# Centralized and Decentralized Organizational Structure: The Impact on Employee Satisfaction and Performance

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#### **Abstract**

The topic of this paper is team-based work structures: Hierarchical decision-making authority in an organization. The research question is: "how is employee satisfaction, behavior, and performance impacted by a decentralized vs. that of centralized structure of an organization?" Within this research, the goal of the paper will be to explore the positive and negative factors of an organization where a top-down approach to decisions and operating procedure are in place compared to an organization design where the teams are given latitude to formulate plans and carry out project deliverables based on expertise and collaboration. Decentralized compared to that of a centralized structure of an organization is researched and aspects of employee satisfaction and the impact on individual and organizational performance are analyzed.

# Keywords

Decentralized, Centralized, Organization, Employee Satisfaction, Performance

#### 1. Introduction

The motivation of this research is to better understand and share the differences in employee satisfaction and the impact on individual performance in centralized and decentralized formats of an organization. This is accomplished in this paper through an in-depth literature review. The reason this research is important and needed is for the awareness that strategic decisions to centralize, decentralize, or implement a combination thereof can and will impact employee satisfaction in the job as well as individual and company performance.

Employee satisfaction, individual and company performance can be negatively impacted if leadership makes strategic decisions about the structure of the organization without understanding the differences of centralized and decentralized organizations, and the impacts of these two different organizational structures.

## 1.1 Objectives

The research objective in this study is to seek understanding of how employee satisfaction and performance in centralized vs. decentralized organizations differ around the world across several industries.

#### 2. Literature Review

# 2.1 Significance between Centralized and Decentralized Organizations

# 2.1.1 Defining Centralized and Decentralized Organizations

A centralized organization can be defined where the authority to make decisions starts at the top and filters down, whereas decentralized organizations utilize flexibility for empowered teams with an appropriate level of autonomy (Sun et al., 2021). With an objective of accomplishing a positive outcome through talented people who fit a specific need, it becomes difficult to measure performance while within a centralized governance model (Sun et al., 2021). In an example described by Sun et al. in a construction project, a wide variety of skillsets were found to be necessary to carry out the many duties throughout the process. Therefore, a decentralized format of the organization could serve to increase the chances of employee satisfaction and better performance of time and task completion.

"It (Decentralization) is breaking down traditional silos among business units, shifting roles and creating possibilities for new syntheses (Darvishmotevali, 2018)." Deciding on a degree of decentralization is an important priority (Chen & Eriksson, 2019). This decision begins with the strategy of leadership in the organization. It is known there can be higher degrees of satisfaction, innovation, and influence on performance in parallel to that of the degree of decentralization planned and implemented. Decentralization enables those closest to the knowledge and deliverables to make decisions flexibly (Chen & Eriksson, 2019).

Flexibility and autonomy are key attributes of a decentralized organization due to the link with the ability for the employee to be involved in the decision-making process (Sun et al., 2021). The more significant the decentralized organization, the more employees feel like they are acknowledged. As a result, employee satisfaction and performance are positively impacted. Conversely, in a centralized organization, even if the employee is satisfied with the job, there is less influence on job performance due to less flexibility for individual contribution on the outcome (Sun et al., 2021).

#### 2.1.2 Applications of Centralized and Decentralized Governance Models

Large companies, although typically structured as centralized, have the capability to develop entrepreneurial microorganizations that serve to collaborate across divisional boundaries (Ghoshal & Bartlett, 1995). Ghoshal and Bartlett go on to describe the desire for an industrial company by the name of ABB to model such an organization after 20 businesses based in Japan, United States, and Europe that successfully made the transformation from bureaucratic to entrepreneurial in mindset and structure. The principles of this model can be summed up by the philosophy of structure is less important than processes, and the processes should serve to build an entrepreneurial way of working. The three processes these 20 companies transformed their businesses around were 1) Entrepreneurial Processes, 2) Competency Processes, and 3) Renewal Processes.

For the entrepreneurial processes developed, the core was having faith in the individual staff members (Ghoshal & Bartlett, 1995). The philosophy was to grow each micro-organization from innovative ideas, and then divide again once large enough that differentiating innovative ideas were being generated to set yet another micro-organization apart from the others.

In developing competency processes, the focus was on the advantage of the large company already having depth and breadth of knowledge and talent, then using it to benefit the individual business units for developing others in the organization (Ghoshal & Bartlett, 1995). Additionally, the knowledge and competencies developed through the process enabled effective cross department collaboration and nimble problem solving. The leadership's role in competency processes was to connect small teams with the larger picture of how their work connected and impacts the vision of the company. This aspect was found to be more impactful than just financial reward alone. Managers looked for failures in product intent that could be evaluated for other innovative purposes to generate revenue for the company, and if employees proposed multiple use cases for a single idea, all should be vetted in order to determine best business cases.

The renewal processes revolved around challenging the status quo and using data for the purpose of knowledge, and knowledge for the purpose of developing effective processes (Ghoshal & Bartlett, 1995). Within renewal, managers were asked to question the past so improvement can be made in the future, and so the organization could be stretched and challenged. Managers were also trained to observe complacency and address it with an intent process of re-training, and asking the question "what would a new top-management team do?" (Ghoshal & Bartlett, 1995).

In another example, Brazilian shipping ports were re-organized by legislation in 1993 to decentralize, changing the previous structure of control and operation by the federal government, a centralized organization (Marques Soares, 2022). The measures in the attempt to decentralize the Brazilian ports were not implemented as intended. As a result, in 2013 another federal act consolidated the laws to conform to the failed implementation, thus officializing a centralized governance model under federal authority. The federal act adopted in 2013 officially removed lower control of decision-making authority, opened up potential for political influence apart from the real business needs of the individual ports, and maintaining bureaucracy for which weakens flexibility. Thereafter, due to the changes in shipping demands, advances in technology, complexity of cargo configuration management, as well as larger ships being introduced into the system, the Brazilian federal government initiated a study to again explore if decentralizing the port governance system would be an improved model of operation to meet the evolving demands

of the industry, and to stay competitive. The study benchmarked Australia, the United Kingdom, and Belgium's model of decentralizing shipping port governance and decision-making capability. Australia and the United Kingdom were found to have a hybrid model of privately owned ports with strong influence of federal government, including control of maintenance of the shipping lanes. Belgium's Antwerp port, however, had a landlord managed governance model that operates under a publicly owned LLC with very little involvement from the federal government except for reserved seats on the overseeing board. As a result, the Antwerp port operates as an independent business unit and has since expanded to develop horizontal relationships with other international ports.

In a survey conducted with stakeholders of Brazilian port partners, in nearly every category of questions concerning performance perception of different operating models, the public and decentralized form of governance was preferred by an overall score of 90%, followed by private and decentralized at 64%, and considered the least preferred perception of performance was that of public and centralized governance at 47% (Marques Soares, 2022). This study reflected in Table 1 reinforces the preference for autonomy to make decisions separate from a central authority, flexibility to manage daily operations in a decentralized way, and evidence that horizontal collaboration and growth is best enabled through allowing business units to manage the business as it makes sense in that specific economy and industry.

Shipping Port	Centralized Governance	Public Owned	Decentralized Governance	Private Owned
Australia	X			X
United Kingdom	Х			X
Belgium		Х	Х	
Brazilian Port Partners		90%		

Table 1. 2013 Brazilian Federal Government Study on Shipping Port Governance and Decision Making Capability

# 2.1.3 The Importance of Management Strategy in Structuring the Organization

47%

Survey

Micro-organizations within industrial companies, and port logistics show a strong link between de-centralization on some level and the positive impact for flexibility in making decisions, higher levels of motivation and employee satisfaction in their jobs, and performance. However, there are also organizations that have been successful within a centralized organizational model. The primary concern for the topic of governance structure that an organization's leadership needs to decide upon is what intensity of control is needed to carry out the core business or objectives of the organization (Andrews, et al., 2009).

64%

Some of the benefits of centralization are that people of differing opinions and abilities have less impact on the success of deliverables, the organization can focus on where they need to be more efficient and effective rather than being innovative, and the focus can be on achieving the objective rather than changing it (Andrews et al., 2009). Andrews, Boyne, Law, and Walker (2009) found that simply considering centralization and decentralization is not enough. Rather, the strategy for what the particular business need is, and the level of oversight and central process control required to ensure success is of higher importance. They found that in the example of public sector education, a tighter control on common and central processes benefited examination performance. In such a case, a standard carried across the organization provides clarity on expectations and a consistent measure of performance.

In a more general sense, the research found that across six public sector categories that included units of benefits and revenues, education, highway, housing, public protection, and social services, if an organization is more concerned with getting the most out of the objective of processes and procedures, then a centralized form of governance will have the best chance for higher performance (Andrews et al., 2009). They also found, however, that for a business unit that seeks to innovate and be a change agent, the more decentralized the business needs to be and will likely result in better performance. And finally, the research confirmed an organization that reacts to the environment around them would be best in establishing a hybrid strategy of centralized and decentralized form of governance depending on the situation that the business finds themselves in. Therefore, Andrews et al., discovered that there is

a strong link between management's strategy for the business and then selecting an appropriate and effective structure as drivers of desired performance.

## 2.2 Significance of Employee Satisfaction in Decentralized Organizations

# 2.2.1 Studies of Human Behavior in the Workplace

The evolution of needs in human behavior is a good starting point to build upon until the realization of employee satisfaction in the workplace is reached. In 1943, Abraham Maslow documented the five hierarchy of needs: 1) Psychological needs, 2) Safety needs, 3) Love needs, 4) Esteem needs, 5) Self-actualization needs (Stuart, 1984). Stuart goes on to explain that psychological and safety needs are grouped as basic needs, and love needs, esteem needs, and self-actualization needs as a higher-level grouping.

Employee satisfaction is not easily reached as Frederick Herzberg documented in his two-factor theory. In his 1959 research, Herzberg discovered satisfiers (motivators) and dissatisfiers (hygiene) factors (Stuart, 1984). The motivators were intrinsic factors focused on self-realization in their work. Hygiene were extrinsic factors concerning what the company offered the employee for basic needs and leadership. As Figure 1 shows, the hygiene extrinsic factors will only take the employee's view on satisfaction to a neutral opinion of the organization and how they fit in, whereas the motivators or intrinsic factors can elevate the feeling of employee satisfaction to its' highest possible, so long as these factors are being maintained.

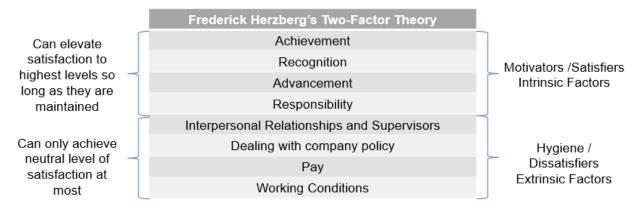


Figure 1: Frederick Herzberg's Two-Factor Theory

#### 2.2.2 Employee Satisfaction in Decentralized and Centralized Organizations

Employee satisfaction is higher in decentralized compared to that of centralized organizations (Sun et al., 2021). In centralized organizations, the motivation of the employee becomes a challenge due to the separation of management and employee relations. All four hypotheses suggested by Sun et al. that focused on the relationship between decentralization, employee satisfaction, and job performance were found to be positively correlated with each other (Sun et al., 2021). Central to these four hypotheses was employee satisfaction's influence on job performance as a result of the involvement in the decision-making process and the feeling of value to the organization and purpose of belonging. In this study, they found that across 25 different project departments in the construction industry, job performance was impacted by job satisfaction. The study was performed in China where centralized organizations are common, yet due to the nature of construction projects necessitating varied tasks of differing skillsets, a decentralized organization is required. In this study, performance correlated because of the development opportunity that decentralization affords the individual and the motivation that comes from being satisfied in their work (Sun et al., 2021). The study also shows how decentralization encourages employees to contribute to the leadership process due to autonomy, for the purpose of a more impactful contribution.

Employee satisfaction could also be measured by lost opportunities. Centralized organizations limit the number of decision makers, making the voice of the employees less influential, which often represent a higher degree of diversity compared to that of management (Jiang et al., 2022). In such cases where companies operate under a centralized governance model, it is recommended that management set up employee task force committees to hear the voice of a diverse body of people within the business (Jiang, et al., 2022).

Constructive confrontation is a method of engaging employee opinions and unity at Intel, a technology company (Ghoshal & Bartlett, 1995). In the process of constructive confrontation, every meeting must have an agenda, topics must be discussed thoroughly that embrace all views as fair to consider, and conclusion includes either a final decision or action plans to follow up for coming to one, documented action plans, and who is responsible for each time-based action plan. Challenging discussion and dialogue are encouraged, but once a final decision has been made, Intel expects all members of the meeting and especially management to commit to the direction in unity. This process of constructive confrontation welcomes diverse views of employees and management, all the while coming together knowing that each had a part in crafting the result, or at minimum their voice was heard and listened to.

Research has shown that autonomy, employee satisfaction, and as a result high performance goes hand in hand (Rolfsen & Langeland, 2012). In fact, in settings where total productive maintenance (TPM) is required, the lack of collaboration according to Rolfsen and Langeland's research can have negative consequences on employee satisfaction and performance. The goal of TPM as described by Rolfsen and Langeland is to achieve the highest levels of overall equipment effectiveness (OEE), achieve 100% key performance indices (KPI), and do so via preventative and productive maintenance practices carried out on the plant floor. A Canadian automotive plant operated and owned by a Norwegian automotive supplier was considered best in class OEE and received the highest company awards and recognition in TPM. This plant was set apart in that the Norwegian company allowed the plants autonomy in enabling plant floor production workers the flexibility to make observations and decisions about what improvements were needed. Plant management who were interviewed recalled being concerned with this level of empowerment given to production workers, since it was tradition that management made these determinations in the past. However, results spoke for themselves, and the inputs and contributions made to TPM by production workers resulted in high quality and low quantity down time of equipment. Conditions-based maintenance replaced scheduled maintenance intervals. Conditions based maintenance is a pragmatic example of trusting the workforce to make observations and recommendations, since the regular interval controlled by a standard changed to servicing upon physical or anecdotal evidence. The workforce was involved in committee-based decisions for purpose of improvement, was given room to make mistakes without fear of punishment, as well as responsible for reporting status to management (instead of management pulling reports separate from production plant floor involvement) where employees could tangibly see the results of their efforts. There was cited a high culture of positive behavior and motivation in taking pride in the work, the workplace, to look out for their fellow colleague's interest and encourage optimistic behavior in others. This ethos which was mentioned as counterculture in other automotive industry facilities was a factor in high levels of employee satisfaction and pride in the company within this particular plant workforce.

#### 2.3 Significance of Performance in Decentralized Organizations

## 2.3.1 Applications of Decentralized Governance Models Influence on Performance

Job performance can be described as a measure of success for an accomplished task, but also how behavior corresponding to the expectations set forth by the organization work together throughout the process in that outcome (Sun et al., 2021). Inter-Municipal Cooperation (IMC) has been studied in context of network organizing (Holen-Rabbersvik et al., 2018). Network organizing can be described as business units that work together. Network organizing in a Norwegian healthcare study refers to business units in different communities who instead of being directly managed by a central entity, have the freedom to work with each other on issues arising at the working employee level or patient perspective. This study took place in the country of Norway across two different districts. Districts are described as being in between the size of cities and counties. The healthcare organizations were closely linked with the divided boundaries in government. Seventeen staff members participated in qualitative interviews, workshops, observational studies, and focus groups.

Results were interesting in that the employees were given flexibility to utilize resources at different facilities if it made sense, as well as the materials to accomplish tasks which were described by participants as a form of supervision itself (Holen-Rabbersvik et al., 2018). Employees were given the autonomy to make decisions and identify issues. These traits are often found in a decentralized organization. However, there was a lack of expertise found at the supervisor level as expressed by study participants, and this was determined to be a critical issue. Therefore, team structured supervision was dependent on the skillsets of employees and interactions with each other. A beneficial outcome was a high degree of employee competency development in those teams positioned in larger cities. Team-based supervision on a horizontal direction at the employee level within the network was utilized in meetings where experts discussed challenging cases between knowledgeable staff members. Tasks of prioritization were determined by customer urgency instead of a top-down delegation from traditional management.

In the Norwegian healthcare organization, another challenge due to the way the network organization operated was a lack of clarity in the hierarchy of leadership (Holen-Rabbersvik et al., 2018). In one case, an employee asked a manager if they were a direct report and yet the answer was unclear even by the manager's answer at the time of the conversation. In this example, there was such a high degree of separation both in communication and competency between leadership and staff, that employee motivation was negatively impacted. A feeling of isolation was described by one participant, and employee retention was a problem. In situations where isolation may be a risk, the organization may need to consider both personality traits and competencies that fit in with those roles.

Job satisfaction influences positive employee engagement with the work, and these combined with employee retention are all found to have a high degree of impact on performance (Sun et al., 2021). Furthermore, Sun et al. described a more successful career has been found closely related with job satisfaction and employees considered to be high performing individuals.

One other difficulty reported in the Norwegian healthcare network study was the geographical locations and the variety of competencies between employees, especially between small and larger cities. The geographic challenge was in the form of time spent on the road travelling between rural communities. This was considered a waste of time since work wasn't getting done. Contrastingly, in larger cities the proximity of different business units made it easy, and less opportunity cost spent travelling between healthcare business units (Holen-Rabbersvik et al., 2018). Even though the network organizations were a form of decentralized business units collaborating, they weren't self-sufficient like a true decentralized organization needs to be. They were in fact business units acting within a centralized process that ultimately resulted in some benefits to those employees who were experienced and in proximity, and yet on the other hand a frustrating work environment for those who were needing development and who were farther apart from co-workers. In this case, although management was not making the decisions, the centralized process and methods took the place of, producing a wider variety of employee satisfaction levels, as well as differing performance and unbalanced employee retention between business units among the networks.

Considering varied levels of employee satisfaction and performance, task performance pertains to productivity of core work, whereas contextual performance concerns the behavior behind the assignments (Sun et al., 2021). These two factors make up the sum of job performance, and as the Norwegian healthcare study suggests, both are important considerations for an overall measure of success.

A solution to consider in cases like this would be to prioritize the more complex projects to the business units in larger cities where this process works, and then reinforce the rural business units each with the resources and materials necessary to be self-reliant on what they do best. Since competent and engaged supervision was found to be a problem, a solution to this critical issue would be in the long term to promote those from the ranks of competent specialists who show leadership qualities, and in the short term train the existing leadership to close the existing competency gap.

## 2.3.2 The Importance of Management Strategy of Structure in Resulting Performance

The relationship between strategy and performance in any organization reflects management's priority of structure and level of autonomy within the business (Chen & Eriksson, 2019). In a 2019 study by Chen and Eriksson on Danish firms with high product differentiation, they learned that a high complexity product strategy is best facilitated by a decentralized organizational structure. This is especially a valuable finding for companies operating in international economies like the Danish firms studied. They also found a decentralized form of governance useful for large service and manufacturing businesses, and interestingly those who don't have sophisticated processes.

After the industrial company ABB re-organized, utilizing the three processes of entrepreneurial, competency, and renewal, they developed into 1,300 small innovative micro-organizations (Ghoshal & Bartlett, 1995). The company allowed 90% of the \$2.3B R&D budget to be managed by operating companies for the purpose of financial independence, individual responsibility for profit and loss of their efforts, decision making authority on business unit loans, and in the end an opportunity to retain a significant percent of sales. Upon full implementation of the transformation, ABB acquired the electrical technology company, Westinghouse. Like ABB, after the acquisition Westinghouse went through a transformation from a centralized organization to decentralizing the business units to innovative micro-organizations within the central governed platform. Once the transformation took form,

Westinghouse doubled operating profits, developed many new technologies, and recognized employee satisfaction improved (Ghoshal & Bartlett, 1995).

#### 3. Conclusion

On the surface, it seems that decentralization may be the choice for achieving the highest employee satisfaction that would influence desired performance. However, as different needs drive strategy of organizational structure, so does the requirement to consider different levels of integrating decentralized forms of business units even at times within a centralized governance model (Andrews et al., 2009).

This literature review was aimed at better understanding centralized vs. decentralized organizational models and corresponding employee satisfaction, behaviors, and performance in each. Eight different industries including automotive, construction, government public sectors, healthcare, industrial equipment, private firms across an entire country, shipping ports, and technology were reviewed and the countries of Australia, Belgium, Brazil, Canada, China, Denmark, Japan, Norway, Sweden, Switzerland, United Kingdom, and the United States were represented on topics in this paper.

It has been learned through this study that decentralization does increase autonomy, allow better input to the decision-making process, and contribute to higher levels of employee satisfaction (Stuart, 1984). Performance, however, is more complex. As mentioned, it depends on the needs of the company and is closely related to the strategy of carefully structuring an effective plan of centralization, decentralization, or a combination thereof (Chen & Eriksson, 2019).

# 4. Implications and Limitations

# 4.1 What are the implications of the findings?

Although decentralization is found to be an important ingredient in engaging the employee into the decision-making process, it is management that must be proactive in coming to an agreement of what the effective strategy in which the company will operate. Maybe the entity operates in a government public sector, healthcare, or industrial equipment industry where some centralization is needed, yet creative solutions can be established for maximizing employee and stakeholder input at the department level. Maybe it is a stand-alone manufacturing facility, individual private firm, or construction site where leadership has the flexibility to maximize the expertise and innovation of the workforce through a highly decentralized governance model. Lastly, it is learned that a hybrid of centralized combined with decentralized business units like that in examples discussed in the paper of a shipping port, or technology company is possible.

## 4.2 What are the limitations of this study?

Although several industries and countries of economy were explored, it is acknowledged that this paper took a sample of what is available across all industries and the global economy. A deeper study looking at all continents, cultures, norms, and performance measurements would paint a more complete picture of how strategy of structuring an organization leads to high levels of employee satisfaction and how performance is impacted.

#### 4.3 Can the findings be generalized?

The findings in the paper are difficult to generalize. As Frederick Herzberg's two-factor theory suggests, it would be a risk to generalize the factors for what influences employee satisfaction and eventual performance as it relates to either centralized or decentralized governance model (Stuart, 1984). It is therefore important for any leader to recognize the needs of the organization, team members, and engage the workforce in ways that are consistent with company cultural norms and consistency to succeed within the strategic organizational structure.

#### Acknowledgement

Thank you to Dr. Pilar Pazos-Lago, Associate Professor of Engineering Management & Systems Engineering at Old Dominion University, for the review and advisement in the draft of this paper. Your expertise in research and teambased work systems is very much appreciated on the chosen topic of this literature review.

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#### **Biography**

Aaron Rubel is the University Research & Technology Account Manager at Airbus Americas, and also serves as the Intellectual Property Focal Point. Prior to joining the aerospace business in 2009, Mr. Rubel spent 20 years in the automotive industry. Roles throughout his career include Head of Aircraft Maintenance Programs Engineering, Head of Aircraft Standard Parts/Flammability Certification/ Mass Properties, Head of Aircraft Engineering Processes & Enabling, and Lead Engineer of the Chrysler Sebring and Dodge Avenger rear seat automotive program. Aaron Rubel is a Ph.D student at Old Dominion University majoring in Engineering Management & Systems Engineering. He has earned a MS in Engineering Management through the University of Tennessee at Chattanooga (UTC), a BS in Engineering Technology from Lawrence Technological University (LTU), and an Associate of Applied Science from Macomb Community College. Academic honors include the memorial 2018 Dr. Ron Cox Outstanding Graduate UTC Engineering Management Student Award, and a 2014 inductee into the LTU College of Engineering Hall of Fame. Aaron Rubel was recognized as a Fellow of the Industrial Engineering and Operations Management (IEOM) Society in 2022, is an inventor of two patents, and a certified Lean Six Sigma Black Belt. He previously served on a K-12 school board of a private school in Fairhope, Alabama, contributed to a Mobile County (Alabama) Public School District STEM strategic plan, and is a member of the IEOM Industry Advisory Board.