

## **Sustainability – bringing about a value changes amongst employees**

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### **Abstract**

In the past decades, the topic "sustainability" has received increasing attention, and many companies feel obligated to act more sustainably. However, they often face difficulties when trying to implement sustainability-oriented business practices. In order to enable a successful change, the existing convictions and fundamental assumptions of an organizations' members regarding sustainable thinking and behaviour must be changed. Though some employees do not need to be convinced, a full culture and value change in the organization is necessary for a transformation. The results of this work show that intensive, transparent communication and involvement of the organisation are the keys to success. Through them the employees are made aware and motivated appropriately for contributing towards the topic. Communication is also the tool that enables employees to act out of their own beliefs with a sustainable orientation. The long-term goal is a sustainable anchoring of the new values in the employees' minds, which is then the basis for corporate action and success.

### **Keywords**

Communication, corporate culture, value change, motivation, sustainability

### **Introduction**

With environmental problems like deforestation, global warming and the scarcity of resources becoming more and more evident, the concept of sustainability is getting more and more present, too. As the Brundtland Commission defined in 1987 in the report "Our common future", it has to be ensured that the needs of today's generation are met without endangering future generations to satisfy their own ones. The term "sustainability" has three pillars (social, ecological, economic), each of which is just as important as the other two. Everybody can make a contribution to sustainability. Companies that employ several hundred to a few thousand employees have a very strong lever, and also a responsibility to act sustainably. How can companies become more sustainable, is it a pure "owners' decision", is it external factors like laws and customers that drive a change, or is it rather a "bottom up" approach through an organizations' employees? Without question the culture of an organization plays a crucial role. The aim of this work is to deal with the measures that are necessary to enable a change of mindset among the employees of a company. It is not the goal of this paper to deal with the business consequences or the implementation of sustainability concepts. The main focus is on the circumstances under which a successful change in employees' values is possible in principle.

## Methodology

A literature research was carried out and complemented by a survey among master students (n =88). All of them were employed at the time of the survey, and 18.2% as managers with people responsibility, which is above the average. The findings are analyzed and are discussed.

## Background

The concept of sustainability had its beginnings in the 18<sup>th</sup> century when mining man Hans Carl von Carlowitz predicted that there would be an existential crisis if one did not stop clearing the forest. The reason for the massive deforestation was the strong demand for charcoal. Carlowitz had the idea of making forestry more sustainable. To do this, only as many trees should be cut as they could regrow [1]. This principle of forestry was even included in the law at the end of the 18<sup>th</sup> century [2]. Almost three centuries later, the term sustainability is gaining importance again due to the climate crisis. In 1980 the "World Conservation Strategy" was published by the IUCN (International Union for the Conservation of Nature). It is the destructive way of doing business that is being criticized. Furthermore, the document called for a change of mind, because, in the long run, profitable economic growth is only possible if this is done on a sustainable basis. That foundation should take into account the capacity of natural resources. The main focus was on environmental aspects. Social, economic or political reasons were only mentioned briefly [2]. There is no internationally recognized definition for "sustainability". The most widespread definition comes from the Brundtland Commission. Under the then Norwegian Prime Minister Gro Harlem Brundtland, the report "Our Common Future" was created in the course of a UN commission. The modern-day sustainability discussion has its origins in this report [3], which describes sustainable development as *"[...] development that satisfies the needs of today's generation without risking that future generations can not meet their own needs"* [4]. Animated by this spirit, Rachel Carson called in her book *Silent Spring* of 1962 for careful dealing with the environment as she warned about the long-term consequences of pesticides. This book is still considered a landmark. From then on, the idea of environmental awareness also took shape in and thanks to politics. In addition to the political conferences and their guidelines, which attracted attention, NGOs were also essential for the further dissemination of the concept of sustainability. For example, in 1996 the two non-governmental organizations BUND and MISEROR commissioned a study on the future of Germany in the course of development and environmental policy. It was in the same year that, thanks to the above-average level of interest, 1000 events took place due to the study. In addition, more than 35,000 books were distributed for the study within the first two years, which was further evidence of the increasing interest among the population regarding sustainability ideas. Apart from this study, numerous other NGOs dealt with the topic of sustainability. In doing so, they put politics and companies under pressure, demanding action [5]. As early as the first half of the 1970s, one was able to identify three basic components of sustainability: an economic, and ecological and a social one. The Brundtland Report mentioned earlier described environmental solutions in the sense of sustainability, but Agenda 21, a non-legal, global project, was the first to describe the relationship between social, economic and ecological goals. This was aimed at municipalities and cities as well as at all social groups [5]. Sustainable development not only deals with questions about justice or prosperity growth, but also with values. Sustainability itself is not seen as a predefined goal. Rather, it is a living process of society [6].

## Economic dimension

This dimension is characterized by requirements for the long-term existence of the company. Ideally, economic growth and the associated competitiveness, taking into account the other two dimensions, is also worth striving for [7]. Due to globalization, economic

competition is becoming increasingly difficult. This means that companies have to promote innovation if they want to keep up with their fellow campaigners. What sounds relatively positive at first has actually negative consequences. The methods with which mankind operates to stand out from the competition have a decisive influence on sustainable development. The result is a consumer society driven by capitalism, which does anything but acting environmentally friendly at the expense of the environment and poorer people. There are also some interfaces between economic and social sustainability, such as people's livelihood or unemployment.

### **Social dimension**

In recent decades, the importance of the social dimension has increased. Especially because of globalization, companies were seen as institutions intertwined with society. The public interest is decisive for the behavior of a company if it strives for social acceptance and a good image. The so-called "corporate citizenship" includes the different social activities and interactions of a company. This reflects, among other things, social responsibility towards people and good relationships with the various stakeholders [7]. Furthermore, it is essential for companies to ensure a working atmosphere in which employees feel comfortable and enjoy working. This concern can be derived in the form of the following goals:

- Health and security
- Social justice
- Equal opportunities
- Education
- Human rights [8]

Why companies attribute increasing importance to these goals can be derived from the following factors:

- Increasing demands of all stakeholders
- Increasing interest from customers
- Growing responsibility of companies for the entire value chain
- Increasing pressure from investors
  
- Increasing difficulty in recruiting qualified employees on the job market
- Increasing pressure from the public on transparency and openness to information
- Increasing media power [9]

For companies to be socially sustainable, not buying from suppliers that use child labour is not sufficient. The "working poor" phenomenon has received attention in this respect [10], [11]. Meuris and Leana (2015) found out that *"feelings of financial deprivation among its employees because the psychology of scarcity has the potential to spill over into organizational functioning"* [11].

### **Ecological dimension**

This dimension is a less well known term for the classic term "environmental protection". The main goal is to enable sustainable environmental development. The following goals are important factors to ensure the success of this target:

- Reduce energy consumption or make it as efficient as possible
- Sustainable use of natural resources
- Conservation of biodiversity
- Minimization of emissions [8]

Companies are known to a key reason for several environmental burden. Product responsibility is often geared towards sustainable production and at most sustainable sales [7]. However, the entire product life cycle should be considered. Simply looking at the product itself as a manufacturer is not enough if the product cannot be recycled at all or is difficult to recycle. The problem that occurs with electric cars and their batteries is an apt and current example here [12].

### **Differences between strong and weak sustainability**

The difference between the two types is that strong sustainability requires that natural capital be preserved, while in weak sustainability it is sufficient if total capital is preserved. It is assumed that natural capital can be replaced by real capital. This presupposes the fundamental substitutability of natural capital [13]. Natural capital includes both renewable resources such as biodiversity, clean water and forest resources, and non-renewable ones such as minerals. This contrasts with anthropological capital, which includes machines and various other human products used in economic production [2]. The two types sustainability represent two fundamentally different views. The aforementioned principle of substitutability is crucial here [14]. The literature defines a two-stage sustainability rule that includes the two beliefs. The first requirement relates to strong sustainability by defining that critical resources of ecological capital must be secured. This means, for example, clean drinking water and the forest population. Once this condition is met, it would be feasible to proceed according to the second requirement, which implies weak sustainability. In between "balanced sustainability" can be found.

### **Fundamentals of corporate culture**

Nowadays the term "corporate culture" is more important than it was e.g. 50 years ago. In the meantime, people are aware of the influence that the so-called "essence of a company" has on the attractiveness and economic success of a company. It was only in the late 1980s that extensive studies began to deal systematically with this phenomenon. "corporate culture" definitions are based on different approaches (e.g. evolutionary, materialistic, cognitive and symbolic) and always depend on the particular point of view. One can define corporate culture [15] as

- A series of shared values (and expectations)
- The interconnected sets of relatively persistent beliefs, values, expectations and goals that are shared and propagated by the central people in an organization
  
- The entire established structure of opinions, norms and values, which shapes the behavior of executives and employees
- Discovered the pattern of basic assumptions that a given group made up or has developed in mastering their external adjustment problems, and which have been successful enough to be considered appropriate and therefore taught to new members as the correct way of perceiving, thinking and feeling about those problems
  
- The game, the rules of which are taken for granted and applied and which only become conscious when they are violated [15]

These different definitions show how complex and diverse the phenomenon of corporate culture can be. Although they all differ in a certain way, they still have in common the fact that this is something bigger than a group of people unconsciously lives and takes for granted

The corporate culture contrasts with a purely quantitative understanding of organizations. This “soft side” of a company consists of a visible, superficial structure and an invisible deep structure. These two sides express themselves through partially visible values, habits and rituals [16] A widespread definition, which includes the most important of these aspects, is

*“ [...] The set of fundamental convictions held by a group that is typical of the group as a whole. This set of fundamental beliefs influences the perception, thinking, acting and feeling of the group members and can also manifest itself in their actions and artifacts. The basic beliefs are no longer kept conscious, they have arisen from the experience of the group and have developed through the experience of the group, i.e. they have been learned and are passed on to new group members”.*

This quote contains the central elements of the corporate culture and describes the mode of action and the analysis for maintaining or changing habits and values [16]. Although this abstract definition includes and mentions all important factors, a practical or tangible explanation of the term is missing.

The larger a company, the more likely it is that subcultures will form within the organization. These occur when, for example, a department / group shows different behavior patterns or approaches for the same situation than the rest of the company. The basic existence of these smaller cultures can be seen as neutral. It depends on the individual case whether they are supportive / useful for a company or even obstructive, i.e. conflict with other cultures

As already mentioned, a corporate culture consists of a visible and an invisible part. The latter part is particularly pronounced in older companies than in younger companies. The reason for this is that a large amount of manifestations have been formed within a culture over time. This means that the basic beliefs are central and that the members of the organization have a collective mindset, which maximizes the proportion of invisible axioms and makes the visible part almost unimportant. The two components of the corporate culture can be clearly illustrated as an iceberg model. Like an iceberg, the fundamental components of a corporate culture are not above but below the surface. But unlike an iceberg, the proportion of the visible part is greater in a corporate culture. However, it is likely that after a certain period of time the visible manifestations or artifacts will move into the unconscious and thus become an invisible part, since the originally specified goals and instructions develop a life of their own and are no longer questioned.

### **The three levels of corporate culture**

In order to understand culture, it is necessary to dig deeper into the topic in order to enable a more specific idea. Accordingly, the behavior patterns, rituals or basic values mentioned are merely manifestations of a corporate culture. The culture itself consists of three connected levels. These range from the visible to the unconscious and unspoken. Uncovering and analyzing these layers requires an intensive examination of the culture [17]. The model of the three levels serves as a supplement to the iceberg model and enables a differentiated analysis [15]. In order to make the concept of corporate culture more tangible, E. Schein (2006) defined a model with three different levels: that of artifacts, values and assumptions [15].

### **Rules, guidelines and standards**

Rules include all standards and guidelines, such as work and vacation regulations, travel expense reports and various others that affect safety and quality. These represent the formal

rules and standards. The informal rules and standards against it are not accessible to everyone because they were not written down. As a result, only long-standing employees or "interested parties" who have actively dealt with it are aware that, for example, the working time regulation or expense regulation can be treated "more generously" [15].

### **Proclaimed values**

The next lower level, that of the proclaimed values, makes it possible to deepen the artifacts and the resulting impressions. These values are usually publicly represented on websites, flyers and the like and stand for the principles, values, vision and morals of the respective company [17]. This means that the organizational members and external participants (customers) are made aware of what the company stands for and how it acts [15]. These corporate values dictate to employees how to behave in certain situations. This affects their behavior. An example of this would be the decision-making process. Companies that prefer a decision-making path that is defined hierarchically are in contrast to companies that opt for a participative approach in which all relevant participants from all levels are involved. The question here is which method plays a role is more effective, no matter. The different approaches reflect the fundamental values of the company.

### **Basic beliefs**

The lowest and therefore the deepest level consists of the fundamental beliefs or the "innermost core" of the corporate culture [15]. These beliefs are an orientation for the organization members, whose behavior and thinking are influenced by it. Assumptions and values have a huge impact on how a cultural member acts and thinks because it affects what is considered to be compliant. The values and norms from the level above, on the other hand, serve the purpose of an instruction manual, since they are the basic assumptions for what is perceived as right or wrong. For illustration, reference is again made to the iceberg model [18].

### **Requirements for implementing sustainable change**

If companies decide to apply a specific sustainability concept, there can be several reasons. Ideally, this is done at the management's own discretion. The approach differs of course depending on how strongly committed the company is. The plan to operate sustainably is also supported in certain cases by legally introduced guidelines. Of course, incentives of their own interests far greater and more important than those that emerged more or less involuntarily. When introducing sustainability into the company, it is not about introducing a new, alternative energy source or a recycling system. Of course, this is not excluded, but the goal is different. Namely to gain a general understanding and a networked way of thinking with which the economic, social and ecological connections can be better understood. In this way, the company would ensure that its cultural members make more sustainable decisions because they are aware of the consequences of their actions [19].

### **Reasons and requirements for corporate sustainability**

In order to ensure the successful implementation of sustainability goals, factors such as commitment to management, further training and a change in culture are essential foundations [19]. Companies can have a variety of reasons for the sustainable culture change they are striving for. A relatively large number of incentives for sustainable rethinking result from economic advantages. In this way, companies secure long-term survival, which is also more likely than unsustainable companies to survive times of crisis. As a result, sustainable business relationships, among other things, also create solid relationships with

customers, a respectable reputation among the population and an attractive and appealing image as an employer. In addition, the company's own employees are motivated by the company's positive strategy and their attitude to work is also positively influenced [20].

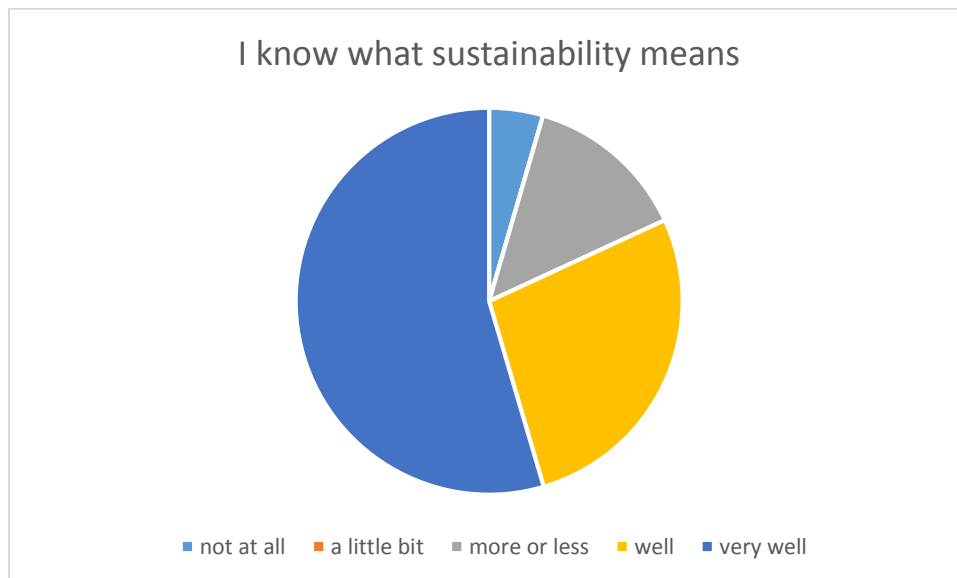
Other reasons could be competitive advantages resulting from the integration of sustainability. Cost reduction potentials could be used to consolidate the market position or ideally increase the market share. One potential would be to use ecological sustainability in the company, which would reduce water and energy consumption. Beyond the ecological component, social and economic factors also play an increasingly important role. They help you to differentiate yourself from the competition and thus gain an advantage [20].

By taking preventive action, risk management would also benefit from the measures, because any possible risks in the future will be eliminated beforehand.

Furthermore, due to the high challenge that the project entails for implementation, entrepreneurial innovations and developments arise. For this reason, the challenge itself is seen as a separate reason [20]. In principle, the "Change in corporate culture" project requires a strong motive as the first requirement. It is precisely this motif that recognizes that what has been learned and done so far is no longer effective and that a change must take place. This change means unlearning and relearning other ways of working and acting in your own interest. As a result, those affected develop a so-called fear of survival, which serves as an incentive to change the culture. In order for a holistic concept of sustainability to be created, it is important that the companies themselves have honorable motives. Such would be, for example, protection of the environment, justice or (social) reason. So whether the incentives were created on a voluntary basis or not plays a major role [17].

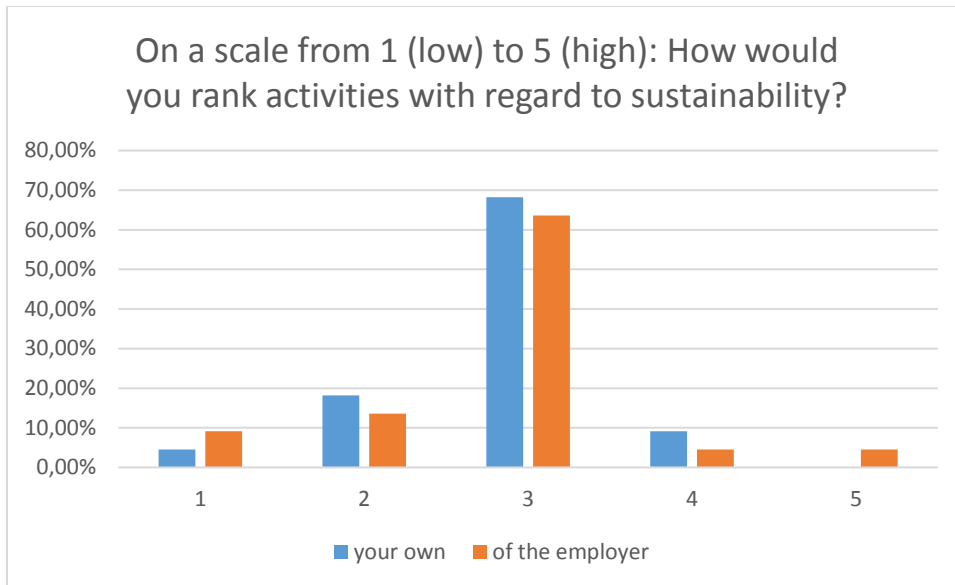
### Survey with 88 part-time master students

In order to find out about today's workforce, a group of 88 part-time master students of industrial engineering from Austria was surveyed with regards to sustainability. Islam et al. (2019) have assessed the effect of corporate culture on sustainability performance [21]. A similar approach was taken here.



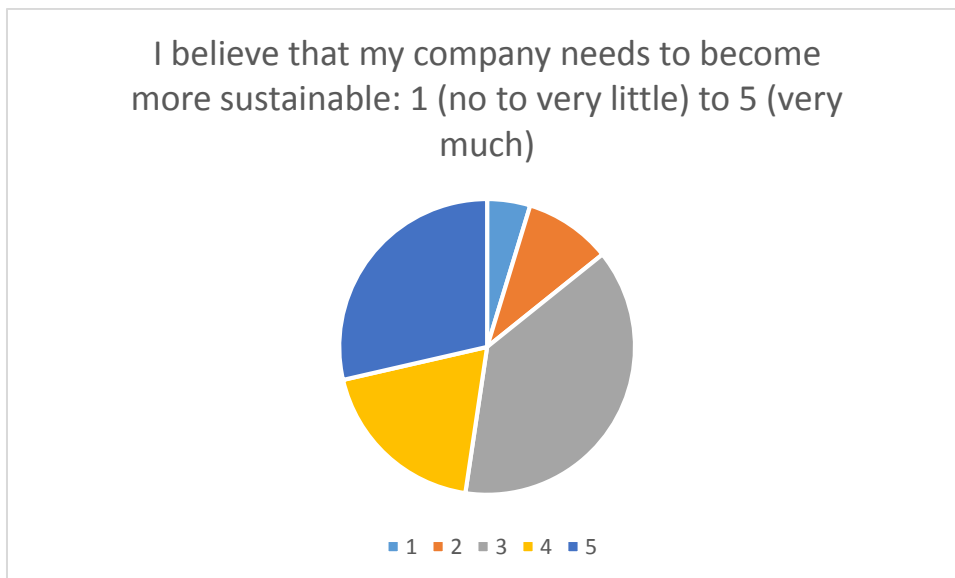
*Fig. 1: 3/4 of all respondents feel that they know at less well about sustainability.*

As the self-assessment in Fig. 1 highlights, the majority of respondents has the feeling to be knowledgeable about the concept of sustainability. Yet it can be expected that people have varying ideas about the term and its meaning.



*Fig. 2: Respondents do not feel that they do a lot towards sustainability, and their companies even less.*

From this judgement, it can be inferred that the majority of respondents feels that more could be done to act sustainably, but the individuals seem to be slightly more active than their organizations. Approx. half of the surveyed employees believes that their companies should become more sustainable (Fig. 3), which is in line with the perceptions above.



*Fig. 3: Employees in general wish that their organizations become more sustainable.*

Who is now in the virtual “driver’s seat” to push for sustainable action? Fig. 4 shows the survey answers.

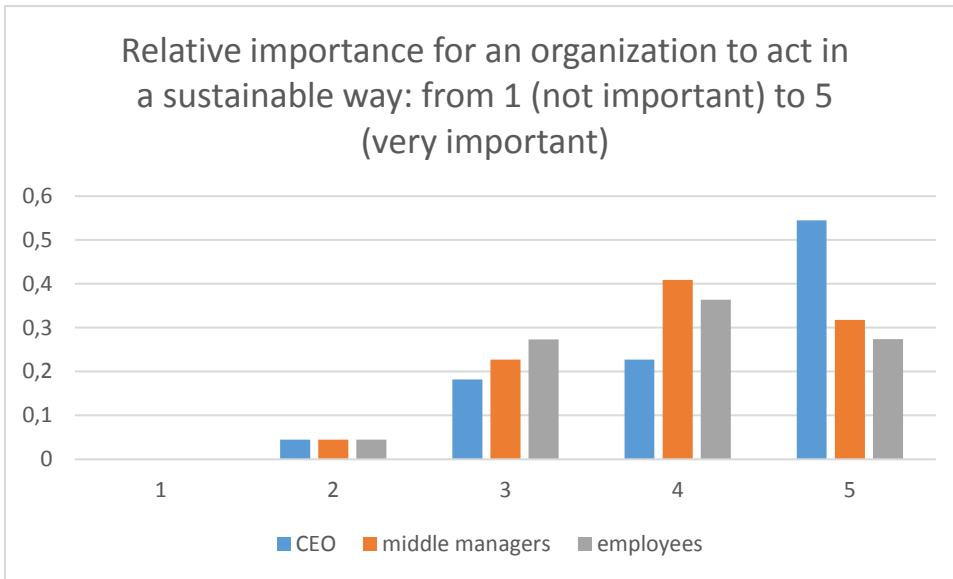


Fig. 4: According to the employees that were asked, it is the CEOs and the middle management that have the strongest importance in making organizations sustainable.

What is remarkable in Fig. 4 is that all stakeholders – employees, middle managers and CEOs – are seen as critical in achieving success in sustainable action. The relative importance of CEOs is ranked consistently higher than that of the other 2 groups, which fare approx. equal.

Where the majority of respondents gave a similar answer was as for the importance of corporate culture (Fig. 5): 86% of the survey sample see corporate culture as important.

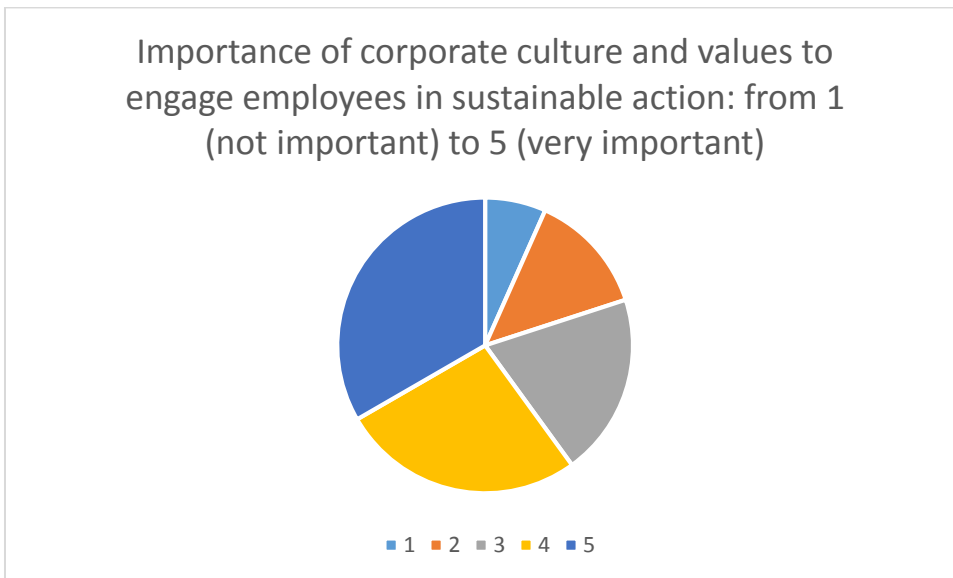
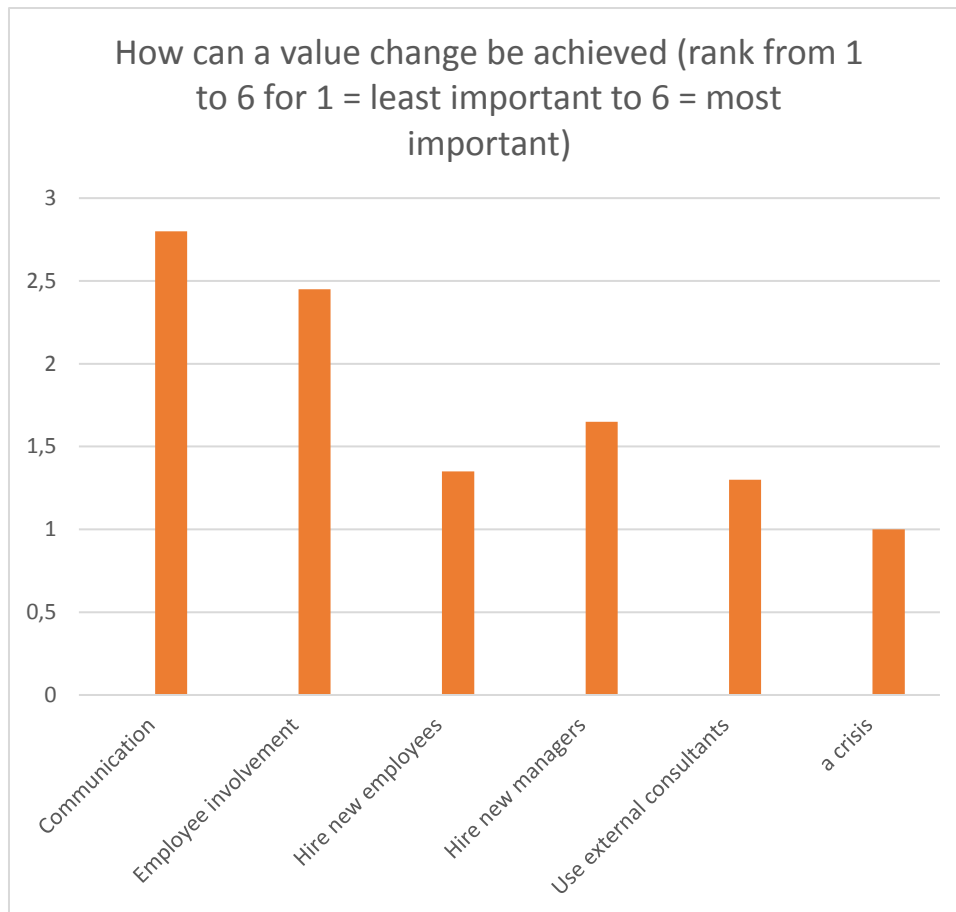


Fig. 5: How important is corporate culture for sustainable action of companies?

Although senior management gives the direction, it is the entire workforce of an organization that has to act accordingly, and here is where the culture plays a vital role. In actually implementing a culture change, communication is seen vital, see Fig. 6



*Fig. 6: Forces to bring about a value change: Communication ranks almost 3 times higher than a crisis.*

Hiring a new workforce ranks significantly below measures of communication and employee involvement. A crisis is not seen as effective in triggering a corporate value change, neither is the use of external consultants considered a useful approach.

Innovation is a well-known remedy against crises, which can endanger the very existence of an organization [22]. The literature also contains examples where a crisis has forced organizations to change fundamentally, which is also associated with changes in values [23], [24].

## **Discussion**

Intensive communication is the key to successfully changing values. It should not only convey information, but also motivation. A cultural change is not something that can be easily specified. This is shown by the three levels of corporate culture. The fact that cultures are deeply anchored makes change very difficult. An analysis of the current culture by revealing existing basic assumptions and norms enables an insight into the status quo. Prior to this, awareness must be raised, particularly with regard to sustainability. In this phase, some are optimal. Employees are satisfied with the idea of sustainability. After a target culture has been defined and compared with the actual culture, further design measures can be planned. For a successful long-term anchoring, the employees must not only be fully informed, but also be actively involved in the process. The development of the we feeling plays a crucial role. Communication as a key function must be used by management to enable a change in value. Even if n resistances occur, you must react accordingly and not ignore them. Attempting to counteract resistance with power is

counterproductive, as this way the subconscious level of the cultural member is not accessible. The duration of the cultural change should not be underestimated. In order to be able to anchor the new values in the long term, a high degree of discipline and perseverance is required (especially from the managers). In order to make change possible, employees have to choose out of personal conviction that sustainability- oriented action and thinking is the right way. To do this, emotions have to be aroused and the meaning of sustainability suggested. In combination with meetings (e.g. use of storytelling) and training courses that are intended to promote the idea of sustainability, a final anchoring can be achieved. In this phase, the employees act and think completely subconsciously according to sustainability. This work provides the basis for a sustainable change in values. Further research could deal with the concrete consequences for the company and its employees, which bring the implemented basic assumptions with it.

## **Conclusions**

Business activities are as such not automatically sustainable, as they cater for demands which causes resource consumption, emissions and has effects on social aspects, and the business model might not be working indefinitely. Making an organization act “sustainably” must not only consider minimizing ecological impacts, but has to address all 3 pillars of sustainability. The organization must not lose sight of its purpose, and avoid greenwashing activities, yet pursuing the (core) business activity with “good” practices was shown to be wise economically, and hence in the very interest of the owners. For existing corporations, company values might need to be changed to enable the entire workforce to walk into a common, new direction, one that means being more sustainable than previously. While the CEO has the most critical role here, a contribution to becoming sustainable is required from each and every employee, and it was found to be through communication and employee involvement that such value change can be best achieved. “Green” corporate values can make the transition to a more sustainable business practice easier and should hence be paid close attention to.

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