use of products and regeneration use less resources and energy than traditional recycling methods of raw materials. Ngan et al. emphasize how “the system is designed to be restorative and regenerative” (Ngan et al., 2019), where the “reduction”, “reuse”, and “recycle” represent the three milestones to assess the impact on production and consumption: “The Circular Economy (CE) has gained traction as a pathway towards more sustainable economic growth (Ruggieri, Braccini, Poponi, & Mosconi, 2016). The main actions leading towards a CE have been identified as the 3R principles of “reduce”, “reuse”, and “recycle”. However, understanding is lacking regarding how the adoption of CE using the 3R principles generates value and revenue in a business context” (Ranta, Aarikka-Stenroos, & Mäkinen, 2018).

Taking into consideration the evolution of principles related to the EC’s appraisal in the international context, the research will focus on the analysis of the B Corp Certification, on the method of assigning the rankings by the standard and finally a multiple analysis is carried out to compare the impact areas of the certified enterprises. The aim of the paper is to identify and discuss the potential of B Corp certification to apply the principle of Circular economy. In particular, a compared multiple analysis of case studies is used to evaluate how the requirements of the scheme of certification influence the potential circularity of the enterprises analyzed, evaluating the ability/potential of the companies to activate the Circular Business Models. The analysis was based on the value of the ranking obtained, the impact areas covered by enterprises and the requirements defined by the standard.

Background

“The Circular Economy (CE) can be a driver for sustainability and CE can be promoted and supported by the creation of new and innovative business models, which embed CE principles into their value propositions throughout the value chain” (Manninen et al., 2018). The models can assume the characteristic of cascade cycles that describe a flow, narrow or long, that integrates concepts of economic

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sustainability of resources and operational sustainability in order to determine the efficiency and appropriateness of the exploitation of resources in a given context. In general, narrow cycles preserve the integrity and complexity of a product. In longer cycles instead, there are a series of consecutive steps where the use of new material, energy and manpower needed to create a new product and increase its quality and efficiency contribute to reducing the dispersion of material out of the cycle itself, with pricing benefits and customer satisfaction. The application of the new circular models is based on a number of principles, the list of which is not yet exhaustive due to the lack of uniformity and coding. In order to obtain a continuous improvement within an organization and to improve its efficiency and Implement CE practices, principles that can guide the organization itself to become more sustainable should be applied. In the vast literature on the subject, several authors use a well-established terminology related to the use of 3R to describe concepts of recycle, reuse and reduce (Reike, Vermeulen, & Witjes, 2018; Ranta et al., 2018). “Recycling” implies a “downcycling”, that is it reduces the difference between quality of recycled materials and the primary material over time, trying to implement recovery, thereby reducing the potential wastes of renewable materials (Braungart, McDonough, & Bollinger, 2007). The principle of “reduce” is based on the concept of reducing the consumption of raw materials through the design of products that last longer through maintenance and repair techniques which can also have a positive impact on the reduction of costs, impacts (CO₂), raw materials (Moraga et al., 2019).

Ghisellini proposes a classification not only on the bases of 3R, but also of an “appropriate design”, a “renewability, and a “reclassification of materials” (Ghisellini et al., 2016). The “appropriate design” implies a search for solutions to avoid excess waste in dumps, thanks to an ease in disassembly and reuse cycle (Ceschin & Gaziulusoy, 2016). When the use of resources is needed, the system must select those to be used and to be preferred from the performance point of view. This new way of working requires a reclassification of materials (raw materials or second raw materials). “Renewability” represents the additional principle. Renewable energy becomes a prerequisite in this context in order to reduce dependence on fossil energy and improve the adaptability (resilience) of the economic system to the negative effects of non-renewable energy (Ghisellini et al., 2016). The “reclassification of materials” is proposed in technical terms. The development of technical materials, such as metals, minerals, plastics, polymers and other artificial materials, introduces the possibility of upgrading, right from the development stage, with a reduction in the loss of resources along the entire value chain, while biological materials can be used to replace those made of non-natural origin, promoting their degradation as a result of usage, without causing damage to the environment.

Further authors extend these concepts by introducing principles evoking the use of “R”, generating a sequence of definitions: “4R” for the application of “Recovery”; (Khmara & Kronenberg, 2018) the “5R” for “Reclamation” (Pan et al., 2014); the “6R” for “Repurpose” (Jawahir & Bradley, 2016) until also considering “Recycle Materials” “7R”, Recovery energy “8R” and “Re-Mine” “9R” (Reike et al., 2018).

These conditions are necessary to facilitate the transition and to bring about a change also in the use of a product, activating a cultural loop (Geissdoerfer, Morioka, de Carvalho, & Evans, 2018).

Design is one of the principles of the CE. (Bovea & Pérez-Belis, 2018) emphasize “[...] the analysis of how an existing product design meets the design guidelines required from the circular economy perspective, and which are the design guidelines that would need to be incorporated into its design to become a better circular design product” (Bovea & Pérez-Belis, 2018). Design intervenes in regenerative development (Ceschin & Gaziulusoy, 2016) by defining new consumption models such as strategic design or environmental design. The first understood as a sustainable production model that applies to the design to implement innovations within companies and organizations (Baldassarre et al., 2019).

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The second “[...] involves overlap of information used and created by the diversity of product design expertises” (Rio, Riel, & Brissaud, 2017). This denotes a difficulty of interrelating design skills with environmental needs, introducing new concepts related to eco-design, design for assembly or disassembly, necessary to ensure full sustainability from “Recovery” (Akanbi et al., 2019).

The circular concept is further linked to the Product Service System (PSS) principle that changes the mode of use of products or access to services (Tukker, 2015). Companies that use the PSS model, integrate products and services to satisfy the consumer and allow the product to be kept in use for as long as possible by changing the relationship between supplier and user. “Industrial symbiosis” is an additional element in promoting the competitiveness of new circular business models. The creation of a network of exchanges in order to be able optimally manage waste and resource depletion is defined by Brian Baldassarre as “[...] a collective approach to competitive advantage in which separate industries created a cooperative network to exchange materials, energy, water and/or by-products” (Baldassarre et al., 2019) and can be mentioned as one of the founding principles of circular economy.

“System thinking” is among the principles of CE, an element of interconnection among all the factors that conditions the complex system of relating to stakeholders. “Systemic thinking” acts in the flows and correlations between space and time, allowing to perceive change in advance, identify future scenarios, in a mid-term approach (Arnold & Wade, 2015). The BSI also focuses on this principle in the 8001 standard.

(British Standards Institution, 2017). It also identifies the capacity of organizations to completely rethink management of resources and energy, in order to improve the financial, environmental and social benefits (British Standards Institution, 2017). Niero and Riviera identify “System thinking” as the core of the lifecycle of the product and present a study on the importance of the integration of the BS 8001 principles. Pauliuk instead focuses on “System Thinking” to understand how management and monitoring policies of services and products affect the use of large-scale materials (Pauliuk, 2018) while Arnold and Wade focus on the role of communication (Arnold & Wade, 2015). Value optimization is identified as a principle by standard BS 8001 (British Standards Institution, 2017). Organizations maintain all components and materials of products to maximum value and utility at all times. Niero and Rivera consider it as an iterative life cycle characteristic that can lead to an improvement in efficiency and performance with a consequent increase and optimization of resources (Niero & Rivera, 2018), other authors (Jiang, Wang, Zhang, Mendis, & Sutherland, 2019) consider it as a way to achieve the recovery of the optimal value of used components and improve the economic benefits resulting from the regeneration of the end-of-life product. Badurdeen and Jawahir focus on the creation and optimisation of value through sustainable production, also supported by academic experts and/or industry professionals and government representatives (Badurdeen & Jawahir, 2017). “Stewardship” is the essence of relationship management (British Standards Institution, 2017). The leaders of organizations pursuing this principle assume an awareness of decisions, responsibility for actions and results. It also used for the quantification of economic social and environmental impacts, for the evaluation and recognition of trade-offs (Niero & Rivera, 2018). Pauliuk defines it as the aspect able to address the review of decisions with respect to the lifecycle of materials (Pauliuk, 2018) while for Kalmykova et al. the conservation of resources should be pursued through methods of recycling or regeneration through a strategy of “product stewardship” or “end-of-life” (Kalmykova, Sadagopan, & Rosado, 2018) which can support circular economy for future challenges and benefits to come (Jensen & Remmen, 2017). In fact, in the form of “shared responsibility”, “*product stewardship*” takes on value especially in relation to the packaging supply chain (Lewis, 2005) or as a means to promote significant changes between society and the productive world in a perspective of ecological modernization (Lane & Watson, 2012). “*The Innovation*”, although it represents

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a generic concept that finds within the literature numerous fields of research, it is inserted within CE as a principle to reaffirm the role taken by organizations in the generation of new knowledge focused on the realization or redistribution of value (British Standards Institution, 2017). Niero and Rivera consider “Innovation” as a tool for implementing a social and environmental economy through the opportunities it offers in achieving sustainable goals (Niero & Rivera, 2018). In this context, eco-innovation is the basis for transition (de Jesus, Antunes, Santos, & Mendonça, 2018) of increasing circulation and competitiveness of companies (Pieroni, McAloone, & Pigosso, 2019). The “*Transparency*” assumes an openness for organizations to favor the possibility of promoting transition to a circular model using clear, transparent and timely communication (British Standards Institution, 2017). Certification standards succeed in transferring this degree of transparency, especially in the use of environmental declarations (Kirchherr, Reike, & Hekkert, 2017; Niero & Rivera, 2018) and the progressive improvement of performance sustainability, enhancing the role of the consumer and the community (Mol, 2015).

The “*Collaboration*” allows to create a mutual business value (British Standards Institution, 2017) in a period of sustainable development among stakeholders (Niero & Rivera, 2018) capable of stimulating the search for agreements to put entrepreneurial models and CE principles into practice for promoting new ideas. In this regard Veleza and Bodkin have demonstrated how collaboration between contractors and suppliers throughout the supply chain can lead to reductions in the use of raw materials and waste (Veleza & Bodkin, 2018) by promoting new and more sustainable business models (Witjes & Lozano, 2016).

From the analysis of the literature, however, a gap emerges with respect to the relationship between the new international standard B Corp and the Circular Economy, although they share many principles and aims. The need to bridge this gap starts with the selection of a specific reference area, in order to make comparable the data obtained within the same sector, in which the certified B Corps operate. However, the literature still lacks in these aspects, preventing us from defining a picture a priori about the role that these companies are taking in the transition to the new model. This study, in its preliminary phase, tries to overcome this gap to investigate how these certifications can contribute to the pursuit of the transition to the new model.

B-Corp Perspective and Tool

The concept of “benefit business” is becoming nowadays more and more widely spread thanks to a new mode of conceiving a business. Such term is associated, directly or indirectly, to the modality of managing an organization with respect to objectives that assume a social nature, oriented towards the increase of the benefits of the community and to the protection of the environment¹ (Castellani, Rossi, & Rampa, 2016).

This new business concept aims at consolidating in the medium and long term, principles that can succeed in generating added value to all stakeholders, and to those closely associated to them. The characteristic of this type of society is linked to the ability to generate innovation in different areas, including innovation in the cultural field, environmental, tourism, training, in a collaborative approach, capable of networking for the management of complex projects.

Although benefit companies and B Corporations are used as synonyms, the two corporations have a profound distinction in terms of form and substance. A distinction which, from an economic point of view leads to a hybrid company, one between a profit and non-profit status, which leads to the creation of businesses “for benefit”. This changing and moving process leads to a certification process, B Cor-

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poration, that promotes the creation of real business communities, thanks to the use of a common brand, certified B Corp, that also promote associations leading to the formal recognition of “for benefit” and to the adoption of an evaluation system (voluntary) capable of expressing the degree of impact and the creation of value.

This certification makes it possible to measure the company’s social and environmental performance using new factors to regenerate the production system, offering new opportunities for companies that become vehicles of innovation and sustainable progress. In this way it achieves a dual purpose for the company, that of continuing to make profits and that of achieving benefits, from the point of view of responsibility, sustainability and transparency.

The certification takes into account all the activities of the company in its complexity, including products, services, organizations, environmental performance, the involvement of workers in the collective economy, social, cultural life of the community and the structure of governance. In the world there are currently over 2788 B Corps certified in over 64 countries in 150 different sectors of activity, of which 85 in Italy alone, which identifies itself as the first European country in terms of B-Corps created. Within the certification scheme the first step for a company concerns the measurement of its performance of its social and environmental economic impact. Through a self-assessment of the management system, companies are called upon to define their own B impact assessment and continue through a validation path for the obtainment of the certification.

The B-Corp certification is obtained by scoring between 80 and 200 points. The protocol for certifying a company is based on approximately 150 different models, built according to company size, sector and geographical area. The evaluation is based on the relationship between the benefits generated and the negative impact produced on the environment and society. If these two figures are equivalent, the company does not receive the certification. In the event that the score achieved is greater than 80 points, then the company is returning to society more than what it is subtracting, thus obtaining the certification.

This type of certification, in addition to being voluntary, is also applicable to each sector, regardless of the activity carried out. The system is managed by B-Lab, that is an independent organization which issues the certification attesting to the environmental and social commitment, as well as to the requirements of the norm. “The B-Corps internalize their social and natural contexts and attempt to engage in institutional work to provide a thinking leadership around sustainability and to drive change on a wider scale”(Stubbs, 2017). To support communication among all stakeholders involved, every year B-Lab publishes a list of all the companies that have obtained the best worldwide results in several categories, such as: best for the environment, best for the world, best for the long term, best for community, best for works, best for word.

The GIIRS (Global Impact investing rating system) is a corporate assessment tool, created in 2011 by the Foundation Clinton Global Initiative and developed by B-Lab, with the aim of assessing the degree of corporate impact with respect to 5 areas identified by the certification system and the relative creation of value.

The GIIRS was created to change the way entrepreneurs invest with a rating and analysis approach similar to the tools used by large financial analysis companies. In order for impact investments to gain credibility for each specific sector of activity, investors must have at their disposal a tool capable of verifying investment opportunities and their performance over time. For this reason, the GIIRS has defined a strict evaluation process for companies. The data is provided by the companies themselves to a third-party certification body, before the company can receive an evaluation. Ratings are structured taking into account both a weighted average of the investing company and a valuation of the funds. This

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allows you to achieve an overall rating that includes an impact assessment, an assessment of the SEM social or environmental business or the KPI performance indicators that are specific to each sector in which the company operates (figure 1).

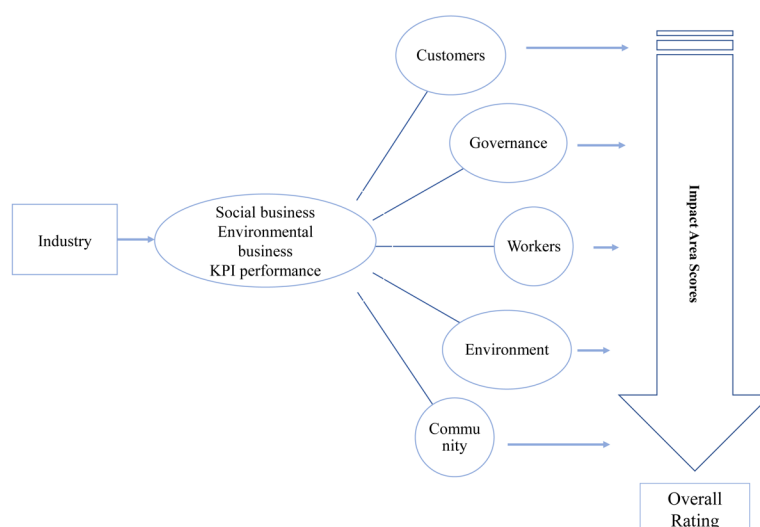
For impact investments to gain credibility for each specific business sector, investors must have at their disposal a tool capable of verifying investment opportunities and their performance over time. This is why with GIIRS a strict business evaluation process has been defined. The data is provided by the same company to a third-party certification body before the company can receive an assessment. Ratings are structured taking into account both a weighted average of the investing company and a valuation of the funds. This leads to an overall rating that includes an impact assessment, an assessment of the social or environmental business SEM or the KPI performance indicators that are specific to each sector in which the company operates. Through the GIIRS, it is therefore possible to create a benchmark on impact and performance measurements between the various operators and at the same time ensure a reliable tool to monitor performance over time. In particular, the rating of a GIIRS evaluates 5 areas of impact: governance, workers, community, environment, customers.

Through the “Governance” impact area, the system of indicators aims to clearly identify the mission and traceability (monitoring) of environmental and social performance, responsibility, control and stakeholder involvement. A code of conduct associated with internal financial controls, aimed at preventing and managing complaints or corruption and transparent financing, as well as communication with customers and workers.

The “Workers” impact area considers the fairness of performance, in particular it takes into account the adequacy of wages and career progressions/possibilities in the structure. The preparation of the worker and the ability of the organization to maintain the level of training of the staff, guaranteeing a level of transferability of the competences/knowledge and identifying the degree of involvement of the workers takes on a basic role.

Figure 1. Evaluation process

Source: (Our elaboration on Giirs index, 2019)



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The “Community” impact area focuses on the need to integrate supplier stakeholders (the basis of the total quality approach) and the constant monitoring of the satisfaction of expectations and involvement in the local community. The presence of codes of conduct aimed at ensuring the safety of workers and the working environment, as well as respect for and support for the development of local economies qualify this area. In addition, the promotion of social welfare is added to the impact area by assessing how the organizations succeed, through policies of inclusion and participation in the commitments of society, are transferred and promoted outside, including community services and charitable donations.

The “Environment” area supports the extension of corporate policies with respect to environmental sustainability, in particular towards two types of factors: input and output. Inputs include, for example, energy, water and raw materials, which require a constant and continuous temporal assessment of the reduction of impacts and consumption. Outputs take into account the effects produced by the emissions generated and the different types of waste produced, as well as the impact of transport and distribution. Also in this case, these factors require constant monitoring oriented towards policies to improve environmental performance. In addition, in this Area, the design method is considered as a solution to encourage renewability, preservability, reduction of waste, promotion or conservation of the state of nature. The cultural aspect is also taken into account, i.e. the organization ability to be sensitive or to solve environmental problems.

Through the “Customers” area certification aims to measure the impact that the policies/actions adopted by companies have on customers. In particular, this section goes into the evaluation of the relationships that the company has with its community, measuring relationships with suppliers, diversity and involvement in the local community. The ability to promote public benefits through the sale of its products or through the provision of its services must, for the purposes of evaluation, be able to influence the resolution of a social problem.

This area has the function of verifying how the company products are designed to solve a social problem. The standard in this case goes to consider also aspects related to access to basic services, such as health or training of people or equal opportunities, from the arts and increasing capital to business oriented towards these prospects.

Another type of measurement is the IRIS (Impact reporting and investment standards) which is a collection of shared metrics that measure social, environmental and financial performance with the aim of pursuing criteria of transparency, credibility and accountability in operations that measure impacts. The tool contains all the data of the organizations that adhere to it anonymously.

It is updated periodically on the basis of feedback from experienced users. PULSE is another tool used to collect financial, social and environmental metrics that integrate quantitative data on impact and qualitative performance to demonstrate where and how investments can be most effective according to geographical area, sector and period. IRIS standards are included in PULSE.

MAIN FOCUS OF THE CHAPTER

This work aims to contribute to the debate on the potential applications of B Corp certification to facilitate the transition to the circular economy. The document adopts a methodological approach of qualitative research based on the descriptive protocol of the case study defined by Yin [15], through which a comparative multiple analysis was conducted. The analysis is based on the documentary approach of Silverman, (Silverman, 2008, 2011) and is proposed as an exploratory work for the particularity of the

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field of reference and the proposed themes. The extraction of the certified companies took place from the official website of B Corp, the sector considered is “food & beverage”, while the location chosen for the analysis is that of the Italian territory. The search has produced n.8 results of certified companies B Corp that are: Island Bio, Damiano, Fratelli Carli, Local To You, Filippi, Perlage, Valli del Bitto Trading spa, Wami.

The cases were analysed to identify factors influencing the development of circular economy approaches in the impact areas of the BCorp certification. The analysis was based on secondary data documenting the cases, documents issued by the certifying body (annual reports), on the documentation available to companies.

The next step concerned the analysis of the ranking obtained during certification and of the impact areas identified by the standard. At this point, the authors have provided, through a process of interactive analysis of individual case studies, to define in a shared way a paper-concept table, excluding non-pertinent information, to be used in the discussion of the results. In this way it was possible to reconstruct the picture of the critical factors of the circular economy activated by each company B Corp. A final evaluation was expressed on the ability/potential of the companies to activate circular business models, according to the value of the ranking obtained, the impact areas covered, and the requirements defined by the standard. Within table 1 a description of the companies considered is given.

The ranking analysis (see Table 2) shows a fair result in terms of total score of the companies considered. Although two companies are at the minimum certification threshold, it is possible to identify excellence both in terms of the final evaluation of the entire system and of the individual areas of impact. Of the eight companies considered, in fact, four are able to achieve recognition in terms of global excellence in the areas of the environment (F.lli Carli and Damiano) and in that of Governance (Wami). The companies marked with an asterisk are those that have distinguished themselves with the recognition granted by the B Corp “Best for the Word Honorees for the impact area “Governance”, est for Environment for the impact area “Environment” (each asterisk equals more years for the same award. The distribution of scores for each impact area is rather heterogeneous and does not reflect the total score achieved, but where each company seems to excel in a field of certification and not have a good level for all areas. This means that companies are still in a phase of growth in the process of adoption and implementation of B Corp certification to all proposed areas of impact. This is demonstrated by the recent acquisition of the certificate, also by the exception of the company F.lli Carli. In fact, even though this company obtained the certificate in 2014, it was not able to raise the level of all the impact areas, but it showed its strong point in the Environment area, obtaining the Best for the Word Honorees award for three years in a row. A further aspect characterised by all types of company is the absence of an evaluation of the Customer aspect. This measures the positive impact of the company on customers through products and services. The intention is to create benefits for the users, and in general for the stakeholders. This aspect is crucial for the Benefit policies, but it doesn't appear in the cases analyzed.

The scenario that emerges from the concept table highlights the areas of B Corp certification and the way in which the standard manages to activate the principles of CE.

The role of the community, the transfer of values, the participation of staff in the activities of the local community is undoubtedly one of the critical elements of this discussion. Certifying B Corp certainly brings advantages in terms of image for companies, but the real visibility and added value is perceivable from the analysis of cases, in actions to support the community. It becomes a protagonist, in a process of co-participation of social initiatives.

B Corp Certification for a Circular Economy Approach and a Sustainable Pathway*Table 1. Enterprises object of the analysis*

Island Bio	The company has an industrial production of organic products such as vegetable beverages, breakfast cereals, cooking creams, fruit juices. It operates under its own brand Isola Bio or through Abafoods. It has an integrated supply chain that goes from the possession of agricultural land in different Italian regions to a network of agricultural producers for the production of high quality cereals, and a storage center for cereals. The biological aspect concerns the production of soya, oats, millet spelt, sorghum and sunflower oil. The marketing is done by Isola Bio, owned by a Dutch food multinational. It obtained B-Corp certification in 2018.
Damiano Srl	The company is a worldwide producer of organic almonds and hazelnuts that it grows in Sicily. The company also manages the production chain (cultivation, control, processing, packaging and distribution) of organic dried fruit, creams, flours, cereals and grains. It has a heterogeneous system of product and process certifications to guarantee the quality, transparency of the supply chain and safety of products sold internationally. Certified B Corp since 2016.
F.lli Carli	The company Fratelli Carli stands out for its ability to sell online its own production products of high quality, such as extra virgin olive oil, vinegar, olives, in oil, sauces, condiments, gastronomic products, wines, cakes, soaps and cosmetics olive oil. The company adopts an innovative production system for the production of oil, which is the company's main product. It obtained B-Corp certification in 2014.
Local To You	The Company operates as an e-commerce platform. It promotes organic farming at competitive prices at local level with wholesale and retail sale of food products with attention to the quality of crops and products. It brings together social cooperatives and farms, managing to make deliveries even at home The company was awarded as "Start up innovative 2017" by the Emilia Romagna Region for the 'high intensity of knowledge. It obtained B-Corp certification in 2017.
Filippi S.r.l	It is a family-run artisan pastry shop of leavened cakes that operates on an international context. He introduced the logic of CRS into his business. It obtained B-Corp certification in 2016.
Perlage	The company deals with biodynamic agriculture for the production of organic prosecco. Strongly internationalized, it selects a variety of grapes for the production of Glera, Merlot, Cabernet, Pinot Grigio, Chardonnay, Verdiso, Rabosa, Incrocio Manzoni types. It has been certified B-Corp since 2016.
Wami S.r.l. S.B.	A brand of highly digestible, oligomineral water with one of the lowest sodium contents in Italy that springs from the Maritime Alps and the Rainbow Spring. It has a national distribution in the form of PET and glass formats. The attention to the environment and to the role of the community is preponderant for the company that contributes to preserving the environmental characteristics of a locality, being its product formtamente linked to a virtuous management of the territory. The B-Corp certification with a score of 96.8.
Valli del Bitto Trading spa	The company promotes and markets the cheese of the Valli del Bitto, which is protected by a product trademark: Storico Ribelle. The traditional production process makes it possible to safeguard quality and territorial identity. The company operates through a Consortium that brings together several producers who continue to produce this cheese with a series of traditional practices in the mountain pasture. Obtains B-Corp certification in 2016.

Source: (Our Elaboration, 2019)

Table 2. Ranking for B Corp enterprises

Enterprises	Governance	Workers	Customers	Community	Environment	Total point
Island Bio	11.1	24.6	/	12.2	32.4	80.4
Damiano	6	17.5	/	22.6	60**	106.1
F.lli Carli	7.2	22.6	/	25.1	42.4***	97.3
Local to you	9.9	15.0	/	45.1	34.6	104.6
Filippi srl	12.1	19.8	/	43.5	13	88.4
Perlage	8.0	17.1	/	20.2	35.5	80.8
Wami	17.6*	/	/	72.1	7.1	96.8
Valli del Bitto Trading spa	9.9	24.2	/	35.8	12.5	82.4

Source: (Our Elaboration on ranking data, 2018)

B Corp Certification for a Circular Economy Approach and a Sustainable Pathway*Table 3. Impact Areas Concept Matrix*

Company name	Governance	Workers	Customers	Community	Environment
Organic island	Strengthening of the brand in the communication of values and practices adopted by the company: - biological aspects, - sustainability, vegetable, - certification - innovation, - green culture, - development of new organic markets	Training of workers Worker benefits on achievement of objectives, such as: - life insurance - salary for trainees - virtual meetings to avoid travel	N.A.	Donations in cash and with your own products Collaboration and involvement of charitable organizations and against social distress: - fundraising for charity for earthquake victims (organization of football tournaments) - and disabled people. Purchases from local suppliers who are assessed through social and environmental standards for microfranchising certification-microdistribution Flo Cert certification. Provides support to low-income markets to improve the income of small producers in developing countries Educational projects with schools for Food, Sustainable Development and Respect for Biodiversity	Energy from renewable sources - water zero waste - water treated with more controlled reverse osmosis - plastic-glass recycling -metal-paper and composting - certifications: brc/ifs-fairtrade-iso 22005-kosher-biological certification- IBD organic Brasil-SA8000- CSQA greenhouse gas emissions- - Since 2011 he has been Corporate Golden Donor for the Italian Environmental Fund for the protection of the environment and culture. - It has built a plant for the self-production of clean energy and a zero emission thermal carrier that can reach efficiency over 85%.
Damiano	Acquisition of small processing companies to make production viable in terms of exports. Participates in the "Elite" program of the Italian Stock Exchange Financial operations and aimed at acquiring innovations for packaging Transparency and assurance actions through the use of integrated certifications	Through the Damiano Foundation, the company bears the unforeseen costs of the worker for the purchase of a house (e.g. taking out a loan) or bears the university costs of the children of its employees. employee honor loans	N.A.	Purchase of land and farm in continuity with the old property (involving the old owners) in accordance with the traditional techniques of the company Damiano. Project COCHO, design competition, for the launch of a new product. The company is a Flo-cert operator in Italy for both cocoa and chocolate.	Certification kosher- Fairtrade- Eu BIO/Biosuisse/ NOP/ IBD Vegan gluten free IFS certification Equipped with an innovative packaging system that allows you to make packaging from 100 grams up to one ton The Damiano Foundation is committed to supporting research into organic farming and new environmentally friendly technologies in the countries of the South of the world. The company Damiano is one of the founding partners of the Bio district of Nebrodi for the sustainable development of the Nebrodi area. Winner of the Best for environment Award
F.Ili Carli	Definition of a Welfare Plan and projects in favour of workers. Assumes as its mission a value model of transparency, correctness and competence	Respect for gender equality (Over 42% of shares are pink), of employees with permanent contracts. Project "Free of.... Welfare", the company helps to define a work-life balance and converts part of the production premium or the entire premium between employees by awarding vouchers for shopping, gym, travel or for the babysitter or for health or insurance costs. Promotion of staff training courses. A programme to assess the individual skills and aspirations of employees.	N.A.	She collaborates with AIFO and with the Cambodian missionary sisters in a worldwide voluntary association to which she devolves a part of the proceeds for projects of childcare and development in the countries of the South of the world.	E-Commerce Quality Mark - ISO27001:2013 Management and Safety System Certification SGS food- the choice of materials and products with 100% recyclable packaging with 75% glass recycling rate, 100% vegetable-based printing inks and 100% PEFC pallets certification. Energy produced by photovoltaic systems, CO2 reduction through door-to-door deliveries. The percentage of waste delivered to disposal consortia is also about 100%. Use the Net-Comm seal to demonstrate your commitment to transparency and quality of the consumer you buy online. Recycling Project: this is an educational project funded by the European Community and created in 2011 for the recovery of used vegetable oil of domestic origin, to be used to obtain biofuel with low environmental impact. It has set up a sustainability committee. The "CO.SO. "which is composed of representatives of all business realities that collaborate with the company.

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B Corp Certification for a Circular Economy Approach and a Sustainable Pathway*Table 3. Continued*

Company name	Governance	Workers	Customers	Community	Environment
Local to you	Definition of a mission to support quality, sustainability and social value creation. Facilitation of corporate welfare policies.	It promotes the training and education of workers. It hires workers who have disadvantaged situations, promotes the reintegration of disadvantaged people (ex-toxicodipens or disabled). Local To You employs 23 low-contract people, 8 of whom are migrants seeking asylum. With a view to corporate welfare, they propose the creation of purchasing groups to receive office expenses and facilitate the working life of employees	N.A.	E-commerce commercialization founded a NEWCO to facilitate the entry of industrial partners to safeguard the social purpose of business decisions for new job opportunities. It develops projects with local agricultural companies and rehabilitation activities (orthotherapy), with the involvement of the "La Nuvoletta Bianca" Centre. It collaborates with social cooperatives for the development of the "SEMINO" project for social agriculture. He collaborates on projects of rural social innovation. It collaborates with schools on the "Vitamin C" school project on the themes of food, environmental protection and sustainable mobility.	Promotes biodynamic and organic farming. It favours the use of methods that respect the environment and health, with respect for seasonal cycles, and favours local production. Cultivate sustainably.
Filippi s.r.l.	Develops corporate welfare programs for economic benefits, improvement of the quality of life and health of employees. Institutes Prevention Day. Transforms its legal status into a Benefit Company (SB). Purchasing policies with fair trade chains. Use of extra virgin olive oil in the production. Buy only free-range eggs of Italian origin.	Organizes professional qualification courses. Involvement of staff participates in the social life of the company. Creation of special staff areas (canteen, leisure activities). Organization of a corporate trip with all the staff. Birth bonus (one thousand euros for each employee who becomes a parent).	N.A.	It gives priority in the recruitment of staff with economic disadvantage by favouring women and without discrimination to non-Italian staff. It collaborates with a cooperative of disabled children, non-profit donations to Engim Onlus that promotes the inclusion at work of disabled people. Donation to the women's basketball team of the country for the purchase of sports equipment. Sponsorship of local community sports activities. It supports an association for the promotion and diffusion of theatre and culture in the community. Creation of a local district for interaction with local suppliers.	Product life cycle verification and traceability. Maximizing energy efficiency and use of renewable sources, reducing Co2, 72% of waste is recycled. Using FSC Certified Paper. Re-use of production waste in beekeeping.
Perlage	Orientation of the company's mission to the guarantee of products through dam certification, organic certification, responsibility towards social relations. Establishes services of collaboration with suppliers and schools. Reinvestment of 60% of profits in technology and innovation. Publication of objectives and progress in terms of social and environmental performance. The company is established as a BRC - British Retail Consortium.	Promotes internships and flexibility of employees' working hours. Join the Social Inclusion Challenge program for the theme of social inclusion in the company with corporate bonuses, health care, internships for disabled children. Promotes internal training (haccp, and on the standard ISO 9001: 2015, team building). It favours the stipulation of permanent employment contracts. Employee benefits, e.g. fuel bonuses and FASA (Alimentary Health Care) fund access	N.A.	Organization of cultural events. Support to companies on the production of organic wine. Attention to social issues through collaboration with associations for the disabled. Develops network projects with competitors. He's got projects in place with high schools. On the reduction of water waste in the cellars. He has collaborations with the school of enology of Conegliano and with C.E.O.D. and C.E.C.A.T. It implements social promotion initiatives, such as campaigns to fight breast cancer "Corri in Rosa" of San Vendemiano, screenings of documentaries "Cinema in cantina", art exhibitions and participation in conferences on sustainability issues, cooking classes and dance classes, sensory dinners in the cellar, projects and agreements with research institutions, internships for disabled children and post-graduate internships.	Organic wine production with respect for the soil and biodiversity. Certifications: DEMETER BRC/IFS, certified NOP U.S.A., A.V.I. Label Veg in the vegan and organic sector. Equipped with an Eco-point that provides information about the company's commitment to the environment. Use of ecopallet, PerlAPP bottles, recyclable packaging cartons. Investment in a Corporate Purifier. Calculation of the carbon footprint, Differentiation of waste insertion of solar photovoltaic panels and the purchase of green certificates. Joins Rafecycle's wastepaper recovery program. Experimentation for the reduction of copper in agriculture. It promotes biodynamic farming methods to reactivate the microorganisms present in the soil...

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B Corp Certification for a Circular Economy Approach and a Sustainable Pathway*Table 3. Continued*

Company name	Governance	Workers	Customers	Community	Environment
Wami	A vision oriented towards transparency and engagement on water projects. Transparency towards the community of the benefits achieved, through periodic publication of data. Allocation of part of the profits for water resources. Traceability with unique code bottles. He won the world honoree best for governance award in 2018.	Growth of its employees up to 70% of current hires High working standards and benefits with flexible working hours for employees. Involvement of employees in water projects carried out in the territory. Employee access to financial information.	N.A.	Create an online community with a report of all the liters of water donated and the villages created. Participation in the project conceived by WaniRide With A Mission to reach donations for the construction of a water network in the district of Tenghory in Senegal. It favours the creation, in Africa, of local associations of aqueducts that maintain the efficiency of the structures, through dedicated personnel. He collaborates with Life water international, Acra foundation, Amref and SRI Lanka and with Oxfam. It contributes to the creation and development of disadvantaged communities through the construction of aqueducts and creates new jobs. It encourages education and improves the health of the population. It sensitizes and educates the community to a correct consumption of water, in all its forms, and makes the user responsible for the disposal of de-packaging.	Creation of a shared work environment. Use of 80% recycled, fully recyclable display materials Promotes CO2 savings by encouraging the use of public transport. The packaging used is 100% recyclable. He planted 60 trees at the Parco Nord in Milan for the CO2 reduction.
Valli del Bitto Trading spa	The mission of the company oriented towards the pursuit of objectives of social innovation. It favours the association between producers, improving organization and bargaining power. Encourages the creation of rural networks.	Hiring of 3 employees for the point of sale, museum and online promotions Administrators and employees participate as voluntary workers in local associations.	N.A.	Engaged in activities of dissemination of innovative experiences in the field of creativity, commercial, agri-food, economic sustainability, protection of native species. Supports initiatives aimed at creating value for the community also through participation in rural networks at national and international level	It offers sustainable economic solutions to reduce environmental impacts by improving its integration with economic and social networks- energy savings in agriculture, livestock, food. It defines a production specification for the respect of milk processing methods, natural feeding on pastures, rotational grazing, preservation of native breeds, and provides for the exclusion of ferments and feed on pastures.

Source: (Our elaboration on enterprises data, 2019)

The Governance area outlines the management's commitment to promoting sustainable, environmental, social and transparency values. This area also highlights the various initiatives undertaken, such as the use of certifications and the activation of secondary markets for the purchase or sale of products. This is where the "high" principles of the EC concerning "System Thinking", "Stewardship", "Transparency" and "Collaboration" are gathered.

In the cases analysed, it clearly emerges how the Governance area manages to activate them, stimulating organizations to rethink the management of their own resources, in order to assume greater responsibility for the proposed actions, guaranteeing openness and transparency in the adoption of guarantee instruments, such as certifications, or activating behaviour inspired by mutual business value.

The other areas have the capacity to activate mechanisms of circularity, especially from the point of view of behaviour, oriented towards the responsible use of raw materials, the recycling of products, and the involvement of primary and secondary stakeholders. The involvement of the Community offers the possibility of intervening on the capacity to generate new employment, promoting environmental sustainability and solidarity (Poponi, Colantoni, Cividino, & Mosconi, 2019)

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The Worker area emphasizes the principle of “Stewardship”. Employees are involved in the choices of business policies and social initiatives of the company (see for e.g. Wami and Filippi), with a consequent empowerment of workers that leads to the establishment of a positive corporate climate, also favored by the possibility of access to corporate benefits.

Being a B Corp also means strengthening your brand, generating confidence in your stakeholders and ensuring a return on profit and credibility. The role of the community becomes therefore fundamental, where the principle “Collaboration” finds its maximum expression for its application. The involvement of local suppliers and the activation of secondary markets, as well as the stimuli arising from collaborations with various associations for the inclusion of disadvantaged people in the work, projects with schools aimed at education oriented to sustainability, the environment and food, undoubtedly make this area of strategic impact to activate a virtuous behavior of the consumer. A not insignificant element that the certified company B wants to communicate is the responsible aspect through which it acts in a perspective increasingly focused on the figure of a consumer, attentive to the methods of implementation of the production activities of a ‘company and the policies of environmental sustainability of the same. The analysis shows an important gap. The B Corp certification, especially in the 2019 news, includes a section dedicated to Customers stewardship to better understand how companies manage value and impact towards customers, with measurement metrics that refer to inclusion performance, fairness and diversity. All the companies considered did not obtain an adequate score in the Customer area. In fact, although the role of the consumer is indirectly called for in the various areas of impact, especially in the community area, there is no real commitment on the part of organizations in this area. This has two important implications, one on the system of enterprises in the food area, and the other on the B Corp certification system. In the first case, it is necessary to reconsider the strategies of Benefit-Business, considering a direct involvement of the consumer in corporate policies so that the impact of social policies can be measured. Only through this phase it will be possible to undertake a path oriented to the continuous improvement of the presentation (Crosby, 1997; Deming & De Vio, 1991). On the other hand, companies will have to equip themselves with adequate tools, in terms of highly specialized human resources, to facilitate the effective application of the requirements of the area. In the second case, it denotes the need to intervene by the management system of B Corp with systems to assist companies so that this point, so strategic for the set of values Benefit, cannot be omitted from the calculation of the ranking for obtaining certification.

The Environment area, due to the characteristic of the sector identified, is not able to generate a paradigm shift towards the EC. It undoubtedly contributes to an improvement in the environmental performance of companies, thanks to investments in technology to reduce emissions, to include innovative packaging systems, to encourage the internal recycling of waste. The product and system certification tool acts as a bottom-up stimulus, in a bottom-up logic, in line with the literature (see for example (Llorach-Massana, Farreny, & Oliver-Sol, 2016; Merli & Preziosi, 2018; Poponi et al., 2019; Ruggieri et al., 2016; Sousa-Zomer, Magalhães, Zancul, Campos, & Cauchick-Miguel, 2018; Zeller, Towa, Degrez, & Achten, 2018) products more sustainable and in line with EC principles. Companies emphasize the biological aspect of their products, the processing techniques that preserve biodiversity and the environment.

In general, in the cases analysed, there is no real switch to the EC paradigm. Without a doubt, in this particular sector, B Corp acts as a stimulus to the highest principles of the EC, such as System Thinking, Stewardship, Transparency and the Collaboration. This system undoubtedly favours a cultural transition, representing a stimulus from below, which leads to the activation of the principles in a collaborative

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perspective, where the role of the community and more markedly having adhered to a global movement allows to activate virtuous behaviors of all stakeholders for the pursuit of economic and social growth.

FUTURE RESEARCH DIRECTIONS

A common strategy for implementing the circular economy concerns the application of the principles within the certification standards. Consequently, an implication concerns the need to periodically review the certification framework with potential related to the application of new innovations (e.g. industry 4.0) to integrate the principles of the circular economy into business development models, and to improve the environmental sustainability of a production process or product.

Furthermore, the implications concern the identification of standards increasingly coherent with the evolution of consumer behavioral choices, during the purchase and disposal phase of the product.

The exploratory nature of the work and the documentary analysis carried out can represent the main limitations of this work, the uncertainties and discretion were reduced using a replicable approach to conduct studies on the subject of analytical models that consider our scenarios. Among the main limitations of this analysis we find a reduced case of analysis, focused on a defined industry and a lack of clear references in the literature such as to identify a specific set of indicators on which to base a generalized model.

The future research steps concern the study of the stimuli offered by the application of B Corp certifications on wider contexts, which can compare the composition of companies in international contexts.

Further works are needed to collect data on B Corp valuation models and the application of CE principles. This could be done through a systematic analysis of the sector identified on heterogeneous framework. These further analyses will contribute to reveal the role of certification as a bottom up lever for sustainability, and to associate the ranking assigned by the certification to the circularity degree reached by each enterprise.

CONCLUSION

The chapter proposes a critical review of the B Corp certification and its potential application as a tool to facilitate the transition to the Circular Economy.

Circular Economy is the result of the application of the paradigms based on new levers of growth, such as green economy or sustainable development, which include a more efficient use of resources, the respect of ethical, social and environmental values. Benefit Corporations are companies pursuing these objectives with the twofold aim to reconcile business performances (economic and financial) with the ethic and the sustainability principles. In these new business models the idea of social responsibility as a form of self-regulation is strengthened (B-Corporations, 2017; Wilburn & Wilburn, 2014). Through a voluntary certification scheme, these companies aim, in fact, to rebalance their mission and business activities-affirming principles of social responsibility, so simultaneously getting both their profit and non-profit objectives. This approach finds its full application in the management system within a new B-Corp certification frame, to support the creation of a community of companies interested in promoting social and environmental concerns, encourage the development of an adequate legal framework of benefit business, and conceive an innovative evaluation standard.

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In the proposed analysis, the ability of companies to activate mechanisms of circularity within the areas of impact of the certification clearly appears. The aspects most stimulated by the certification concern the involvement of governance, the orientation towards the responsible use of raw materials, a higher awareness of product recycling, and a greater involvement of primary and secondary stakeholders within the context of Circular. The Community impact area offers the possibility to intervene on the ability to stimulate and involve local actors, fostering new employment and an environmental-solidarity sustainability. The characteristics of the selected companies do not allow to have a radical switch toward CE, compare with other industry where B Corp certifications work (Poponi, Colantoni, Cividino, & Mosconi, 2019; Ruggieri, Mosconi, & Poponi, 2018; Ruggieri, Mosconi, & Poponi, 2018). Moreover, the B Corp stimulate the change, pushing on high principles of the CE, such as System Thinking, Stewardship, Transparency and the Collaboration.

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*B Corp Certification for a Circular Economy Approach and a Sustainable Pathway***KEY TERMS AND DEFINITIONS**

B-Corp: A new way of doing business through a transparent, sustainable and social business.

Benefits Corporation: Evolution of the corporate concept with social objectives as well as profit objectives.

Business Model: Model through which an organization adopts strategic and organizational solutions to create a competitive advantage.

Circular Economy: A business model for managing sustainable value creation.

Ecodesign: Design of a sustainable product with the consequent reduction of environmental impact.

Sustainability: Process in which economic growth is oriented towards environmental and social respect.

Sustainable Production: Creation of consumer goods with raw materials whose value can be maintained or recovered.

ENDNOTE

- ¹ G.Castellani, A.Rampa, D.De Rossi, Benefit Companies. The new perspective of a Corporate Social Responsibility with Commitment, National Foundation of Accountants FNC document 15 May 2016