

College of Management

Department of general Administration



**Exploring Teleworking's Impact on Productivity: Case study at Schlumberger
Saudi Arabia**

أثر العمل عن بعد على الإنتاجية، دراسة حالة في شركة شلمبرجير بالسعودية

Prepared by:

Alalawi, S. Toffaha, N. Derhem, W

Midocean University

Final project MGM S3 MM first trimester

Supervised by:

Dr. Walid Soliman

Dr. AL Faisal Abdulhameed

2024

Abstract:

This study investigates the relation between teleworking and productivity within the context of Schlumberger, a multinational oil and gas services company. Particularly, with the frequency of teleworking arrangements all over the world, understanding its impact on productivity is mandatory for organizations to adapt to change in work environments. Moreover, choosing a case study approach, performance metrics, and qualitative interviews data was collected through employee questionnaire to illustrate the influence of teleworking practices on productivity outcomes, especially, post-COVID pandemic. Results indicate a remarkable correlation between telework occurrence and productivity measures, including work quality, employee satisfaction levels and task completion rates. Furthermore, this study identifies key factors influencing the effectiveness of post-COVID teleworking arrangements, such as remote collaboration tools, communication technologies, and managerial support. However, findings from this research contribute toward increasing the repository of information on teleworking dynamics and provide applied insights for organizations willing to improve productivity in teleworking conditions.

Keywords: Teleworking ,employee satisfaction ,productivity ,post-COVID

تهدف هذه الدراسة إلى توضيح العلاقة بين العمل عن بعد والإنتاجية في شركة شلمبرجير، وهي تعد شركة لخدمات الطاقة. ومع انتشار ترتيبات العمل عن بعد عالمياً فقد يعد فهم تأثيرها على الإنتاجية أمراً مهماً للمؤسسات التي تتأقلم مع بيئات العمل المتغيرة. تم جمع البيانات باستخدام نهج دراسة الحالة من خلال إجراء مسح على الموظفين ومقاييس الأداء والمقابلات النوعية وذلك لاستكشاف العلاقة بين ممارسات العمل عن بعد والمخرجات. وبالتالي فقد أشارت النتائج إلى وجود علاقة إيجابية كبيرة بين العمل عن بعد بشكل دائم ومقاييس الإنتاجية ويشمل ذلك معدلات إنجاز المهام وجودة العمل ومستويات رضى الموظفين. علاوة على ذلك، تحدد الدراسة العوامل الرئيسية المؤثرة على فعالية العمل عن بعد مثل: تقنيات الاتصال والدعم الإداري. تساهم نتائج هذا البحث في زيادة المعرفة حول ديناميات العمل عن بعد وتوفر رؤية عملية للمؤسسات الساعية إلى تحسين الإنتاجية.

الكلمات الأساسية: العمل عن بعد، رضى الموظفين، الإنتاجية، ما بعد جائحة كورونا

Introduction

In the last decade, teleworking has been a significant aspect of most work environments. With the advent of COVID-19 pandemic, teleworking became a transformative practice adopted by organizations worldwide. This evolution toward teleworking encouraged organizations to re-evaluate their operational strategies and adapt to new work approaches. Moreover, understanding the correlation between teleworking and productivity has become crucial for businesses willing to prosper in this advanced landscape. However, this study examines the correlation between teleworking and productivity, with a specific focus on Schlumberger, a multinational oil and gas services company. As teleworking practices become more common all over the world, steadily becoming mandatory for organizations to recognize the implications of teleworking on productivity dynamics. Furthermore, utilizing a case study methodology, this research investigates the influence of teleworking practices on productivity outcomes within the context of Schlumberger, particularly in the post-COVID phase. The study employs qualitative interviews gathered through employee questionnaires and performance measurements to shed light on different dimensions of productivity, including employee satisfaction level, work quality, and task completion rates. Preliminary findings from the study show a notable correlation between the frequency of telework and productivity measures, shedding light on both the protentional benefits and obstacles associated with teleworking practices. The research illustrates key factors that influence the effectiveness of post-COVID teleworking practices, including communication technologies, the utilization of remote collaboration tools, and managerial support systems. By adding to the expanding repository of knowledge on teleworking dynamics, this study aims to provide applicable insights for organizations eager to improve productivity in teleworking conditions. Through a comprehensive examination of teleworking practices and their influence on productivity, this research provides organizations with valuable insights to transmit and improve teleworking environments effectively.

General Perception of the Research Structure:

In this study, we adhere to the APA method, incorporating the following components:

Abstract: Investigating the relationship between teleworking and productivity within Schlumberger's context.

Literature Review: Critically evaluating relevant theories, models, and prior studies.

Methodology: Outlining the research process, including approach, design, data collection, sampling, and ethical considerations.

Research Hypotheses: Teleworking significantly impacts organizational productivity.

Objectives: Clarifying the study's goals and desired outcomes.

Research Limitations: Addressing potential influences from individual, organizational, and environmental factors, as well as ethical considerations

Initial Reference List: Reflecting the reviewed literature and supporting the study's foundation.

Significance of the Study:

In the rapidly changing work environments, the dynamics of teleworking and its impact on productivity have become vital considerations for businesses today. Furthermore, organizations are adapting to new challenges and opportunities in the modern workplace, grasping these dynamics is not just important—it is imperative. Here is why this research holds paramount significance:

1. **Exploring the Teleworking Revolution:** The widespread adaptation of teleworking, accelerated by the COVID pandemic, has sparked numerous unanswered questions. This study investigates the complex relationship between teleworking and productivity, offering valuable insights to assist organizations as they navigate this new norm.

2. **Beyond Theoretical Insights:** While current research provides theoretical frameworks, it often lacks the depth of real-world facts. This study, focusing on Schlumberger, a global leader in telework implementation, fills this gap by presenting grounded findings based on concrete data and employee reports.

3. **Learning from a Teleworking Trailblazer:** Schlumberger serves as a benchmark for successful large-scale telework adaptation. By studying their journey, organizations can extract

valuable training and high-quality practices to enhance their own telework strategies, mitigating potential pitfalls and maximizing opportunities.

4. Industry-Specific Nuances: Existing studies often offer a broad perspective, overlooking the specific needs and challenges of different industries. This study investigates deeply into the energy sector, exploring its unique teleworking environments. The findings will provide valuable insights into organizations with similar work structures.

5. Shaping Policy and Practice: Teleworking guidelines require careful attention to navigate potential drawbacks and maximize benefits. This Study, by examining the real-world impact on productivity, informs the development of effective teleworking guidelines tailored to specific organizational contexts and employee needs.

6. Advancing the Knowledge Base: This research contributes valuable statistics and insights to the existing repository of knowledge on teleworking and productivity. It stimulates ongoing discussions, guides future research endeavors, and enhances the recognition of transformative work practices, ultimately leading to improved practices for both businesses and personnel.

7. Beyond the Organizations: The implications of this study extend beyond individual businesses. It has the potential to impact people and society on a large scale. In other words, understanding the correlation between teleworking and productivity can inform efforts to promote work-life balance, employee well-being, and societal progress.

Objectives:

1. Explore the impact of teleworking on productivity within Schlumberger's operational framework. This study aims to comprehensively analyze the extent to which teleworking enhances productivity within the company's context. Also, it seeks to collect data on productivity levels following teleworking, with emphasis on the post-COVID pandemic.

2. Evaluating the overall effectiveness of teleworking practices at Schlumberger involves assessing how well these practices align with the company's objectives in terms of productivity, employee satisfaction levels, work quality, and task completion rates. Moreover, the evaluation aims to provide insights into the efficacy of remote collaboration tools, communication technologies, and managerial support in facilitating successful teleworking arrangements.

3. Assessing the impact of teleworking on the overall satisfaction and well-being of personnel at Schlumberger involves examining factors, including work-life balance, job satisfactions, and stress levels. This assessment is crucial for fostering a positive work environment and retaining talent within the organization.

Literature Review:

1. The Impact of Teleworking on Employee Productivity During COVID-19 in the UAE: the Moderating Role of Job Level.

(Dania M. Kurdy, The British University in Dubai, Dubai, United Arab Emirates, Husam-Aldin Nizar Al-Malkawi, Faculty of Business and Law, The British University in Dubai, Dubai, United Arab Emirates, Shahid Rizwan, Universiti Kuala Lumpur Business School, Kuala Lumpur, Malaysia, 19 January 2023)

Purpose: This study aims to examine the factors influencing the productivity of employees who worked remotely in the United Arab Emirates (UAE) during the COVID-19 pandemic.

Results: The findings reveal that direct variables such as workload, job satisfaction, work-life balance, and social support significantly impact employee productivity in the UAE. However, the analysis suggests that job level does not significantly moderate these relationships. Overall, the results align with social exchange theory.

Recommendations for Future Studies Include: Extend this study to other countries in the MENA region to ensure generalizability of findings. Additionally, purpose a cross-cultural study to explore the cultural factors influencing teleworking”

2. Teleworking and Job Quality in Latin American Countries: A Comparison from an Impact Approach in 2021

(Yanira Marcela Oviedo-Gil Favio Ernesto Cala Vitery Econometría Consultores, Bogota 110231, Colombia Faculty of Natural Sciences and Engineering, University Jorge Tadeo

Lozano, Bogota 111711, Colombia. 21 April 2023)

Purpose: This study examines the relationship between teleworking and job quality in 2021 across selected Latin American countries, specifically, Argentina, Brazil, and Colombia.

Results: The research reveals that teleworkers in Colombia and Argentina experience higher labor income compared to other workers with similar observable characteristics. Additionally, teleworkers in these countries work fewer hours per week and demonstrate similar levels of job stability. However, a disparity in social security coverage among teleworkers in Brazil and Colombia is identified, highlighting a need for intervention.

Recommendations for Future Studies Include: The Study does not offer specific suggestions or recommendations for future research endeavors.

3. Occupational Stress-Induced Consequences to Employees in the Context of Teleworking from Home: A Preliminary Study.

(Agota Giedrė Raišienė, Evelina Danauskė, Karolina Kavaliauskienė and Vida Gudžinskienė Department of Management, Klaipėda University, LT-92227 Klaipėda, Lithuania AB Lietuvos Geležinkeliai, LT-02100 Vilnius, Lithuania JSC the Spirit of Sport, LT-09312 Vilnius, Lithuania Institute of Educational Sciences and Social Work, Mykolas Romeris

University, LT-08303 Vilnius, Lithuania 10 February 2023)

Purpose: This investigation delves into the experience of individuals engaged in teleworking settings, examining the ramification of occupational stress, notably encompassing mental and physical fatigue, social isolation, diminished work engagement, professional skepticism, and burnout. The preliminary inquiry, conducted amid the pandemic, surveyed 202 employees in Lithuania who worked remotely from home.

Results: The findings suggest that teleworking during the pandemic had predominantly adverse implications for employee well-being, with many experiencing mental and physical exhaustion alongside social isolation while working from home. The psycho-emotional condition of employees emerges as a pivotal determinant influencing the intellectual capital of organizations during periods of uncertainty.

Study limitations Include: (a) The theoretical potential for confounding effects of stress and telework itself. (b) Possible influence of employees' technology proficiency and/or self-organization skills on the results. (c) The absence of direct measurement of occupational stress within the study.

Recommendations for Future Studies Include: Analyzing the issue in varied contexts beyond the pandemic to mitigate potential errors and enhance understanding.

“Teleworking has demonstrated a positive impact on job performance, particularly through time saved circumventing traffic congestion during commutes. In addition, employees engaged in telework practices often receive salaries comparable to those of traditional office-based employees”

Additional Insights:

“Organizations prioritizing expansion and adaptability are more inclined to embrace teleworking as a competitive strategy, enhancing flexibility and communication. For instance, flexible forms of teleworking, high knowledge intensity and mobile teleworking with extensive external contracts, are favored in such environments. Conversely, bureaucratic organizations that prioritize control and stability may exhibit less inclination to support teleworking, especially in low knowledge intensity

roles. However, where teleworking is permitted, it frequently occurs in home-based or remote office settings conducive to measure worker outputs easily”

“Occupations permitting teleworking typically command higher wages. In the United States, telework-friendly occupations account for a substantial portion of total wages, reflecting the prevalence of telework-friendly jobs across various sectors”

“Teleworkers notably influence morning and evening peak hours, contributing to approximately 11.5% of total travel time during these periods, despite representing only 9% of the working population. This impact varies across transportation modes and destinations, with teleworkers comprising a larger proportion of commuters using public transit, particularly in urban areas like London”

Methodology:

Sampling Strategy:

Purposeful sampling will be used to select a participant directly involved in teleworking practices with Schlumberger Saudi Arabia. This approach facilitates the selection of an employee or manager engaged in teleworking practices, ensuring representation specifically from the supply chain department.

Date Collection Method:

1. Questionnaire: A survey will be given to the employee or manager to gather quantitative data on productivity levels, employee satisfaction, overall well-being, and managerial support. The questionnaire will include structured items designed to measure key variables such as perceived productivity, job satisfaction, work-life balance, stress levels, and the level of managerial support, using a combination of closed-ended and Likert scale questions.

2. Observation: The case study will be observed to gain qualitative insights into teleworking practices, employee behaviors, and managerial dynamics with Schlumberger Saudi Arabia's operational framework.

Data Analysis Techniques:

1. Quantitative Data Analysis: Descriptive statistics, such as means and standard deviations, will be calculated to summarize survey responses. Basic statistical techniques, including comparison of means and correlations, will be used to examine relationships between variables.

2. Qualitative Data Analysis: The observation data will undergo qualitative analysis to identify patterns, themes, and contextual factors influencing teleworking outcomes.

Ethical Considerations:

1. Informed Consent: The participant will be provided with clear information about the study's purpose, procedures, and his rights as a participant.

2. Confidentiality: Measures will be implemented to ensure confidentiality and anonymity of the participant's responses.

3. Minimization of Harm: Efforts will be made to minimize potential harm or discomfort to participant during data collection and analysis.

4. Data Protection: Compliance with relevant data protection regulations and guidelines will be ensured throughout the research process.

Limitations:

1. Limited Generalizability: Findings from the single case study may have limited generalizability to other organizations or contexts.

2. Time Constraints: The condensed timeline may limit the depth and breadth of data collection and analysis.

Timeline and Resources:

The research is expected to be completed within 10 weeks (about 2 and a half months), including data collection, analysis, and report writing. Resources required include potential budget for survey administration and analysis software.

This revised methodology focuses on efficiently collecting and analyzing data to investigate the impact of teleworking on productivity, employee satisfaction, overall well-being, and managerial support within Schlumberger Saudi Arabia within shortened timeframe of 10 weeks (about 2 and a half months)

Research Hypotheses:

There is a significant relationship between teleworking and organizational productivity.

Teleworking influences organizational performance and innovation through the mediating role of communication, collaboration, creativity, and trust among employees and managers.

“Productivity is an economic indicator, that measures the efficiency of production, taking the form of a ratio of the output of goods and services to the input of factors of production” (The Chartered Management Institute, 2004, p. 342). Employee productivity reflects the rate of output per employee during his/her working time. However, perceptions of productivity may vary among employees compared to actual productivity levels. Therefore, accurately measuring employee productivity during teleworking requires careful consideration of how managers and employees perceive it (Bosua et al., 2017). Factors Influencing Employee Productivity: Employee productivity is positively influenced by various factors, including technological (e.g., modern equipment, information communication technologies), psychological (e.g., encourage and praise), social (e.g., flexible work schedule, workplace conditions), individual (e.g., knowledge, abilities) and/or managerial factors (e.g., participative management, quality circles)

Impact of Teleworking on Well-being and Productivity: Teleworking has positive impacts on organizational performance, such as achieving goals while working remotely, enhancing organizational performance by fostering flexibility and efficient work practices.

Research Limitations:

1. The study may be influenced by confounding and moderating effects stemming from individual, organizational, and environmental factors. These factors, including personality traits, motivation levels, job characteristics, leadership styles, organizational culture, and family situations, can impact the relationship between teleworking and various performance indicators.
2. Ethical and legal considerations surrounding teleworking, including issues related to data security, privacy concerns, and labor rights, may present challenges for both researchers and practitioners in the field.
3. The diversity and complexity inherent in teleworking practices and contexts can impact the outcomes and experiences of teleworkers in various ways, posing challenges to generalize findings across different situations.
4. Currently, there is no foolproof method to ensure the confidentiality of video meetings and information, which may introduce uncertainties and vulnerabilities in teleworking environments.
5. Challenges may arise in trusting participating members regarding voice communications, potentially impacting the reliability and authenticity of data collected in teleworking studies.

Initial Reference List:

(1) Study link: <https://www.emerald.com/insight/content/doi/10.1108/JBSED-09-2022-0104/full/html#sec006>

(2) Study link: <https://www.mdpi.com/2076-0760/12/4/253>

(3) Study link: <https://www.mdpi.com/2076-3387/13/2/55>

study link (4)

https://www.researchgate.net/publication/235747959_Teleworking_Frameworks_for_Organizational_Research

study link (5) <https://www.sciencedirect.com/science/article/pii/S0047272720300992#bb0100>

study link (6) <https://www.sciencedirect.com/science/article/pii/S2214367X23001199>

study link (7) <https://www.frontiersin.org/journals/psychology/articles/10.3389/fpsyg.2022.856196/full#ref92>