



**INTERNAL COMMUNICATION, INTERNAL SOCIAL
MEDIA, AND EMPLOYEE ENGAGEMENT: A
SEMANTIC NETWORK ANALYSIS**

SAFAE OULAD HAMMOU

Master's Thesis

Graduate School
Izmir University of Economics

Izmir

2022

**INTERNAL COMMUNICATION, INTERNAL SOCIAL
MEDIA, AND EMPLOYEE ENGAGEMENT: A
SEMANTIC NETWORK ANALYSIS**



SAFAE OULAD HAMMOU

A Thesis Submitted to

The Graduate School of Izmir University of Economics
Master's Program in Marketing Communications and Public Relations

Izmir

2022

ABSTRACT

INTERNAL COMMUNICATION, INTERNAL SOCIAL MEDIA, AND EMPLOYEE ENGAGEMENT: A SEMANTIC NETWORK ANALYSIS

Oulad Hammou, Safae

Master's Program in Marketing Communications and Public Relations

Advisor: Assoc. Prof. Dr. Selin TÜRKEL

July, 2022

This study aims to examine the impact of internal communication through using internal social media on employee engagement by disclosing the most prominent concepts covered by the previous academic studies dealing with internal communication, internal social media, and employee engagement and assessing the relationship among these concepts. A network study was conducted to achieve the aforementioned purpose. First, a semantic network analysis of abstracts of 77 research papers published in the Web of Science database was run using Pajek software, and the structure of the *Abstracts Network* was revealed based on five different measures, including degree centrality, closeness centrality, betweenness centrality, core, and articulation points. Second, a word frequency analysis of the managerial implications of the same 77 research papers was performed via NVivo software. The study findings assert the significant and positive relationship between internal communication, internal social media, and employee engagement. Furthermore, the obtained findings demonstrate that the most eminent concepts covered by previous studies are: “information”, “employee-organization relationship”, “job satisfaction”,

“organizational innovation”, “change management”, and “organizational success”. A high level of employee engagement mediated by effective internal communication strategies and practices that rely on sharing high-quality information through internal social media with all organization members contributes to attaining important organizational outcomes. Based on the research results, this study offers a set of actionable implications for academics and professionals in the communication and, specifically, public relations fields. Likewise, this thesis mentions some limitations and proposes suggestions for future research.

Keywords: internal communication, internal social media, employee engagement, semantic network analysis, word frequency analysis.



ÖZET

İÇ İLETİŞİM, KURUM İÇİ SOSYAL MEDYA VE ÇALIŞAN BAĞLILIĞI ÜZERİNE: ANLAMSAL AĞ ANALİZİ

Oulad Hammou, Safae

Pazarlama İletişimi ve Halkla İlişkiler Yüksek Lisans Programı

Tez Danışmanı: Doç. Dr. Selin TÜRKEL

Temmuz, 2022

Bu çalışma, iç iletişimin çalışan bağlılığı üzerindeki etkisini kurum içi sosyal medya kullanımı üzerinden iç iletişim, kurum içi sosyal medya ve çalışan bağlılığı ile ilgili önceki akademik çalışmalarda öne çıkan kavramların açıklanması ve bu kavramlar arasındaki ilişkinin değerlendirilmesi yolu ile incelemeyi amaçlamaktadır. Sözü edilen amaca ulaşmak için bir ağ çalışması gerçekleştirilmiştir. İlk olarak Web of Science veri tabanında yer alan 77 araştırma makalesinin özetleri, Pajek yazılımı kullanılarak semantik ağ analizine tabi tutulmuş ve Özetler Ağı'nın yapısı; derece, yakınlık, arasındalık merkeziliği, çekirdek ve artikülasyon noktaları olmak üzere beş farklı ağ analizi ölçüsüne dayalı olarak ortaya çıkarılmıştır. İkinci olarak, NVivo yazılımı aracılığıyla aynı 77 araştırma makalesinin yönetsel etkileri üzerine bir kelime frekans analizi yürütülmüştür. Çalışma bulguları; iç iletişim, kurum içi sosyal medya ve çalışan bağlılığı arasında anlamlı ve pozitif bir ilişki olduğunu ortaya koymaktadır. Ayrıca elde edilen bulgular, önceki çalışmalarda öne çıkan kavramların “bilgi”, “çalışan-örgüt ilişkisi”, “iş tatmini”, “örgütsel yenilik”, “değişim yönetimi” ve “örgütsel başarı” olduğunu göstermektedir. Kurum içi sosyal medya aracılığıyla

yüksek kaliteli bilgilerin tüm kurum üyeleriyle paylaşılmasına dayanan etkin kurum içi iletişim stratejileri ve uygulamaları aracılık ettiği yüksek düzeyde çalışan bağlılığının, önemli kurumsal sonuçlara ulaşılmasına katkıda bulunur. Araştırma sonuçlarına dayanarak, bu çalışma iletişim ve özellikle halkla ilişkiler alanlarında akademisyenler ve profesyoneller için bir dizi eyleme geçirilebilir çıkarım sunmaktadır. Aynı şekilde, bu tez bazı sınırlamalardan bahsetmekte ve gelecekteki araştırmalar için önerilerde bulunmaktadır.

Anahtar Kelimeler: iç iletişim, kurum içi sosyal medya, çalışan bağlılığı, anlamsal ağ analizi, kelime frekans analizi.





To Marcel BIRCAN

ACKNOWLEDGEMENTS

Preparing for my master's degree at the Izmir University of Economics constituted a watershed period in my professional and personal development. Several people significantly contributed to my success over three years. For this reason, I would like to recognize and thank all those people who, from near or far, in one way or another, have been a crucial part of the success of this work. First, I would like to express my most sincere and infinite acknowledgment to the Assoc. Prof. Selin TÜRKEL, my thesis advisor, for her invaluable supervision and assistance, her methodological advice, her continuous investment throughout the realization of this present work, and her generosity, understanding, and moral support, especially during the Covid-19 pandemic time. Thanks to her human, academic, and pedagogy qualities, I had the chance to be supervised in good conditions and with complete confidence.

I would like to express my genuine appreciation to all IUE staff, especially the teaching community of IUE and my professors from whom I have learned many valuable things that improved my knowledge and my academic and professional skills throughout the three years.

These acknowledgments would not be complete without a humble word for my family. I would like to express my infinite gratitude to my father, Youssef OULAD HAMMOU, my mother, Latifa EL ALAOUI SOSSEY, and my sister, Dounia OULAD HAMMOU; who always believe in me, in my skills, and my goals. Thank you for your presence, unconditional love and trust, and daily support and encouragement. Without you, I would never be the person I am.

TABLE OF CONTENTS

ABSTRACT.....	iii
ÖZET	v
ACKNOWLEDGEMENTS	viii
LIST OF TABLES	xii
LIST OF FIGURES	xiii
LIST OF ABBREVIATIONS	xiv
CHAPTER 1: INTRODUCTION	1
CHAPTER 2: INTERNAL COMMUNICATION	4
2.1. <i>Internal Communication Definition</i>	4
2.2. <i>Internal Communication Role</i>	5
2.3. <i>Internal Communication Channels</i>	6
2.3.1. <i>Oral Channels</i>	7
2.3.2. <i>Written Channels</i>	7
2.3.3. <i>Electronic Channels</i>	8
2.4. <i>Internal Communication Responsibility</i>	9
2.4.1. <i>Internal Communication as an Interdependent Field</i>	9
2.4.2. <i>Internal Communication as a PR Function</i>	10
2.4.3. <i>Internal Communication as an Independent Field</i>	11
2.5. <i>Internal Communication Skills</i>	11
2.6. <i>Internal Communication Benefits</i>	12
CHAPTER 3: INTERNAL SOCIAL MEDIA.....	13
3.1. <i>Social Media Definition</i>	13
3.2. <i>Social Media Types</i>	13
3.3. <i>Social Media Features</i>	15
3.4. <i>Internal Social Media Definition</i>	16

3.5.	<i>Internal Social Media Forms</i>	17
3.6.	<i>Internal Social Media Benefits</i>	21
3.7.	<i>Internal Communication Through Internal Social Media</i>	23
CHAPTER 4: EMPLOYEE ENGAGEMENT		24
4.1.	<i>Employee Engagement Definition</i>	24
4.2.	<i>Nature of Employee Engagement</i>	25
4.3.	<i>The Evolution of The Employee Engagement Concept</i>	27
4.4.	<i>Employee Engagement Models</i>	29
4.4.1.	<i>Kahn’s Personal Engagement Model</i>	29
4.4.2.	<i>Maslach, Schaufeli, and Leiter’s Employee Engagement Model</i>	30
4.4.3.	<i>Saks’s Employee Engagement Model</i>	31
4.4.4.	<i>Public Relation Model of Employee Engagement</i>	33
4.5.	<i>Employee Engagement Vs. Organizational Commitment</i>	34
4.6.	<i>Employee Engagement Benefits</i>	37
4.7.	<i>The Impact of Internal Communication on Employee Engagement</i>	37
4.8.	<i>Internal Communication Through Internal Social Media Leads To Employee Engagement</i>	40
CHAPTER 5: METHODOLOGY		42
5.1.	<i>Social Network Analysis</i>	42
5.2.	<i>Semantic Network Analysis</i>	43
5.3.	<i>Content Analysis and Word Frequency Analysis</i>	44
5.4.	<i>Study Sample</i>	45
5.5.	<i>Data Collection and Coding Process</i>	45
5.6.	<i>Application and Structure of The Semantic Network Analysis</i>	46
5.7.	<i>Application and Structure of The Word Frequency Analysis</i>	48
CHAPTER 6: FINDINGS.....		50

6.1. <i>Semantic Network Analysis Metrics of Abstracts Network</i>	50
6.2. <i>Degree Centrality Analysis</i>	51
6.3. <i>Closeness Centrality Analysis</i>	55
6.4. <i>Betweenness Centrality Analysis</i>	59
6.5. <i>Valued Core Analysis</i>	64
6.6. <i>Articulation Points Analysis</i>	69
6.7. <i>Total Findings of Five Measures</i>	69
6.8. <i>Word Frequency Analysis of Practical Implications</i>	74
6.9. <i>Comparison Between Semantic Network Analysis and Word Frequency Analysis</i>	79
CHAPTER 7: DISCUSSION.....	81
CHAPTER 8: CONCLUSION	97
8.1. <i>Theoretical and Practical Implications</i>	97
8.2. <i>Limitations and Future Research</i>	101
REFERENCES	102

LIST OF TABLES

Table 1. All-degree centrality analysis of <i>Abstracts Network</i>	50
Table 2. All-degree centrality analysis of <i>Abstracts Network</i>	52
Table 3. All-closeness centrality analysis of <i>Abstracts Network</i>	56
Table 4. Betweenness centrality analysis of <i>Abstracts Network</i>	60
Table 5. All max valued core values in <i>Abstracts Network</i>	64
Table 6. Frequency distribution of the valued core values in <i>Abstracts Network</i>	64
Table 7. 10 words with the highest valued core values in <i>Abstracts Network</i>	66
Table 8. Words with their number of repeats in measures.....	69
Table 9. The list of the 100 most frequent words in practical implications.....	75
Table 10. Common words in semantic network analysis and word frequency analysis	79
Table 11. Words unique to word frequency analysis.....	80

LIST OF FIGURES

Figure 1. Framework for understanding the elements of employee engagement	25
Figure 2. A model of the antecedents and consequences of employee engagement .	32
Figure 3. Conceptual illustration of the zones of engagement complexity.....	34
Figure 4. A three-component model of organizational commitment.....	36
Figure 5. Conceptual model of employee questions to be addressed through line manager and corporate internal communication.	38
Figure 6. The employee engagement concept and internal corporate communication: a conceptual model	39
Figure 7. Words tied with more than value 15 in <i>Abstracts Network</i>	68



LIST OF ABBREVIATIONS

AIDS: Acquired Immune Deficiency Syndrome

AT&T: American Telephone and Telegraph

CEO: Chief Executive Officer

DNA: Deoxyribonucleic Acid

EOR: Employee-Organization Relationship

ESM: Enterprise Social Media

FEIEA: Federation of European Business Communicators Associations

HP: Hewlett Packard

HR: Human Resources

IBM: International Business Machines

INSNA: International Network for Social Network Analysis

IT: Information Technology

LCD: Liquid Crystal Display

MMORPG: Massively-Multiplayer Online Role-Playing Game

NUD•IST: Non-numerical Unstructured Data Indexing Searching and Theorizing

OCB: Organizational Citizenship Behavior

POS: Perceived Organizational Support

PR: Public Relations

PSS: Perceived Supervisor Support

QSR: Qualitative Solutions and Research

RFI: Readiness For Innovation

RM: Resource Model

ROI: Return on Investment

RSS: Really Simple Syndication

SaaS: Software as a Service

SEB: Skandinaviska Enskilda Banken

SET: Social Exchange Theory

SM: System Model

SMS: Short Message Service

SNS: Social Networking Site

SPSS: Statistical Package for Social Sciences

TD Bank: Toronto-Dominion Bank

UGC: User Generated Content

UK: United Kingdom

US: United States



CHAPTER 1: INTRODUCTION

In an era that witnesses intense technological developments and numerous economic, political, and social changes, and even healthy crises, organizations confront permanent challenges and extreme competition among each other. Organizations strive toward gaining a sustainable competitive advantage to maintain their persistence and success in such conditions. Competitive advantage represents specific and unique resources that an organization possesses. These resources provide the organization its uniqueness in its sector and market (Mazzei, 2010). It is a fundamental attribute that allows the organization to outperform and beat its competitors. Human resources reflect the most valuable resources that generate a competitive advantage for an organization. They form the production force of the organization and its advocates and ambassadors that promote its image and reputation and create its value (Men, 2014). Therefore, owning well-informed and engaged human resources is critical to gaining a sustainable competitive advantage.

Internal communication is the interaction that takes place between managers and employees (Mishra, Boynton, and Mishra, 2014). Internal communication contributes to satisfying the communication needs of employees (Lemon, and Palenchar, 2018), developing transparency, and reinforcing the trust level among all organization members at all levels (Mishra, Boynton, and Mishra, 2014), thus leading to greater employee engagement. Several studies have confirmed that effective and successful internal communication strategies and practices positively influence employee engagement (Balakrishnan, and Masthan, 2013; Karanges, 2014; Men, 2014; Mishra, Boynton, and Mishra, 2014; Karanges et al., 2015; Ruck, Welch, and Menara, 2017; Verčič, and Vokić, 2017). Employee engagement is

“a positive, fulfilling, work-related state of mind characterized by vigor, dedication, and absorption” (Schaufeli et al., 2002, p. 74).

The Corporate Communication International survey conducted to study the opinions of American chief corporate communicators regarding employee engagement yielded that employee engagement is considered one of the three top priorities of organizations (Welch, 2011). The recent evolution of communication technologies and the penetration of social media platforms in the organizational context have dramatically

changed the communication scene in organizations (Mazzei, 2010). Organizations employ social media in two principal ways. Organizations use social media as a channel to interact with their external stakeholders, such as customers, suppliers, shareholders, and the general public. Moreover, they employ social media as a channel to communicate and collaborate with their internal stakeholders (employees) and build strong and trusted employee-organization relationship (Leonardi, Huysman, and Steinfield, 2013). Internal social media is the social media used by organizations to achieve internal communication purposes (Haddud, Dugger, and Gill, 2016). Internal social media has radically altered the internal communication landscape within organizations (Lipiäinen, Karjaluoto, and Nevalainen, 2014; Men, 2014) and reshaped internal communication strategies and practices (Ewing, Men, and O’Neil, 2019). It has evolved how organizations communicate and collaborate with their employees (Lee, 2016). Internal social media has known immense adoption and implementation by organizations as a new internal communication channel (Leonardi, Huysman, and Steinfield, 2013). Likewise, internal social media has witnessed a wide acceptance by employees, especially Millennials or -what is called- digital natives, who were born and grew up in the digital age characterized by a plenitude of digital media and easy access to information and knowledge (Friedl, and Verčič, 2011). Currently, most organizations orient towards integrating internal social media as the major communication channel to connect and share information among their employees due to its rich features and multiple benefits. Internal social media facilitates internal communication, improves knowledge base, and enhances collaboration, thus fostering employee engagement (Young, and Hinesly, 2015).

Studying the impact of internal communication through using internal social media on employee engagement is still in its infancy. Most research studies on internal communication and employee engagement have mainly examined the relationship between (1) internal communication and internal social media or (2) internal communication and employee engagement. Relatively, research studies dealing with the relationship among these three concepts remain sparse. Hence, this study is dedicated to deepening the understanding of the relationship among these three concepts to answer its central question: What is the impact of internal communication by using internal social media on employee engagement?

The main aim of this study is to examine the impact of internal communication through

using internal social media on employee engagement by disclosing the most prominent concepts covered by the previous academic studies dealing with internal communication, internal social media, and employee engagement and assessing the relationship among these concepts. To attain the study's main purpose, semantic network analysis and word frequency analysis were conducted, respectively, of abstracts and practical implications of the research papers published in the Web of Science database. The structure of this study follows a classical path. The study begins with a literature review on internal communication, internal social media, and employee engagement concepts. Then, the methodological choice, the study sample, and the data collection and coding phases are explained. Next, the findings obtained from the data analysis are presented and discussed. Finally, the study mentions its theoretical and practical implications and limitations. Furthermore, the study suggests directions for future research.

CHAPTER 2: INTERNAL COMMUNICATION

Communication is a critical activity in human social life. All human interactions and relationships are engendered basically by the act of communicating. Communication occurs when an individual transmits information, knowledge, thoughts, or emotions to one or more individuals using a channel to affect beliefs, attitudes, or behaviors. It is a process through which information is collected, processed, transmitted, and exploited. According to Duncan, and Moriarty (1998, p. 2),

“communication is the human activity that links people together and creates relationships. [. . .] It serves as a way to develop, organize, and disseminate knowledge”.

Communication is a social operation that automatically occurs when social situations appear (Luhmann, 1992). The basic communication model developed by Harold D. Lasswell (1948) by using the concepts of **who, what, in which channel, to whom, and with what effect** integrates (1) a source that creates and transmits the message, (2) a channel is the medium relied on to transmit the message, (3) noise is a set of elements that impede and affect the communication process, (4) a receiver who receives and deciphers the message, and (5) feedback is the action that guarantees that the message was transmitted to and received by the receiver (Duncan, and Moriarty, 1998). Communication constitutes an essential element that contributes widely to creating effective organizational management in organizations. Two types of communication exist within the organizations: (1) external communication and (2) internal communication.

2.1. Internal Communication Definition

Internal communication appeared during the 1990s in the US and Europe, and it attracted more attention in the new millennium (Verčič, Verčič, and Sriramesh, 2012). Currently, internal communication is among the key topics within the public relations and communication fields. Mishra, Boynton, and Mishra (2014) defined internal communication as the interaction that takes place between managers and employees. It helps broadly deliver important information related to the organization’s values, vision, missions, goals, and strategies. Internal communication is the communication that arises between managers and employees, intending to foster organizational

commitment, a sense of belonging to the organization, and consciousness of continually altering its environment and aims (Welch, and Jackson, 2007). Mazzei (2010) proposed a resource model (RM) of internal communication that focuses on intangible resources (knowledge and employee allegiance) and ignores the concept of organizational boundaries that represent the system model (SM) of internal communication. Organizations strive toward making effective internal communication to resist the intense competitive environment and gain a sustained competitive advantage.

The internal communication field also faces nomenclature issues. García-Morales, Matias-Reche, and Verdú-Jover (2011) stated that internal communication has numerous labels, such as internal relations, employee communication, employee relations, internal public relations, and staff communication. However, the term “internal communication” is the most suitable label to refer to the internal communication field. Likewise, Verčič, Verčič, and Sriramesh (2012) claimed that internal communication could be described by several names, including internal communication, internal communications, employee engagement, internal marketing, internal public relations, business communications, employee communications, employee relations, relations with the internal public, corporate communications, leadership communications, and management communications. Furthermore, in their study, they declared that the terms internal communication (in singular form), employee communication(s), and corporate communication(s) are the most used terms to allude to the internal communication field.

2.2. Internal Communication Role

Internal communication has a crucial role in organizations. The organization's success is intimately related to the existence of effective communication strategies (Kalla, 2005). The role of internal communication witnessed changes across eras. During the 1940s, the internal communication role was entertaining employees. Next, in the 1950s and 1960s, internal communication aimed to inform and persuade employees. Then, from the 1980s to date, it focused more on creating open communication (Theaker, 2020). Nowadays, internal communication practitioners concentrate on promoting employee engagement and commitment (Mishra, Boynton, and Mishra, 2014). Many studies confirmed that internal communication has two main roles. The first primary

role of internal communication is information dissemination within an organization. The fundamental role of internal communication is delivering information and providing employees with important information related to their job and responsibilities (King, and Lee, 2016). The second essential role of internal communication is relationship management. Several studies cited that internal communication aims to build and encourage positive and close relationships among an organization's members at all levels (Welch, and Jackson, 2007; King, and Lee, 2016).

Besides these two prominent roles, internal communication has other functions. It intends to align the employees' goals to organizational goals (Verčič, Verčič, and Sriramesh, 2012). Moreover, it promotes active employee behaviors (Mazzei, 2010). Also, recognition is one of the internal communication roles (King, and Lee, 2016).

2.3. Internal Communication Channels

Organizations and managers have relied on various internal communication channels to communicate and share information with employees, from traditional face-to-face communication and print publications to electronic and Web 2.0 media. These channels differ in terms of media richness, formality, and sociability (Gillis, 2006; King, and Lee, 2016). The role of each internal communication channel is different (King, and Lee, 2016). Employees may prefer other internal communication channels for different sorts of information or depending on their job responsibilities (Welch and Jackson, 2007; Mishra, Boynton, and Mishra, 2014). Therefore, internal communication managers need to conduct a communication audit to identify and be aware of the employees' preferred internal communication channels (Mishra, Boynton, and Mishra, 2014; Verčič, and Špoljarić, 2020). Likewise, internal communication managers are advocated to understand which internal communication channels are greatest suited for the message (Ishii, Lyons, and Carr, 2019). Consequently, employees will more likely reply and interact once they receive information in a form and channel they prefer (Mishra, Boynton, and Mishra, 2014).

How to select the right media for a specific message is a critical topic (Liu, Liao, and Pratt, 2009). A study conducted by Lengel, and Daft (1984) noted that media selection relies on media richness, which is defined as the capability and power of a medium to

treat information. The richness of a medium is grounded on the availability of (1) instant and direct feedback, (2) various signals, (3) language diversity, and (4) personal focus (Ishii, Lyons, and Carr, 2019). A high rich medium characterizes by immediate feedback, the use of verbal and nonverbal cues, natural language, and personal sources. High ambiguous communication must pass through rich media, whereas low ambiguous communication must be via lean media (Downs, and Adrian, 2004).

Furthermore, a study directed by Lee (2016) argued that four main factors influence the employee's adoption and use of a specific channel, including (1) **information quality** (includes accuracy, relevancy, and usefulness); (2) **ease of access** (temporal, spatial, and ease of use); (3) **network externalities** (the number of people who utilize a selected internal communication channel); and (4) **dyadic interactions** (the chance to join and contribute to an organizational dialogue). The internal communication channels commonly used to communicate within an organization are oral, written, and electronic channels.

2.3.1. Oral Channels

Oral channels are among the oldest internal communication channels. They are essentially based on the interaction through speech. They allow the organization's members to discuss and exchange ideas easily (Zheng, 2009). Personal and authentic oral communication helps create trust and loyalty (Smith, and Rupp, 2002). Oral channels rely mainly on face-to-face communication, which can take different forms: morning assembly, supervisor briefings, formal/informal meetings, one-on-one meetings, town halls meetings, group problem-solving sessions, conversations, speeches, management by walking around, internal communication committees formed by employees, workshops, seminars, conferences, events, organizational theatre, employee lounges and restaurants, external campaigns. Face-to-face communication is important in everyday internal communication, and its two-way nature widely enhances managers-employee relationships (Lipiäinen, Karjaluoto, and Nevalainen, 2014).

2.3.2. Written Channels

Written channels are suitable for presenting facts and documentation. Their advantage is that the employees can return anytime to the information they want and in different

places (Zheng, 2009). The study carried out by Mishra, Boynton, and Mishra (2014) asserted that employees prefer receiving information related to HR, benefits, and health plans in writing to read and understand the details. Written channels are often not the best medium to deliver a message or motivate employees due to the lack of chances for two-way communication (Stevens, and McElhill, 2000; Lipiäinen, Karjaluoto, and Nevalainen, 2014). Besides, they are not the most excellent medium for immediate engagement with employees due to the lack of immediacy and sociability, but they can be best at communicating constant and not time-sensitive information (Ewing, Men, and O'Neil, 2019). Written channels can take numerous forms, including documents, reports, policy manuals, bulletins, memos, memoranda, notes, notice boards, announcements, newsletters, house organs, magazines, wall posters, brochures, and fliers.

2.3.3. *Electronic Channels*

Most organizations have broadly adopted electronic channels as one of the internal communication channels. Electronic channels enable organizations to manage their human resources and activities in novel manners (Karjaluoto, and Huhtamäki, 2010). Electronic channels have numerous advantages, such as simplicity, speed, flexibility, the possibility to communicate worldwide at different times, load, and store information, revisability, and reviewability (Lipiäinen, Karjaluoto, and Nevalainen, 2014). Despite electronic channels' advantages and attractive features, organizations must be aware of their potential risks. The main challenges related to the usage of electronic channels are **(1)** the lack of clarity, **(2)** information overload, **(3)** the lack of feedback and social cues, **(4)** the development of direct, provocative, and aggressive communication style, **(5)** the abundance of formal communication, and **(6)** the lack of the development of personal relationships (Lipiäinen, Karjaluoto, and Nevalainen, 2014). Moreover, the heavy and continuous usage of electronic channels contributes to losing the human moment within the organization and generating distance among the organization's members (Smith, and Rupp, 2002). Therefore, there is a need for effective management and general and clear guidelines for using the different new electronic channels (Lipiäinen, Karjaluoto, and Nevalainen, 2014). Electronic channels can take several forms, including intranets, e-mails, e-newsletters, corporate radio, corporate television, LCD screens, digital signage, phone calls, SMS text messaging, voicemails, webcasts, video/teleconferences, streamlined video/audio, and

social media.

2.4. Internal Communication Responsibility

Internal communication can be under the responsibility of “Corporate Communications”, “Human Resources”, “Public Relations”, or another department. The question of which department in the organization manages internal communication and which department is responsible for ensuring, enhancing, and assessing its effectiveness remains critical (Mishra, Boynton, and Mishra, 2014). A Delphi study overseen by Verčič, Verčič, and Sriramesh (2012) to uncover the perspectives concerning the internal communication topic among the eleven members of national associations in the FEIEA (Federation of European Business Communicators Associations) yielded ambiguous results: Some results indicated that internal communication is an interdependent field combining elements of human resources management, communication, and marketing. Other results pointed out that internal communication is an independent field.

2.4.1. Internal Communication as an Interdependent Field

Several departments could be responsible for the internal communication function, including the human resources department, corporate communications department, public relations department, marketing department, corporate strategy department, change management department, general management, and/or CEOs (Verčič, Verčič, and Sriramesh, 2012). Many factors and elements impact the decision of which department must take responsibility for internal communication, such as the organization’s type and size, the organization’s management style, the human and financial resources, the organization’s culture and social environment, and the organization’s expectations from the internal communication function (Sinčić, and Vokić, 2007).

A study steered by Argenti (1998) stated that the function of internal communication could be practiced and executed by both: the human resources department and corporate communications department, where the human resources department is responsible for communicating micro information related to existing organizational policies such as the job requirements, payroll policy, benefits plans..., whereas the corporate communications department must take responsibility for macro information

that have a sensitive nature. The Delphi study conducted by Verčič, Verčič, and Sriramesh (2012) claimed that internal communication is an interdisciplinary field. It combines elements of human resources management, communication (corporate communication, public relations, integrated communication), and marketing with a view that internal communication is related more to the communication field (corporate communication, public relations, integrated communication). The overlapping of the internal communication function with other disciplines can lower the priority and importance of internal communication within the organization. Hence, the role of internal communication becomes a more tactical role than a strategic role (Neill, and Jiang, 2017).

2.4.2. *Internal Communication as a PR Function*

Internal communication is adequate for public relations professionals, especially during changes and crises (Argenti, 1996). Public relations professionals are the competent people within the organization to deliver external information to the organization's members (considering them as an internal public), and carry out the formation and distribution of internal information (Wright, 1995) because they have a high level of education and skills and they are qualified in both formal and informal communications (Mishra, Boynton, and Mishra, 2014).

Managers at different organizational levels play a vital role in impacting internal communication practices and their effectiveness. They are in charge of transmitting information and messages from the top management to employees and vice-versa (from employees to the top management) (Men, 2015). Immediate managers are considered the best information source for employees (Men, 2014). Therefore, public relations professionals are responsible for **(1)** educating managers about their dynamic roles in internal communication (Men, 2015), **(2)** providing them training in interpersonal communication and about the appropriate content, channels, and timing to communicate with their employees, (Mishra, Boynton, and Mishra, 2014; Men, 2015; Neill, 2018), **(3)** encouraging them to reduce the distance between them and their employees, be open-minded, and embrace changes (Men, 2015), and **(4)** helping them to execute the organization's communication plans (Mishra, Boynton, and Mishra, 2014).

2.4.3. Internal Communication as an Independent Field

Nowadays, the internal communication field knows a critical maturity. The internal public is similar to the external one regarding the necessity for sophisticated communications techniques (Argenti, 1998). Likewise, this domain plays a critical role within the organization and has numerous benefits at individual and organizational levels. Hence, internal communication deserves to be recognized as an independent field (Karanges et al., 2015).

Several initiatives endeavored to analyze and understand internal communication and advocate it as an independent field. For example, in 2010, internal communication practitioners in the UK established the Institute of Internal Communication as a separate entity from the Chartered Institute of Public Relations (Verčič, Verčič, and Sriramesh, 2012). Furthermore, the study findings of Lee, and Yue (2020) declared that internal communication reached the age of being recognized as an independent discipline that contributes to enriching and improving public relations literature.

Even though internal communication overlaps with other disciplines and has a strong relationship with other departments, internal communication also merits being recognized as an independent field and department within the organization. Setting an internal communication department managed by internal communication professionals is of utmost importance, especially in large-size organizations where communication and information dissemination among thousands of employees becomes more complex and inefficient (Martić, 2019).

2.5. Internal Communication Skills

During these last years, communication scholars and practitioners recognized internal communication as an independent field. Therefore, considering internal communication as a specialty requires identifying some specific knowledge-level and skills that practitioners of internal communication and managers must possess to achieve effective and successful internal communication practices. A study directed by Verčič, Verčič, and Sriramesh (2012) found that communication skills (speaking, writing, analyzing, designing, and internet knowledge) represent the most necessary skills needed for internal communication practices. Besides, other knowledge and skills such as general management knowledge, strategic communication knowledge,

networking skills, intercultural skills, project management knowledge, and journalism skills are fundamental for realizing effective internal communication practices. In addition, Welch (2012) found that persuasive writing skills, rhetorical messaging skills, and deep comprehension of the media effects are essential for effective internal communication. Another study carried out by Smith (2005) cited that to succeed and obtain a prosperous professional career in internal auditing, internal auditors must avoid being only investigators and, instead, contribute to adding value to the organization. Moreover, internal auditors must acquire excellent communication skills, powerful listening and interpersonal skills, intelligent abilities in voice reflection usage, and reliable methods and technics to influence auditees.

2.6. Internal Communication Benefits

Internal communication impacts the organization's daily existence (Mishra, Boynton, and Mishra, 2014). Effective internal communication can contribute to facilitating and enhancing communication among all an organization's members, receiving accurate and relevant information, creating a collaborative work environment, relieving stress in the workplace (King, and Lee, 2016), encouraging employees to disclose their personal health information within the workplace (Lee, and Li, 2020), rising the trust levels within the organization (Welch, and Jackson, 2007; King, and Lee, 2016), gaining social capital, creating a sense of belonging (King, and Lee, 2016), leading to a greater employee engagement (Balakrishnan, and Masthan, 2013; Karanges et al., 2015), and building a strong culture within the organization (Verčič, Verčič, and Sriramesh, 2012).

Likewise, internal communication contributes to enhancing several fundamental bottom-line outcomes of the organization (Yates, 2006), including publicly advocating for the organization, defending and recommending it to customers (Men, 2015; Thelen, and Men, 2020), improving performance levels (Balakrishnan, and Masthan, 2013), increasing productivity (Opitz, and Hinner, 2003), achieving greater customer satisfaction (King, and Lee, 2016), ameliorating the organization's reputation (Dortok, 2006), increasing profitability (Quirke, 2017), and attaining organizational success (Robson, and Tourish, 2005; Ruck, and Welch, 2012).

CHAPTER 3: INTERNAL SOCIAL MEDIA

Social media has fundamentally altered the communications landscape (Lipiäinen, Karjaluoto, and Nevalainen, 2014; Men, 2014). The introduction of social media is essentially rooted in the emergence of the internet and the appearance of the Web 2.0 era and User Generated Content (UGC) concepts.

3.1. Social Media Definition

Social media is

“a group of Internet-based applications that build on the ideological and technological foundations of Web 2.0 that allow the creation and exchange of User Generated Content” (Kaplan, and Haenlein, 2010, p. 61).

Most social media definitions encompass the Web 2.0 and User-Generated Content (UGC) concepts, as they constitute the two fundamental elements of social media (Sievert, and Scholz, 2017). The term "Web 2.0" appeared in 2004; it describes the new manner of using the World Wide Web by software developers and end-users. In the context of Web 2.0, all users became content creators. Also, they became able to continuously set up modifications on platforms and applications in a participatory and collaborative framework, where end-users participate and collaborate voluntarily to produce worthy content. The term "User-Generated Content (UGC)" was elicited in 2005. It represents the different sorts of media content developed by end-users from the general public, far from the control of paid Internet professionals (Daugherty, Eastin, and Bright, 2008; Kaplan, and Haenlein, 2010). The social media wave deeply shifted how people connect with each other. Haddud, Dugger, and Gill (2016) acknowledged that social media is a set of applications that provide users an opportunity to obtain and understand information, interact immediately with it, and contribute to creating content.

3.2. Social Media Types

The term "social media" is broad and encompasses many different types of applications with different affordances (Thompson, 2011). Kaplan, and Haenlein (2010) classified social media into six types relying on (1) social presence and media

richness and (2) self-disclosure and self-presentation. The six social media types are collaborative projects, blogs, content communities, social networking sites, virtual game worlds, and virtual social worlds.

Collaborative projects: are the type of social media that reflects the nature of the UGC concept. They allow end-users to create and develop collaboratively and simultaneously content to obtain better collective results (Kaplan, and Haenlein, 2010). This type of social media includes wikis/social knowledge (e.g., Wikipedia, WikiWikiWeb), news aggregation (e.g., Digg, Google Reader), social bookmarking applications (e.g., StumbleUpon, Delicious), review/rating sites (e.g., TripAdvisor, Yelp), and geo-location applications (e.g., FourSquare, Google Maps).

Blogs: constitute the initial form of social media. Blogs represent the personal web pages where the users share their personal diaries or information synopses related to a particular content domain (Kaplan, and Haenlein, 2010). The usage of blogs witnessed a substantial change, moving from online personal journals to a means for knowledge sharing and management in cross-cultural environments (Ojala, 2005). This type of social media encompasses blogs (e.g., Blogger, WordPress), microblogs (e.g., Twitter, Tumblr), and CEO blogs (e.g., Virgin.com/ Richard Branson's blog, Gatesnotes.com).

A CEO blog is a powerful medium to engage stakeholders (Briggs, 2007). CEOs of several multinational and large-size organizations have oriented toward blogs to communicate and interact with the public. In blogs, CEOs discuss topics related to the organization's strategies and missions, organizational policies, and social environment by following the formal blogging methods and technics (Evans et al., 2008). Blogs contribute to achieving critical benefits for organizations (Ojala, 2005). They help CEOs shed light on thought leadership, share their passion, create an authentic and credible channel to interact, enhance brand loyalty, beat the competitors, monitor their image, maintain a good reputation in the media, and create their personal brand (Morey, 2018). Demonstrating and maintaining the credibility of the blog's content is the main challenge that CEOs face during writing blogs (Evans et al., 2008).

Content communities: represent sharing different types of media content among users. Content communities' users (mostly) are not requested to make a private profile page (Kaplan, and Haenlein, 2010). This type of social media includes video content

communities (e.g., YouTube, Vimeo), image content communities (e.g., Instagram, Flickr), text content communities (e.g., BookCrossing), PowerPoint presentations (e.g., Slideshare), file sharing (e.g., InShare, Zapyra), podcasts (e.g., iTunes, Spotify), and photo and file repositories (e.g., Shutterstock, iStockphoto).

Social networking sites: represent the web-based services that provide users an opportunity to create a public or private profile in a specific system or platform, build a list of connections by adding other users to it, and interact with them (Boyd, and Ellison, 2007). Social networking sites are the most widespread and used type of social media. According to Kaplan, and Haenlein (2010), social networking sites are platforms and applications that allow users to communicate and interact by constructing personal profiles and adding each other to those profiles. These personal profiles can include any information type, such as texts, photos, video, audio files, documents, links, and blogs. Two types of social networking sites exist (Wang, and Kobsa, 2009). The first type is general social networking sites hospitable to the general public for registration (e.g., Facebook, LinkedIn, MySpace). The second type is internal social networking sites (enterprise social networking sites) that are open only to a particular organization's employees (e.g., Facebook at Work, Microsoft Sharepoint, Yammer, Oracle's Social Network, Salesforce's Chatter). In addition to the general SNS and internal SNS, this type of social media encompasses instant messenger applications (e.g., *WhatsApp*, Viber), peer-to-peer video interfaces (e.g., Zoom, Skype), and discussion forums (e.g., Reddit, Quora).

Virtual worlds: are platforms that reproduce a three-dimensional environment to allow users to see in the form of personalized avatars and react with each other as they might do in real life (Kaplan, and Haenlein, 2010). Virtual worlds include two forms: (1) **virtual game worlds** that identify some strict rules for their users in the framework of MMORPG (massively-multiplayer online role-playing game) (e.g., World of Warcraft, Sony's EverQuest). (2) **Virtual social worlds** that do not require rules and allow users to interact more freely (e.g., Second Life, Kaneva).

3.3. Social Media Features

Social media is characterized by various rich features that distinguish it from other communication channels. The key feature of social media is the user-generated content

feature, which makes the social media users content creators (Young, and Hinesly, 2014), and helps them voice their opinions, ideas, and concerns (Men, 2014). Social media combines the two-way, conversational, dialogical, interactive, personal, humanized, social, relational, communal, and empowering features (Men, and Tsai, 2013; Men, 2014; Ewing, Men, and O'Neil, 2019). Furthermore, social media is a multimedia channel that permits users to publish messages in different forms, including texts, emojis, audio, pictures, and videos (Ewing, Men, and O'Neil, 2019). Besides, social media features by the speed in disseminating information. Hence, the speed and ease of information distribution drive to information overload (Hewitt, 2006).

Moreover, social media is characterized by the accessibility feature where its applications can be accessed via different electronic devices. In addition, social media affords communicative actions visibility and persistence features. Persistence refers to the permanent availability of information to users. The visibility and persistence features enable employees to learn from previous successful communications and experiences (Leonardi, Huysman, and Steinfield, 2013).

3.4. Internal Social Media Definition

Social media has penetrated the corporate world. Multinational, large, medium, and small-size organizations and nonprofit and governmental organizations have followed the new and innovative social media trend (Kaplan, and Haenlein, 2010).

The number of organizations that use social media for business purposes is rapidly growing. The Communication ROI Study Report, issued by Towers Watson Wyatt Worldwide in 2010 about capitalizing on effective communication, noted that 40% of participants from 328 companies in 22 various industries in diverse regions around the world, representing 5 million employees, increased their use of social media for work-related purposes. Jennings, Blount, and Weatherly (2014) mentioned that 73.3% of 262 participants, who employ in an enormous range of US industries, use social media to fulfill purposes related to business. A study overseen by Friedl, and Verčič (2011) to assess the social media usage privately and for business purposes found that the most common social media activity of 310 employees in a large IT company is visiting social networking sites (69 %), followed by watching online videos (65 %), reading

online forums or discussion groups (64 %), reading blogs (60 %), uploading videos and music and creating articles in a wiki or posting them on other websites (less than 10%), and writing on microblogging sites (9%). Social media constitutes a substantial component of the organizations' communication scenery, especially internal communication (Men, and Tsai, 2013). A study steered by Men (2015) to explore the internal communication role of CEOs argued that 60,11% of CEOs rely on social media platforms to transmit information to their employees.

The term “internal/enterprise social media” was traded for the first time at a conference in 2004. It describes the social media used within organizations to accomplish internal communication purposes. Leonardi, Huysman, and Steinfield (2013) defined internal social media as Web-based platforms and applications that (1) facilitate communication among co-workers within the organization, (2) enable the identification of communication partners, (3) allow employees to share, edit, and sort text and files, and (4) provide them the opportunity to check the co-workers' updates. Internal social media platforms and applications aid employees in easily communicating and sharing personal and professional information with their co-workers (Haddud, Dugger, and Gill, 2016).

3.5. Internal Social Media Forms

The internal social media advent has fundamentally pursued three directions in the organizational context: (1) the usage of publicly available sites, (2) the implementation of private systems, and (3) the development of in-house developed proprietary solutions (Leonardi, Huysman, and Steinfield, 2013).

Public sites: During the first phases of social media emergence, organizations oriented toward using publicly available sites like Facebook, Facebook at Work, and LinkedIn; to achieve some of their strategic goals. In this phase, the organization members started connecting and interacting with each other on public sites. However, using these publicly available sites produced some problems: proprietary information leakage, hierarchy problems, and personal and work boundary issues (Skeels, and Grudin, 2009).

Facebook is one of the most popular social networking sites on the internet. Facebook has witnessed a rapid and vast proliferation among individuals worldwide since its

creation in 2004 by Mark Zuckerberg. Also, it has unexpectedly penetrated the workplace. Facebook helps employees communicate with their co-workers and share information easily and fast (Vitak et al., 2012). A study conducted by Bizzi (2018) found that 32% of employees use Facebook for work-related purposes. Another study directed by Robertson, and Kee (2017) emphasized that job satisfaction is intimately associated with Facebook usage: the more employees interact with their co-workers on Facebook, the more their job satisfaction level arises. Thanks to the multiple benefits that Facebook provides to employees and organizations, it became considered a professional platform that contributes to managing and controlling work-life boundaries during the social media era (Vitak et al., 2012). Therefore, Facebook Company introduced the "**Facebook at Work**" platform in 2016 (or the new label "Workplace by Facebook").

Facebook At Work is a business platform with the same interface as the familiar Facebook, and it encompasses a set of great functionalities and features. This platform is dedicated to the business world and strives to empower employees to communicate with their co-workers across different electronic devices (desktop/laptop computers and mobile devices). Likewise, Facebook at Work seeks to promote and enhance the interaction and collaboration among employees within an organization. Hence, many organizations have started to use it (Bizzi, 2018).

Private systems: Over time, to face personal security concerns, organizations have oriented toward the private implementation of open source or proprietary software on the organization's own servers or on a private basis as a hosted "Software as a Service" (SaaS) like Microsoft SharePoint and IBM Connections. These open sources or proprietary software encompass the different social media functions such as wikis, other collaboration tools, blogs, microblogs, social analytics, and social networking sites features.

Microsoft SharePoint is a free web-based platform with a sophisticated and easy interface developed to facilitate communication and collaboration. It has five main principles: manage, build, organize, discover, and share (Baldissara-Kunnela, 2016). Microsoft SharePoint is considered an internal communication and collaboration channel that integrates the characteristics of intranet and cloud computing technologies (Diffin, Chirombo, and Nangle, 2010). Microsoft SharePoint encompasses a set of

practical and rich tools divided into three main categories. (1) Communication tools such as online calendars, announcements, discussions, and blogs. (2) Collaboration tools like document libraries and wikis. (3) Other tools include issue tracking, project tasks, online surveys, task management, link list, and image libraries (Herrera, 2008). These tools contribute to managing information in a protected, effective, distantly available, and unified manner (Diffin, Chirombo, and Nangle, 2010). Several organizations have adopted the Microsoft SharePoint platform thanks to its numerous benefits, including collaborative communication, collaborative knowledge base, information management, project management, and so on (Diffin, Chirombo, and Nangle, 2010; Rockinson-Szapkiw, 2012). A study carried out by Herrera (2008) stated that the use of Microsoft SharePoint by the University of Mississippi Libraries changed the communication and collaboration landscape within the library, where it contributed successfully to enhancing online communication and collaboration among more than 50 employees across the library departments. Furthermore, this platform allowed the library employees to upload and update content on their own departmental site, discover the other departmental sites' content, realize the content immediacy, attain timeliness, recognize the libraries' tasks and projects, and acknowledge other departments' workloads. Another study overseen by Rockinson-Szapkiw (2012) indicated that student-to-student connectedness and student-to-advisors connectedness are positively associated with Microsoft SharePoint usage by 93 doctoral students. Besides, this platform helped doctoral students gather, manage, and distribute information during the dissertation process, facilitate the dissertation process, and interact and collaborate with their advisors.

IBM Connections is an enterprise social networking software developed particularly for organizations in 2007 by IBM, a global multinational technology company (IBM, 2021). The IBM Connections software has a high-security level and could be implemented on-premises, in hybrid environments, or in private/public clouds (Baldissara-Kunnela, 2016). IBM Connections aims to create effective communication, achieve better collaboration, and facilitate relationship-building among co-workers (HCLSOFTWARE). Moreover, this software seeks to empower its users, engage them, and enhance their trust level (Baldissara-Kunnela, 2016). The IBM Connections software encompasses a set of rich and easy-to-use applications and features, including Home Page, Profiles, Activities, Files, Content Manager,

Communities, Blogs, Wikis, Discussion Forums, Bookmarks, Mail, Presence, Chat and Meetings, Accessibility, Surveys and Polls, Social Analytics, Metrics, Libraries, Feeds, External Users, Events, and Kudos Badges (Muller et al., 2012; Baldissara-Kunnela, 2016). Many large-size multinational organizations have adopted the IBM Connections software in their workplace as a communication and collaboration channel, including McDonald's, Lufthansa, SEB (Skandinaviska Enskilda Banken), Royal Bank of Scotland, TD Bank, (Toronto-Dominion Bank), Tele2, AT&T (American Telephone and Telegraph), Cemex, Electrolux, and Sennheiser (CYONE). A study steered by Muller et al. (2012) claimed that organizations from different sectors, including Sales, Marketing, Consulting, Development (hardware and software), Support, and Research, use the IBM Connections Communities tool.

In-House developed proprietary solutions: Large-size and powerful organizations have developed in-house proprietary solutions like the Beehive system created by IBM (DiMicco et al., 2008; Steinfield et al., 2009) and the WaterCooler system built by HP (Brzozowski, 2009). These in-house proprietary solutions or custom-built systems are primarily deployed by computer and IT companies that strive to study and analyze the role and benefits of these systems on organizations (Leonardi, Huysman, and Steinfield, 2013).

Beehive (also labeled SocialBlue) is an internal social networking site designed by IBM Company for only its employees (IBMers) in 2007 and hosted by IBM Research (DiMicco et al., 2008). Beehive is an enterprise social networking site dedicated only to IBM employees (Wang, and Kobsa, 2009). Beehive strives toward the production and consumption of social-network-centric information for socialization. Therefore, Beehive's two core objectives are improving relationship building and people sensemaking on a personal and a professional level within the workplace based on the shared content (DiMicco et al., 2009). Beehive does not face privacy issue concerns (Wang, and Kobsa, 2009) for two main reasons: (1) Employees must access the site with their authenticated names. (2) The employee Beehive profile is linked to the contact information within the corporate directory. Hence, Beehive offers two simple options related to the privacy settings: make the content visibility private or public to a user's network of connections (DiMicco et al., 2009). The Beehive design is almost similar to Facebook; it contains many sections such as Profile photo, Status message, The facts, Beehive counters, Featured, Hive fives, Events, About me, Connections,

Photos, and The buzz (IBM). Likewise, Beehive offers its users various features, such as creating a profile, posting updates, sharing pictures and posts, commenting, tagging, organizing events, and making top five lists (Ward).

After the first three months of Beehive's launching, 285 users joined and used the platform (DiMicco et al., 2009). Then, after nine months of Beehive implementation, Archambault, and Grudin (2012) observed that most employees use this internal social networking site to share personal information more than professional one. A study conducted by Wang, and Kobsa (2009) declared that IBM employees use Beehive primarily as a social channel to build and strengthen relationships with their co-workers. Another study directed by DiMicco et al. (2008) cited that the Beehive platform usage enhances bonding social capital and increases the sense of citizenship.

WaterCooler is an internal web service platform developed in 2007 by HP (Hewlett Packard), a global technology company, and available only to its employees. WaterCooler aims to improve communication, relationship building, and knowledge management within HP. WaterCooler combines the internal social media used within the organization into a particular platform and cross-references it with the organization's directory. It encompasses RSS (Really Simple Syndication) feeds, Filtering, People tagging, Microblogging, Bookmarking, and blogging. WaterCooler had many benefits for HP employees. It contributed to improving the employees' insights regarding their workplace, enhancing communication among co-workers, facilitating the relationship-building process among people with similar interests or expertise, and helping employees in the organizational orientation process (Brzozowski, 2009).

3.6. Internal Social Media Benefits

Numerous benefits make internal social media a preferred communication channel for organizations over traditional channels. Internal social media contributes widely to facilitating communication among all levels of employees and the organization, and across the organization's departments, regions, and hierarchical levels (Men, 2014; Young, and Hinesly, 2014; Sievert, and Scholz, 2017; Ewing, Men, and O'Neil, 2019), sharing information easily and effectively (Lee, 2013; Young, and Hinesly, 2014; Sievert, and Scholz, 2017), improving the employees' knowledge base (Haddud,

Dugger, and Gill, 2016; Sievert, and Scholz, 2017), strengthening the connection toward the organization's values, missions, and objectives (Lee, 2013; Ewing, Men, and O'Neil, 2019), improving some deficits of other electronic communication channels (Sievert, and Scholz, 2017), limiting spatial and temporal obstacles (Kim, and Ko, 2012; Men, 2014; King, and Lee, 2016; Sievert, and Scholz, 2017), providing flexibility for synchronous or asynchronous communication (Kaplan, and Haenlein, 2010), creating a constant connection to the organization and employees (Fulk, and Yuan, 2013; King, and Lee, 2016; Weber, and Shi, 2017; Robertson, and Kee, 2017), enhancing and supporting bi-directional/ two-way communication (Kim, and Ko, 2012; Men, 2014; Haddud, Dugger, and Gill, 2016), promoting symmetrical communication within the organization (Men, 2014), blurring the boundaries between communication hierarchies (Men, 2014), empowering employees (Lee, 2013; Men, 2015), allowing and encouraging employees to voice and share their knowledge, ideas, opinions, and solutions more easily (Lee, 2013; Men, 2014; Young, and Hinesly, 2014; King, and Lee, 2016), reaching direct feedback (Sievert, and Scholz, 2017), engendering transparency (Tierney, and Drury, 2013), occurring social interactions (Leonardi, Huysman, and Steinfield, 2013), building and strengthening personal and professional relationships between colleagues across the organization (Buettner, 2015; Haddud, Dugger, and Gill, 2016; King, and Lee, 2016; Weber, and Shi, 2017; Robertson, and Kee, 2017), increasing social capital (Fulk, and Yuan, 2013; Weber, and Shi, 2017; Robertson, and Kee, 2017), promoting employee active and passive participation (Tierney, and Drury, 2013; Men, 2014), fostering team collaboration and cooperation (Young, and Hinesly, 2014; Buettner, 2015; Haddud, Dugger, and Gill, 2016; Ewing, Men, and O'Neil, 2019), boosting motivation (Sievert, and Scholz, 2017), reducing turnover (Buettner, 2015), reinforcing employee engagement (Men, 2014; 2015; Young, and Hinesly, 2014; Sievert, and Scholz, 2017), facilitating organizational cultural changes (Young, and Hinesly, 2014), helping in decision-making processes (Haddud, Dugger, and Gill, 2016), inspiring employees to serve as advocates (Ewing, Men, and O'Neil, 2019), decreasing costs (Buettner, 2015), ameliorating the productivity (Young, and Hinesly, 2014; Buettner, 2015; Men, O'Neil, and Ewing, 2020a), rising innovation (Young, and Hinesly, 2014; Buettner, 2015; Men, O'Neil, and Ewing, 2020b), impacting organizational effectiveness (Ewing, Men, and O'Neil, 2019), and achieving organizational performance (Men, O'Neil, and Ewing, 2020a).

3.7. Internal Communication Through Internal Social Media

Recently, many organizations have started using internal social media as an internal communication channel thanks to its rich features and several benefits. Some internal communication practitioners have integrated internal social media as an essential tactic of the internal communication strategy to disseminate information and attain collaboration and other long-term organizational outcomes (Lipiäinen, Karjaluoto, and Nevalainen, 2014; Ewing, Men, and O’Neil, 2019). Internal social media represents a superior internal communication channel to easily, fast, and constantly connect to the organization's members. This innovative channel and its attributes can cover some of the deficits and limitations of existing internal communication channels (King, and Lee, 2016). Furthermore, internal social media applications contribute widely and effectively to fulfilling the two main internal communication goals: disseminating information and building positive relationships (Elving, 2005). Currently, most organizations are orienting toward the social media implementation in the workplace for accomplishing communication, collaboration, and other organizational goals (Robertson, and Kee, 2017). Numerous organizations have embraced internal social media in the internal communication process with their digital-savvy employees (Men, O’Neil, and Ewing, 2020a). The study findings of Ewing, Men, and O’Neil (2019) noted that in the future, internal communication practitioners will rely more and more on internal social media for these four reasons: **(1)** Internal social media is more conversational, interactive, dialogical, and humanized. **(2)** Internal social media makes the employees content collaborators and social ambassadors. **(3)** Internal social media is a multimedia and mobilization channel. **(4)** Internal social media is behavior and data-driven.

CHAPTER 4: EMPLOYEE ENGAGEMENT

Employee engagement is a key component of an organizational environment. Although its importance, there is a lack of academic research on employee engagement, its factors, benefits, demographic variables, personality differences variables, cross-cultural differences variables, and its moderating role (Sun, and Bunchapattanasakda, 2019; Shen, and Jiang, 2019).

4.1. Employee Engagement Definition

Employee engagement took its essence from practice more than theory (Saks, 2006), creating ambiguity among academics and practitioners (Macey, and Schneider, 2008). However, in the past twenty years, employee engagement gained considerable popularity and more attention from academics from diverse disciplines (Shuck, and Wollard, 2010).

Kahn, in his research work **“Psychological conditions of personal engagement and disengagement at work”** (1990), defined the concept of employee engagement as the harnessing and dedication of an employee’s self physically, cognitively, and emotionally by varying degrees during its role performance. Then, in his research work **“To be fully there: psychological presence at work”** (1992), Kahn developed the concept of psychological presence and added it to his previous definition. Employee engagement should be one of the top priorities for organizations’ leaders and managers around the globe, thanks to its positive impacts on the organizational social life, performance, and competitiveness. According to Schaufeli et al. (2002, pp.74-75), employee engagement is

“a positive, fulfilling, work-related state of mind characterized by vigor, dedication, and absorption.”

Vigor is the high levels of energy, mental resilience, effort investment, and persistence at work. Dedication is the increased sense of importance, enthusiasm, inspiration, pride, and challenge. Absorption is the high level of focus and engrossment in work.

For Saks (2006, p. 602), employee engagement is

“a distinct and unique construct that consists of cognitive, emotional, and

behavioral components that are associated with individual role performance.”

Ewing, Men, and O’Neil (2019) identified employee engagement in five dimensions: (1) Purposes and meaning. (2) Absorption, attentiveness, and discretionary efforts. (3) Positive affectivity. (4) Empowerment. (5) Participation and involvement.

4.2. Nature of Employee Engagement

Some research works related to employee engagement studied the nature of this concept. The most significant work that has dealt with this issue is the study of Macey, and Schneider (2008). The authors argued that a varied nomological grid characterizes the employee engagement concept. It includes trait, state, and behavioral constructs (Macey, and Schneider, 2008; Welch, 2011).

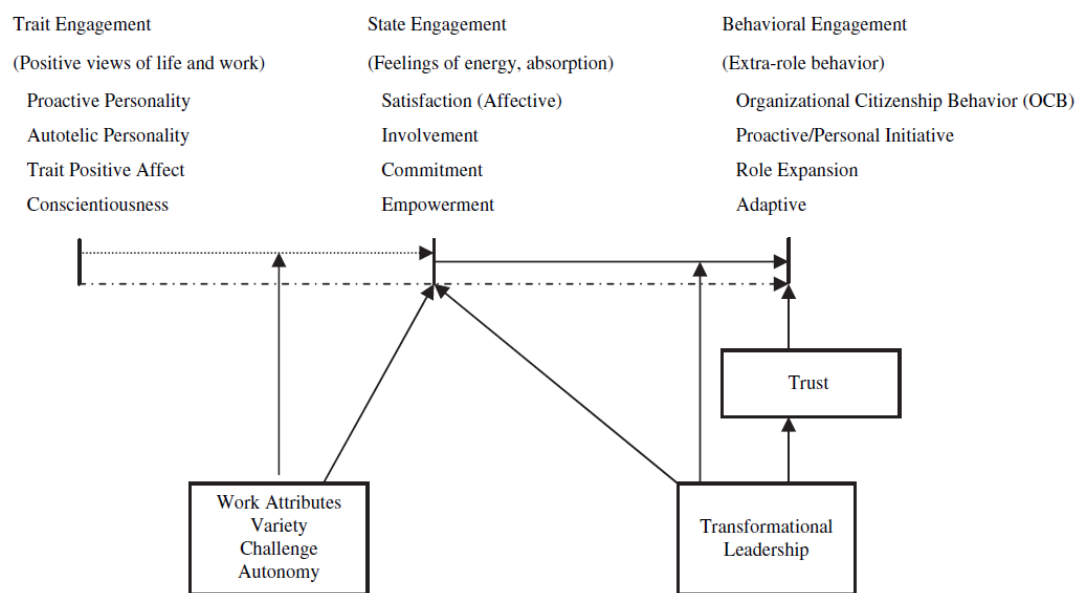


Figure 1. Framework for understanding the elements of employee engagement (Source: Macey, and Schneider, 2008, p. 6)

Macey, and Schneider’s model proposes that trait engagement encompasses the following attributes: proactive personality, autotelic personality, trait positive affectivity, and conscientiousness. A proactive personality is a personality that strives, intentionally and by taking personal initiative, toward influencing and changing its environment (Bakker, Tims, and Derks, 2012). Autotelic personality encompasses a set of attributes that contribute to the engagement and flow process. These attributes

are curiosity, persistence, low self-centeredness, intrinsic motivation, alteration of monotony, facing challenges, and attentional control (Tse et al., 2020). Positive affectivity is a constellation of positive emotions that help create, exploit, and orient the energy into the job role (Young et al., 2018). Conscientiousness is one of the Big Five personality dimensions. Conscientiousness is related to the sense of duty and responsibility, self-discipline, self-control, planning, organization, hard work, achievement attaining, and personal energy investment into work (Handa, and Gulati, 2014; Young et al., 2018). Personality traits play a key role in promoting employee engagement. A study carried out by Young et al. (2018) affirmed that positive affectivity, proactive personality, conscientiousness, and extraversion are essential elements that help foster employee engagement.

State engagement comprises attributes such as the positive affectivity components of job satisfaction, job involvement, organizational commitment, and empowerment. Locke (1969, p. 27) defined job satisfaction as

“an emotional state of pleasure produced by evaluating a person's work to achieve or promote its value.”

Job satisfaction is the personal positive emotional dimension that employees possess toward their job and organization (Ali and Farooqi, 2014; Vorina, Simonič, and Vlasova, 2017). Several factors can influence the job satisfaction level. Based on the motivational theory of Herzberg (1968), the factors impacting job satisfaction can be divided into two main categories: intrinsic factors (motivators) and extrinsic factors (hygiene) of job satisfaction. Intrinsic factors of job satisfaction incorporate job characteristics and requirements, responsibility, achievement, recognition, advancement opportunities, and career development. Extrinsic factors of job satisfaction encompass job security, work and social environment, management style, organizational policies, compensation policies, status and seniority, employee-organization relationship, and personal life (Tepayakul, and Rinthaisong, 2018). Job involvement is the high level of importance that employees confer on their job in their lives. It is the consideration of the job as the core life interest of an employee (Griffin et al., 2010). Organizational commitment is a psychological state that represents **(a)** a desire (affective commitment), **(b)** a need (continuance commitment), and **(c)** an obligation (normative commitment) to sustain working in an organization (Meyer, and

Allen, 1991). Empowerment is a set of actions carried out by the organization to foster employee strength and self-efficacy. Empowerment consists of four main cognitions: meaning, competence, self-determination, and impact. Organizational environment, job security, and rewards are the fundamental factors that impact empowerment. Empowerment contributes to numerous individual and organizational outcomes (Jose, and Mampilly, 2014). Job satisfaction, job involvement, affective organizational commitment, and psychological empowerment are positively associated with employee engagement (Schaufeli, 2013; Jose, and Mampilly, 2014).

Behavioral engagement includes attributes like Organizational Citizenship Behavior (OCB), proactive/personal initiative, and role expansion. The Organizational Citizenship Behavior (OCB) concept refers to the voluntary personal behavior that contributes essentially to ameliorating and fostering the overall organizational performance. Organizational Citizenship Behaviors are divided into altruistic behaviors and generalized compliance. Altruistic behaviors aim to assist and support other co-workers. Generalized compliance behaviors are related to respecting and responding to the organization's policies, rules, and practices. The key Organizational Citizenship Behavior determinants are altruism, conscientiousness, civic virtue, sportsmanship, and courtesy (Pouramini, and Fayyazi, 2015). Organizational Citizenship Behavior is positively associated with employee engagement (Ariani, 2013). Role expansion is the action that aims to integrate other responsibilities into job roles, considering them as predictable activities and not discretionary ones. Role expansion differs from extra-role behavior in three points. (1) Role expansion necessitates employees to truly change their views toward their role. (2) Role expansion involves continuous employee engagement in a role. (3) Role expansion requires assuming new additional responsibilities (Grant, and Hofmann, 2011).

Macey, and Schneider (2008) concluded that the job design attributes and the existence of a transformational leader influence state engagement. Besides, the presence of a transformational leader affects trust levels, thus behavioral engagement.

4.3. The Evolution of The Employee Engagement Concept

Since the 1990s, the concept of employee engagement has been widely considered within organizations and subsequently gained the attention of scholars. Welch (2011)

identified the employee engagement concept's stages across time and discussed its different definitions. According to Welch, the employee engagement concept has witnessed a series of waves:

Pre-wave (pre-Katz and Kahn 1966-1990): In the pre-wave era, the employee engagement concept, generally entitled engagement, was defined as

“[. . .] engage in occasional innovative and cooperative behavior beyond the requirements of the role but in the service of organizational objectives” (Katz, and Kahn, 1978, p. 20).

Researchers acknowledged the need for engagement with work and organization in this period, linking it to organizational effectiveness (Welch, 2011).

Wave 1 (1990-1999): The first wave era was characterized by the publishing of two significant academic works on the employee engagement concept under the term “personal engagement,” by Kahn: 1) **“Psychological conditions of personal engagement and disengagement at work” (1990)**, and 2) **“To be fully there: psychological presence at work” (1992)**. The studies of Kahn are considered the fundamental references related to the employee engagement concept (Welch, 2011). Kahn developed the first personal engagement model and determined the three necessary psychological conditions for engagement: meaningfulness, safety, and availability. Disengagement is the employee's separation of him/herself cognitively and emotionally from work roles (Pech, and Slade, 2006). It occurs when the organization does not satisfy substantial employee needs (Kang, and Sung, 2019). Disengagement makes an employee physically present but mentally absent. This withdrawn state, developed by disengagement, negatively impacts employee creativity, innovation, and performance (Hollis, 2015). Kahn's works had an enormous influence on developing the employee engagement concept. Buckingham, and Coffman (1999, p. 248) contributed to introducing the term “employee engagement” after using it in their book, citing that:

“The right people in the right roles with the right managers drive employee engagement.”

Wave 2 (2000-2005): The second wave era witnessed several research works

conducted by both: practitioners and academics, such as Maslach, Schaufeli, and Leiter (2001); Luthans, and Peterson (2002); Harter, Schmidt, and Hayes (2002); Schaufeli et al. (2002); Schaufeli, and Bakker (2004); May, Gilson, and Harter (2004). Many terms were employed to refer to employee engagement in this period, like job engagement, work engagement, and employee engagement.

Wave 3 (2006-2010): In the third wave era, numerous research works contributed to the advancement of the employee engagement concept, such as Saks (2006); Truss et al. (2006); Fleming, and Asplund (2007); Macey, and Schneider (2008); Schaufeli, Taris, and Van Rhenen (2008). In this period, most researchers used the term “employee engagement”; while Saks (2006) integrated “job engagement” and “organization engagement” to refer to employee engagement. Moreover, distinguished by the increase in academic attention, this period brought about the publishing of two engagement handbooks in 2010: 1) “**Work Engagement: A Handbook of Essential Theory and Research**” (Leiter, and Bakker, 2010) and 2) “**Handbook of Employee Engagement: Perspectives, Issues, Research and Practice**” (Albrecht, 2010).

4.4. Employee Engagement Models

Recently, several academics and practitioners, descending from both disciplines: communication and public relations, have focused on studying and analyzing, deeply, the employee engagement concept. Therefore, they developed models that conceptualize the employee engagement concept. These models contributed widely to understanding the employee engagement concept, identifying its antecedents, and recognizing its outcomes.

4.4.1. Kahn’s Personal Engagement Model

Kahn (1990) proposed the first model of personal engagement. Kahn’s model is the original model that conceptualizes the personal engagement concept. Kahn determined the three necessary psychological conditions leading to engagement in his model: meaningfulness, safety, and availability.

Psychological meaningfulness is the feeling of getting a return on investments of the self through physical, cognitive, or emotional energy (Kahn, 1990). Meaningfulness is when people feel worthy, valuable, useful, challenged, given autonomy, and clearly

and succinctly perceive goals (Kahn, 1990; Lemon, and Palenchar, 2018). The factors influencing psychological meaningfulness are task characteristics, role characteristics, and work interactions. **Psychological safety** is the ability to express oneself without the anxiety of future negative results related to self-image, status, or career (Kahn, 1990). People experience such safety when they feel trustworthy, secure, and aware of consequences. Psychological safety factors are mainly related to the social environment, including interpersonal relationships, group and intergroup dynamics, management style and process, and organizational norms (Sun, and Bunchapattanasakda, 2019). **Psychological availability** is the possession of the physical, emotional, or psychological resources to engage and participate at a specific instant (Kahn, 1990). The factors affecting psychological availability are individual distractions, such as depletion of physical energy, depletion of emotional energy, individual insecurity, and outside lives (Anitha, 2014). Kahn (1990) confirmed that these three psychological conditions lead to physical, emotional, and cognitive engagement in the role performance.

4.4.2. Maslach, Schaufeli, and Leiter's Employee Engagement Model

Maslach, Schaufeli, and Leiter's employee engagement model emerged and developed within the burnout literature (Schaufeli, Taris, and Van Rhenen, 2008; Rana, Ardichvili, and Tkachenko, 2014). Burnout is a psychological syndrome that appears in work environments and characterizes by exhaustion, cynicism, and inefficacy (Freeney, and Tiernan, 2006). The engagement characteristics are energy, involvement, and efficacy, the direct opposites of the three burnout features (exhaustion, cynicism, and inefficacy) (Maslach, Schaufeli, and Leiter, 2001). Exhaustion is the draining of an employee's mental, emotional, and physical resources. It is the sense of fatigue, overwork, and extreme tiredness during working. Cynicism is an employee's detached attitude and radical indifference toward his/her job, coworkers, and organization. Cynicism is related to a sense of negativity, pessimism, and hopelessness. Inefficacy is the lack of self-esteem, deficiency, lack of proficiency, inability, and failure to attain achievement in work (Schaufeli, Taris, and Van Rhenen, 2008; Cole et al., 2012).

Maslach, Schaufeli, and Leiter (2001) suggested six work-life areas that lead to burnout: workload, control, reward, community, fairness, and values. As engagement

is the opposite of burnout, so it is assessed and driven by the opposite of the six areas related to burnout, including a sustainable workload, feelings of choice and control, appropriate reward and recognition, a supportive work community, fairness and justice, and meaningful and valued work. The level of mismatch, or match, between the individual and six domains of his/her job environment, can drive, respectively, to burnout or engagement.

4.4.3. Saks's Employee Engagement Model

Saks (2006) developed a model of the antecedents and consequences of job and organization engagements by analyzing the present models of engagement (Kahn and Maslach, Schaufeli, and Leiter) and relying on Social Exchange Theory (SET). After testing the two previous models and SET, Saks (2006) found the following conclusions:

- In Kahn's model, task characteristics are one of the factors that influence psychological meaningfulness. Likewise, in Maslach, Schaufeli, and Leiter's model, job characteristics have a key role in the workload and control conditions.
- In Kahn's model, organizations' and supervisors' interpersonal relationships and supportive management enhance psychological safety. Similarly, in Maslach, Schaufeli, and Leiter's model, a supportive work community that encompasses perceived organizational support (POS) and perceived supervisor support (PSS); is one of the conditions that lead to employee engagement.
- According to Kahn (1990), rewards and recognition can create a sense of psychological meaningfulness because they constitute a return on investments for employees for their role performances. Similarly, Maslach, Schaufeli, and Leiter (2001) emphasized that appropriate rewards and recognition represent employee engagement conditions. Also, based on SET, gaining rewards and recognition from the organization leads to higher engagement levels (Saks, 2006).
- High perceptions of justice in the organization make employees fair in their role performances, thus enhancing their engagement levels (Saks, 2006).

From these conclusions, Saks (2006) developed a model that proposes that the

employee engagement antecedents are job characteristics, perceived organizational support (POS), perceived supervisor support (PSS), rewards and recognition, procedural justice, and distributive justice. The employee engagement outcomes are job satisfaction, organizational commitment, intention to quit, and organizational citizenship behavior.

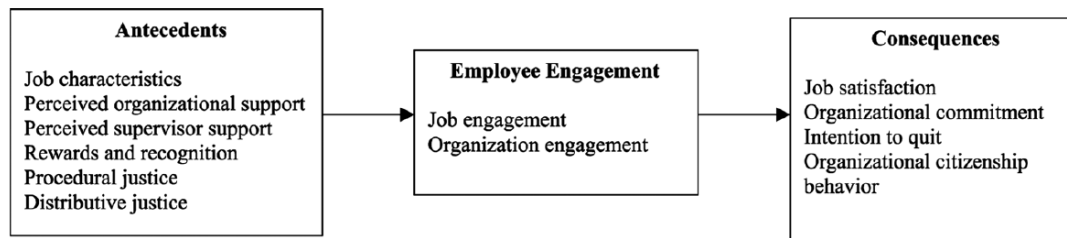


Figure 2. A model of the antecedents and consequences of employee engagement (Source: Saks, 2006, p. 604)

According to the job characteristics model, the fundamental job characteristics are categorized into five categories: skill polyvalence, task identity, task significance, autonomy, and feedback. These job characteristics generate some noteworthy psychological states: job meaningfulness, responsibility for the job outcomes, and knowledge of the job results. Hence, attaining personal and job outcomes such as job motivation, job satisfaction, and job performance (Pieterse-Landman, 2012). Based on the organizational support theory, perceived organizational support (POS) is connected to the organization's voluntary readiness, when needed, to satisfy the employees' socioemotional needs, fulfill their well-being, and recognize and reward their efforts and contributions. POS engenders positive results for both employees (job satisfaction) and the organization (affective commitment, positive performance, and low turnover) (Rhoades, and Eisenberger, 2002). Perceived supervisor support (PSS) represents the positive and supportive interpersonal relationships between supervisors and subordinates. The direct supervisors pay attention to the employees' well-being, recognize their contributions, and support them continuously. Perceived supervisor support is significantly and positively related to employee engagement (Jose, and Mampilly, 2015). Rewards are a significant element of incentive programs that aim to appreciate the employees for their work and performance and increase their motivation (Ghosh et al., 2016). Recognition at work is one of the essential motivation sources. It seeks to demonstrate that an employee's work, efforts, qualifications and skills,

achievements, and contributions are well recognized by all organization's members (Brun, and Dugas, 2005). Rewards and recognition are complementary concepts. They have no individual value; they must be applied together to obtain the desired results (Ghosh et al., 2016). Procedural justice reflects the fairness in the process followed in the distribution of rewards in the organization and virtue in applying managerial policies and practices. Distributive justice represents fairness in the distribution of rewards and recognition in the organization (Biswas, Varma, and Ramaswami, 2013). The employees' high perceptions of organizational justice impact job engagement (Kang, and Sung, 2019). A study overseen by Ram, and Prabhakar (2011) asserted the positive association between employee engagement and job characteristics, intrinsic and extrinsic rewards, perceived organizational support, perceived supervisor support, and perceptions of procedural justice and distributive justice.

Job engagement differs from organization engagement regarding the antecedents. The antecedents of job engagement are distinct from the antecedents of organization engagement (Saks, 2006; Malinen, and Harju, 2017). Job characteristics and perceived organizational support constitute the job engagement antecedents. Whereas; perceived organizational support and procedural justice represent the organization engagement antecedents (Saks, 2006).

4.4.4. Public Relation Model of Employee Engagement

Over two decades ago, public relations academics and practitioners started to give more interest to the employee engagement concept (Lemon, and Palenchar, 2018). It has become one of the top priorities for public relations practitioners (Men, O'Neil, and Ewing, 2020a). Even though the public relations academics predicted several potential outcomes related to employee engagement, the concept still knows a shortage and weakness in the public relations literature (Karanges, 2014). Public relations academics and practitioners also developed models that conceptualize employee engagement. For example, Lemon, and Palenchar (2018) found that there are six zones of engagement that create the core of employee engagement: **(1)** Non-work-related experiences, **(2)** workplace freedom, **(3)** going beyond job roles and responsibilities, **(4)** vocational calling, **(5)** creating value, and **(6)** constructing connections.

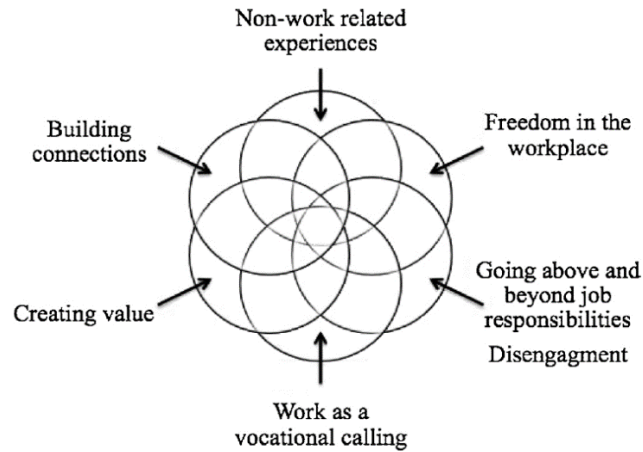


Figure 3. Conceptual illustration of the zones of engagement complexity (Source: Lemon, and Palenchar, 2018, p. 9)

The model of zones of engagement offers a new conceptualization of the employee engagement concept from a public relations literature lens (Lemon, and Palenchar, 2018). This model enlightens the complexity of the employee engagement concept, where being engaged requires the experience of many zones that could be working in tandem and impacted by individual experiences. Furthermore, it helps create employee-centric engagement tactics (Lemon, 2019).

4.5. Employee Engagement Vs. Organizational Commitment

The term employee engagement overlaps with other terms, such as job satisfaction, job involvement, and organizational commitment (Newman, Joseph, and Hulin, 2010). The foremost challenge academics face in dealing with the employee engagement concept is illuminating the difference between employee engagement and organizational commitment. Employee engagement is not a new term representing the organizational commitment concept (Welch, 2011). In contrast, employee engagement is a distinct concept, and organizational commitment is a fundamental factor in employee engagement.

Between 1970 to 1999, organizational commitment witnessed significant attention from academics and professionals. To this very day, it remains a critical topic within organizations. Many researchers conducted studies related to organizational commitment, such as Staw, 1977; Salancik, 1977; Scholl, 1981; Morrow, 1983; Reichers, 1985; Meyer, and Allen, 1991; Meyer et al., 2002; González, and Guillen,

2008; Griffin et al., 2010. Nevertheless, these researchers had different views concerning constructing a unified and accepted definition of organizational commitment.

Meyer, and Allen's works are considered references in conceptualizing the organizational commitment concept. According to them, organizational commitment is a psychological state that represents (a) a desire (affective commitment), (b) a need (continuance commitment), and (c) an obligation (normative commitment) to sustain working in an organization (Meyer, and Allen, 1991). **Affective commitment** is an individual's optimistic, emotional, and soulful attachment to his/her organization (Chen, and Indartono, 2011). **Continuance commitment** represents the consciousness of the consequences and costs related to quitting the organization (Yahaya, and Ebrahim, 2016). Continuance commitment is strongly related to side bets (Becker, 1960). These side bets can be work- or non-work-related. They are developed when employees recognize that attaining some of their essential goals, work- or non-work-related, depends on continuing to work in that organization (Meyer, and Allen, 1991). **Normative commitment** is a feeling of obligation to keep membership within the organization (Yahaya, and Ebrahim, 2016). Organizational commitment is a specific willingness to preserve membership in the organization, identification with the organizational objectives and successes, employee allegiance, and a desire to invest effort in the organization (Aydin, Sarier, and Uysal, 2011).

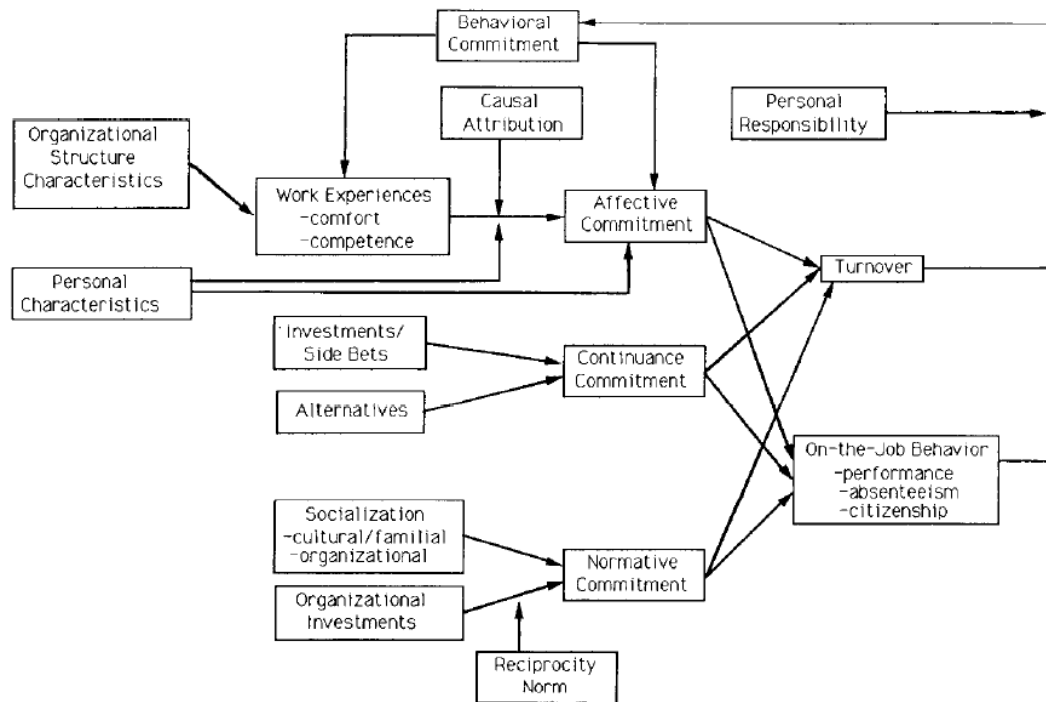


Figure 4. A three-component model of organizational commitment (Source: Meyer, and Allen, 1991, p. 68)

Meyer, and Allen (1991) proposed a three-component model of organizational commitment. This model clarifies that each component of the three organizational commitment components has diverse antecedents and effects on on-the-job behavior. The affective commitment antecedents are personal characteristics, organizational structure characteristics, work experiences, and behavioral commitment (Tufail et al., 2012). The continuance commitment antecedents are divided into two main categories: the side bets/investments and the availability of alternative employment opportunities. The continuance commitment increases when the number of investments increases and the alternative employment opportunities decrease (Meyer, and Allen, 1991). The normative commitment antecedents are socialization and organizational investments. Familial or cultural and organizational socialization may affect normative commitment (Wiener, 1982). Besides, the investments provided by the organization may impact the normative commitment (Tufail et al., 2012). Moreover, this model affirmed that the three forms of commitment influence turnover and on-the-job-behavior (Chughtai, and Zafar, 2006).

Several studies attempted to clarify the difference between employee engagement and organizational commitment. Kahn, 1990; Maslach, Schaufeli, and Leiter, 2001; Saks,

2006; Macey, and Schneider, 2008 acknowledged that employee engagement is different from organizational commitment. Saks (2006, p. 602) stated that employee engagement is

“a distinct and unique construct that consists of cognitive, emotional, and behavioral components that are associated with individual role performance.”

Employee engagement is distinct from many related concepts like organizational commitment, job satisfaction, job involvement, and organizational citizenship behavior (Maslach, Schaufeli, and Leiter, 2001; Saks, 2006). From the definitions of the two concepts and their models, it can be deduced that employee engagement and organizational commitment are (1) defined and measured differently, and (2) their antecedents, conditions, and outcomes are not similar. Thus, they are two distinct and unique constructs.

4.6. Employee Engagement Benefits

Employee engagement attains enormous benefits for an organization. It contributes to developing trusted and high-quality relationships with employer and other stakeholders both within and beyond the organization (Saks, 2006; Ram, and Prabhakar, 2011), fostering positive behaviors toward the organization (Saks, 2006; Balakrishnan, and Masthan, 2013; Wang et al., 2020), increasing the attachment to the organization and the tendency to continue working for it (Balakrishnan, and Masthan, 2013; Mishra, Boynton, and Mishra, 2014; Wang et al., 2020), reducing the level of absenteeism, turnover, shrinkage, safety incidents, and product defects (Robison, 2012; Wang et al., 2020), improving extra-role behavior (Schaufeli, and Bakker, 2004), talking positively about the organization (Mishra, Boynton, and Mishra, 2014), advocating the organization (Balakrishnan, and Masthan, 2013), creating a high individual and organizational performance (Balakrishnan, and Masthan, 2013; Mishra, Boynton, and Mishra, 2014; Anitha, 2014; Sun, and Bunchapattanasakda, 2019), and achieving organizational success (Ram, and Prabhakar, 2011; Anitha, 2014).

4.7. The Impact of Internal Communication on Employee Engagement

Several studies from the communication and public relations disciplines have highlighted the link between internal communication and employee engagement,

confirming that internal communication positively influences employee engagement (Balakrishnan, and Masthan, 2013; Karanges, 2014; Men, 2014; Mishra, Boynton, and Mishra, 2014; Karanges et al., 2015; Ruck, Welch, and Menara, 2017; Verčič, and Vokić, 2017). Being well informed about the organization's updates is a fundamental employee engagement factor (Truss et al., 2006). Internal communication facilitates promoting employee engagement (Welch, 2011). It fulfills employees' communication needs (Lemon, and Palenchar, 2018), builds transparency, and enhances the trust level between managers and employees (Mishra, Boynton, and Mishra, 2014), thus leading to greater employee engagement. Good quality information, clear and consistent communication (Saks, 2006), open and two-way communication (Welch, and Jackson, 2007; Karanges et al., 2015; Lemon, and Palenchar, 2018), well-designed internal communication programs and practices (Papalexandris, and Galanaki, 2009; Mishra, Boynton, and Mishra, 2014), and effective internal communication strategies (Bakker, Albrecht, and Leiter, 2011) are substantial elements for enhancing and strengthening employee engagement.

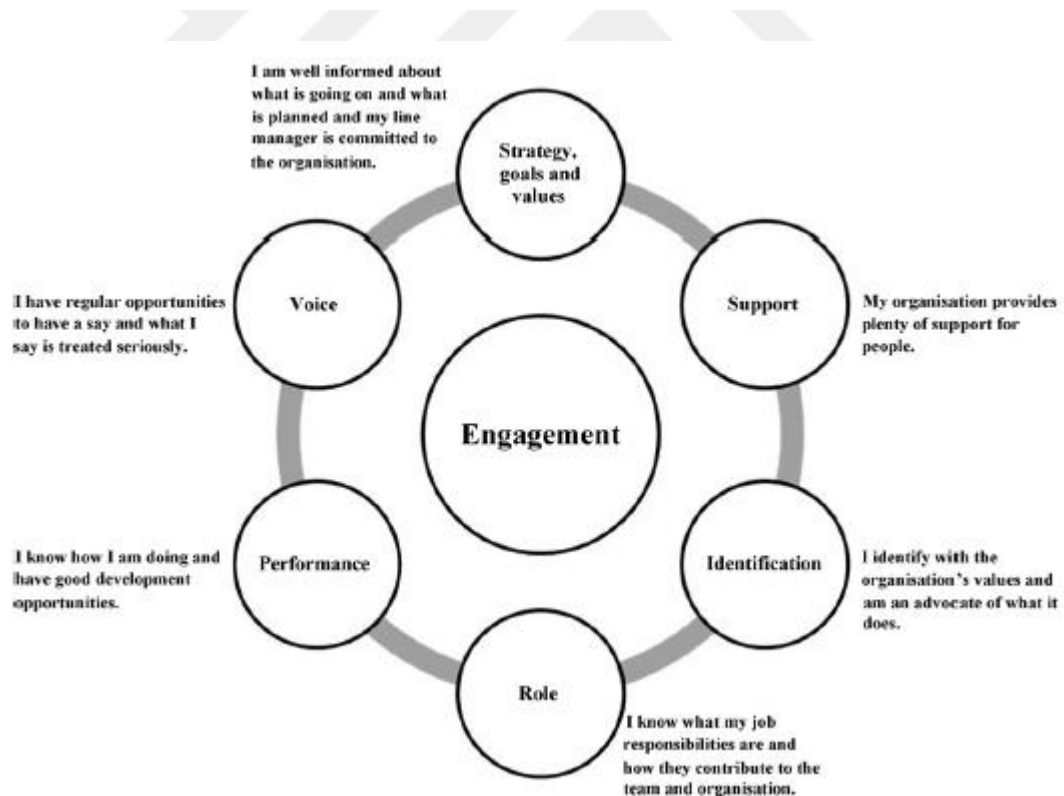


Figure 5. Conceptual model of employee questions to be addressed through line manager and corporate internal communication (Source: Ruck, and Welch, 2012, p. 300)

Some researchers developed models that illustrate how internal communication is positively associated with employee engagement. Ruck, and Welch (2012) proposed a model that conceptualizes engagement as an internal communication outcome. This model identified the employee communication needs (strategy, goals, values, voice, performance, role, identification, and support) that corporate internal communication must satisfy to drive employee engagement. Also, this model clarified that the two-way symmetrical internal communication and effective communication of line, peer, and team management enhance employee engagement (García-Morales, Matias-Reche, and Verdú-Jover, 2011).

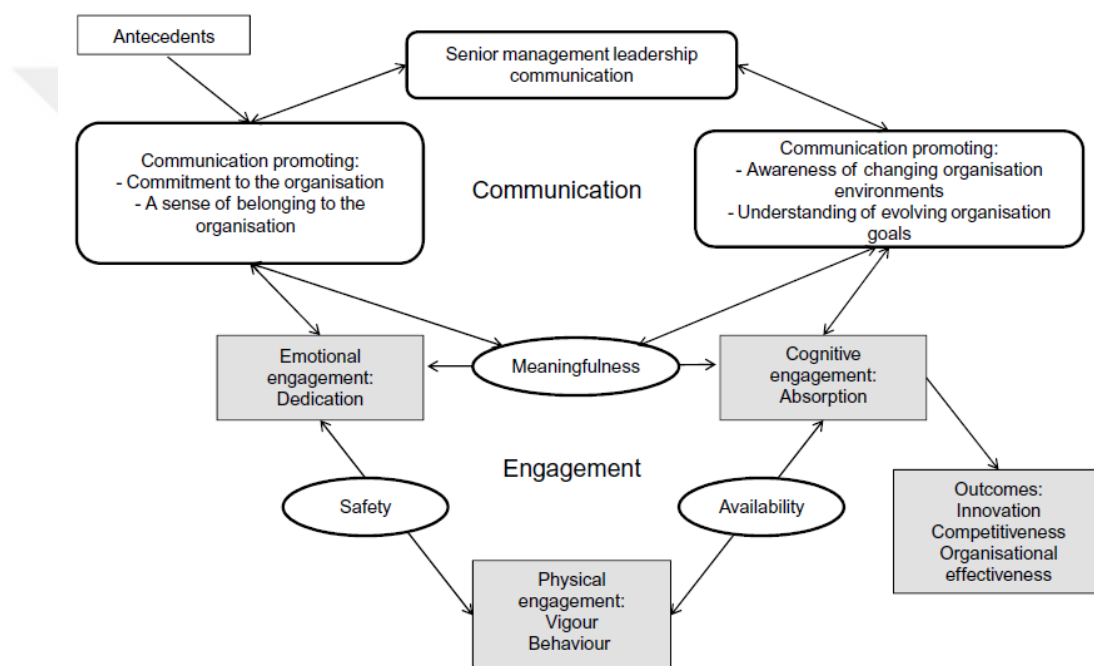


Figure 6. The employee engagement concept and internal corporate communication: a conceptual model (Source: Welch, 2011, p. 340)

According to Welch (2011), communication is a fundamental employee need that organizations must meet to generate employee engagement. Welch developed a model that illuminates the communication impact on employee engagement. Based on this model, senior management leadership communication enhances commitment, sense of belonging to the organization, awareness of changing organizational environments, and understanding of evolving organizational goals, thus fostering employee engagement. Likewise, this model enlightens that employee engagement, supported by effective internal communication, promotes critical outcomes for the organization,

such as innovation, competitiveness, and organizational effectiveness.

4.8. Internal Communication Through Internal Social Media Leads To Employee Engagement

Some studies have shed light on the influential role of internal social media (as an internal communication channel) in fostering employee engagement. Several studies such as Friedl, and Verčič, 2011; Leonardi, Huysman, and Steinfield, 2013; Men, 2014; 2015; King, and Lee, 2016; Sievert, and Scholz, 2017; Ewing, Men, and O’Neil, 2019; Men, O’Neil, and Ewing, 2020a increasingly supported the idea of internal social media as an internal communication channel, promotes employee engagement thanks to its abundant features and numerous benefits. A study steered by Haddud, Dugger, and Gill (2016) confirmed that the self-reported usage of internal social media is intimately and positively associated with the levels of self-reported employee engagement. Another study conducted by Ewing, Men, and O’Neil (2019) explored the internal social media role in promoting employee engagement through the lens of 27 internal communication practitioners worldwide. Furthermore, this study offered guidance about the effective practices related to using internal social media to foster employee engagement. This guidance includes **(1) Internal social media training and education:** Organizations should provide employees with training and explicit policies on the effective manner to exploit the internal social media features and benefits and to share appropriate content externally. Consequently, avoid the sharing of proprietary, confidential, or offensive content. **(2) Employees’ empowerment and employee social advocates identification:** Organizations must be open-minded to new communication technologies such as social media and strategically exploit their rich features (Men, O’Neil, and Ewing, 2020a). Therefore, organizations must empower employees and encourage the usage of internal social media (Li, 2016). **(3) Leadership involvement and endorsement:** Organizations must embrace leaders and earn their support and endorsement for programs and strategies that adopt internal social media as a new internal communication channel. **(4) Monitoring and listening:** Organizations must monitor internal social media to mitigate the risks of employee sharing of inappropriate content. Besides, organizations must listen and take into consideration the employees’ opinions. **(5) Creating sharable, relevant, and practical content:** Organizations must actively create relevant, practical, and engaging social media content for employees. **(6) Authenticity and**

consistency: Organizations and employees must share authentic and consistent content on internal social media. Men, O’Neil, and Ewing (2020a) found that internal social media usage creates high levels of perceived transparency regarding the organization and its identification. Hence, it contributed to promoting employee engagement.



CHAPTER 5: METHODOLOGY

This study aims to examine the impact of internal communication through using internal social media on employee engagement by disclosing the most prominent concepts covered by the previous academic studies dealing with internal communication, internal social media, and employee engagement and assessing the relationship among these concepts. Semantic network analysis and word frequency analysis were conducted, respectively, of abstracts and practical implications of the research papers published in the Web of Science database to attain the study purpose.

This chapter represents the theoretical framework of the methodology used to analyze the study data. Therefore, social network analysis, semantic network analysis, content analysis, and word frequency analysis are explained. Also, this chapter provides information about the study sample and describes the data collection process. Finally, this chapter sheds light on Pajek and NVivo, the software used to perform semantic network analysis and word frequency analysis, respectively.

5.1. Social Network Analysis

Social network analysis is a research method that aims to investigate social structures between entities (Scott, 1988; Otte, and Rousseau, 2002). Social network analysis first appeared and evolved within the field of sociology, specifically in sociometry studies developed by Moreno in the 1930s to analyze the structures of the social and political relationships between entities (Scott, 1988; Wambeke, Liu, and Hsiang, 2012). Social network analysis became recognized in the social sciences in the early 1980s thanks to the field institutionalization since the late 1970s. The starting point of this institutionalization was the foundation of the INSNA association (International Network for Social Network Analysis) in 1977 by Barry Wellman; it is an official and professional organization of researchers and practitioners interested in social network analysis (Otte, and Rousseau, 2002). Likewise, an official and annual conference (Sunbelt) was organized and sponsored by the INSNA association. Also, a journal (e.g., *Social Networks*) was created for research on social network analysis. In addition, the invention of computer software dedicated to generating social network analysis contributed widely to increasing recognition of this research method. The most popular social network analysis software are UCINET, Pajek, Krackplot, Gradap,

Multinet, and Negopy (Otte, and Rousseau, 2002; Borgatti et al., 2009). These programs analyze and visualize not only social networks (kinship, friendship, community) but also networks in different areas such as genealogical networks, internet networks, citation, co-citation, and co-authorship networks, semantic networks, corporate relations networks, labor market networks (careers, recruitment), collaboration networks, global economy networks, international trade networks, international relations networks, transportation networks, diffusion networks (news), organic molecule networks in chemistry (DNA), health and welfare support networks (AIDS), archaeological networks, crime and deviance networks (terrorism) (Scott, 1988; Otte, and Rousseau, 2002; Mrvar, and Batagelj, 2016, Mrvar, and Ljubljana, 2018). Hence, scientists from other fields, including linguistics, genealogy, anthropology, geography, physics, economics, computer science, and even artificial intelligence, benefit from social network analysis techniques and software.

5.2. Semantic Network Analysis

Social network analysis and semantic network analysis are relatively similar: They both analyze and reflect a system or network structure. However, semantic network analysis diverges from social network analysis in that 1) its network elements are words instead of people, organizations, communities, or societies, and 2) the structure of this network relies on shared meaning instead of communication partners (Scott, 2012). Semantic network analysis is a research method that reflects the structure of a network based on shared meaning (Doerfel, and Barnett, 1999). It represents a set of processes that intend to analyze and assess the semantic network structure obtained from textual data (Drieger, 2013). Semantic network analysis maps the relationships network of common concepts extracted from a text (Petrick, 2014). Semantic network analysis is a developed form of content analysis. The content analysis mostly captures the text's explicit meanings, while semantic network analysis can extract the implicit meanings, considering the sentimental aspect (Türkel, Uzunoğlu, and Kip, 2020).

Semantic network analysis is executed by the social network analysis methods and software that help obtain quantitative and qualitative outcomes. Therefore, it is modeled in the form of a graphic presentation (graph) reflecting nodes (points) associated with edges or arcs (lines), where nodes represent concepts and edges/arcs indicate the relationships that exist between these concepts. The graphic presentation

provides attractive visualization of a semantic network and facilitates the process of visual analysis (Drieger, 2013; Petrick, 2014). Consequently, it allows the readers to easily explore the implicit meanings of the text (Barnett, and Jiang, 2017).

In this study, a computer-assisted semantic network analysis was conducted of abstracts of 77 research papers published in the Web of Science database from 1986 until March 2021. The reason for choosing abstracts for analysis is because they shed light on a study's main topic, purposes, findings, and implications. Abstracts intend to underline a study's essential information. They offer readers precise summaries of the entire research (Barnett, and Jiang, 2017). Hence, it becomes easy for readers to identify the key insights and directions of the study. The purpose of performing semantic network analysis is to (1) explore the most central concepts in the selected research papers and (2) assess the relationship among these concepts.

5.3. Content Analysis and Word Frequency Analysis

Content analysis is a research method that aims to assess the features of messages in an objective and systematic way to construct valid inferences from textual data (Iker, 1974; Downe-Wamboldt, 1992). The textual data might be in three principal forms, including verbal, visual, and written. It can be extracted from different sources such as conversations, interviews, focus groups, observations, questionnaires, and prints (Hsieh, and Shannon, 2005). The primary purpose of content analysis is to reinforce the quality of the findings inferences by assorting texts into a set of categories representing identical meanings and associating these categories to the data context, which means that the findings have to be analyzed and explained in terms of the data context (Downe-Wamboldt, 1992; Hsieh, and Shannon, 2005). Content analysis is used in diverse academic disciplines such as economics, journalism, political science, social science, psychology, nursing, and health sciences (Hsieh, and Shannon, 2005; Elo, and Kyngäs, 2008; Campos, and Turato, 2009). Likewise, content analysis can be employed as a quantitative or qualitative research method (Hsieh, and Shannon, 2005). Also, content analysis studies two different types of relationships, including statistical relationships and semantical relationships. Statistical analysis is the basic content analysis technique that examines the statistical relationships between words based on their frequency of occurrence. Semantic analysis (explained above) investigates the semantical relationships among words based on their shared meanings (Iker, 1974).

Content analysis is a set of flexible analytic techniques that enhance the analysis and understanding of the manifest or latent text content. The most common technique of content analysis is word frequency analysis. Word frequency analysis is the traditional content analysis technique that focuses on counting the frequency of occurrence of words, phrases, or sentences (Petrick, 2014). Therefore, the more a word occurs frequently, the more it is deemed the most dominant and significant word in the text.

In this study, a computer-assisted word frequency analysis was conducted of the practical implications of 77 research papers published in the Web of Science database from 1986 until March 2021. The purpose of generating word frequency analysis is to reveal the most frequent concepts in the selected research papers and extract the dominant topics and issues.

5.4. Study Sample

To determine the study sample, the search term “internal communication AND employee engagement” was used as the search string of the Web of Science database. In addition, the following criteria were applied to frame the study sample:

- **Timespan:** All years (1986 – March 2021)
- **Web of Science categories:** All categories
- **Document types:** Articles
- **Language:** English

After applying the settings above, the search engendered 118 articles for analysis published between 2005 and 2021. The articles list was exported from the Web of Science database to the Excel file to avoid errors. After reading the content of the articles, 41 of them were eliminated (30 articles are irrelevant, 5 are inaccessible, 5 are not available in English, and one is duplicated). The final sample of the study is 77 (see APPENDICES) articles. The study data were collected from the abstracts and practical implications of these 77 articles.

5.5. Data Collection and Coding Process

The study data were treated between April 01, 2021, and October 28, 2021. The abstracts and practical implications of each of the 77 articles were copied and pasted into separate Word documents (77 Word documents for abstracts and 77 Word

documents for practical implications). The review of texts content was performed of 77 abstracts and practical implications. It is an initial phase to explore and understand the articles' different topics. After collecting and reviewing the study data, this latter was coded. The words used only for grammatical and syntactical purposes and those that do not carry content or change the meaning of the text content were removed. Hence, a list titled "Stop Words List" was generated. This list includes personal pronouns, articles, prepositions, conjunctions, interjections, frequency adverbs, modal verbs, auxiliary verbs, numbers, dates, proper names, and so on. Once the abstracts and practical implications were cleaned, they were saved as plain text and exported to the Excel file (one Excel file for abstracts and another for practical implications).

The words with capital letters were transformed into words with small letters. To avoid, while conducting the semantic network analysis and word frequency analysis, the appearance of similar words but represented in different forms, the words in plural form were replaced with a singular form. For example, "employee" and "employees" are the same word and carry the same meaning but are represented in two different forms (singular and plural). Therefore, the word "employees" became "employee". Likewise, the same verbs conjugated in different tenses were changed into one unified structure (infinitive). For example, the words communicate/ communicates/ communicated refer to the same verb but in different tenses. Thus, they were combined into "communicate".

Finally, the final data were represented in a matrix form for semantic network analysis of abstracts. This matrix consists of 151 columns and 77 rows. The data connection was prepared as follows: from 1 to 2, from 1 to 3, until from 150 to 151, to perform the semantic network analysis via Pajek software. For word frequency analysis of practical implications, the final data were transferred to the Word document to export it into NVivo software and generate the word frequency analysis.

5.6. Application and Structure of The Semantic Network Analysis

In this study, the semantic network analysis of abstracts and the findings visualization were conducted by Pajek software. Pajek (means spider in Slovenian language) is an open-source for non-commercial use software that aims to 1) facilitate the process of analyzing and visualizing large networks, 2) divide an extensive network into

numerous smaller networks, and 3) offer robust visualization tools (Batagelj, and Mrvar, 1998; Mrvar, and Batagelj, 2016; Mrvar, and Ljubljana, 2018). Pajek was developed in 1996 by Andrej Mrvar and Vladimir Batagelj. It is one of the most familiar and frequently used programs for networks analysis. It has the capacity to handle the investigation and visualization of large networks in distinct fields. Pajek comprises six data types that support examining and visualizing large networks: network, partition, vector, cluster, permutation, and hierarchy. Also, Pajek provides different options regarding network layouts. Likewise, it allows the analysis of the results attained using other statistical software, including R, SPSS, and Excel (Mrvar, and Batagelj, 2016). Pajek is a convenient program for executing semantic network analysis, which entails broad volumes of textual data (Türkel, Uzunoğlu, and Kip, 2020).

It is important to define the elements shaping the network. A network consists of nodes associated with edges (undirected) or arcs (directed). A node (also called a vertex) is an entity in the network. An edge/arc is a line that ties two nodes. It refers to the relationship that occurs between two nodes. In the semantic network, nodes are the concepts or clauses, and edges/ arcs are the relationships among these concepts or clauses. In the semantic network of this study, the vertices represent the concepts that exist in the abstracts, and the edges indicate the associations between these concepts. The network can be analyzed in a one-mode way or two-mode way. In one-mode networks, the rows and columns reflect the identical set of nodes. In two-mode networks, the rows and columns represent two diverse sets of nodes (Borgatti, and Halgin, 2005). The network is modeled graphically (Drieger, 2013; Petrick, 2014). The graph reflects the network structure. It contains a set of nodes and lines that tie these nodes. The graph can be directed or undirected depending on the importance of the line direction. A graph is directed if the line direction is not substantial, which means the existence of a line from node X to node Y does not necessitate the existence of another line from node Y to node X. In this case, the relation between the two nodes is asymmetrical. A graph is undirected if the line direction is significant, which means the presence of a line from node X to node Y requires the existence of a line from node Y to node X. Hence, the relation between the two vertices is symmetrical (Otte, and Rousseau, 2002).

This study performed the semantic network analysis in a one-mode, symmetrically,

and undirected way. The Pajek input file was symmetrized, and loops and multiple lines were removed. The density was measured to assess the overall level of connectedness of the network. Also, centrality, valued core, and articulation points measures were studied to examine the structure of the network nodes. In terms of centrality measure, the three principal forms of centrality- degree centrality, closeness centrality, and betweenness centrality- were investigated.

5.7. Application and Structure of The Word Frequency Analysis

In this study, the word frequency analysis of practical implications was conducted by NVivo software. NVivo (NUD•IST Vivo) is a computer qualitative data analysis software that (1) facilitates the organization, coding, and analysis of the different types of qualitative data and (2) contributes to reaching sophisticated results and extracting more deep and professional conclusions (Richards, 1999; Ozkan, 2004; Hilal, and Alabri, 2013). NVivo constitutes the developed and advanced version of NUD•IST (Non-numerical Unstructured Data Indexing Searching and Theorizing). It was designed by Lyn Richards and Tom Richards and introduced by QSR International (Qualitative Solutions and Research) in May 1999. NVivo is the most popular software among other qualitative data analysis software. It is a flexible software that enables users to work in a team and collaboratively on the same project from different devices and places (Ozkan, 2004; Hilal, and Alabri, 2013).

NVivo consists of two main windows: Document browser and Node browser. Their functions are almost similar; the only difference is that the original texts do not appear in the Node browser, only references to documents (Richards, 1999; Ozkan, 2004). The Document browser and Node browser of NVivo provide three fundamental functions, including (1) **Import:** importing different data formats from several sources. (2) **Organize:** supporting the data organization via coding, creating cases, and linking cases to attributes. (3) **Explore:** querying and visualizing the data using different graphs and layouts. Likewise, the Document browser and Node browser offer other functions such as (4) **Attribute:** assists in indicating some specific data features. (5) **Search:** facilitates finding documents or nodes in NVivo. (6) **Sets:** helps cluster the documents to analyze and explore their associations (Ozkan, 2004).

In this study, a new project was created in NVivo software to generate the word

frequency analysis. The Word document of practical implications was imported into the Document browser of NVivo. The Word Frequency Query window in the Explore function was selected to run the analysis. NVivo provides many options to frame the analysis, including identifying the number of words to present, the minimum length, and the grouping (exact matches; with stemmed words; with synonyms; with specializations; or with generalizations). In this study, the number of words to display was specified as a hundred, the minimum word length was adjusted to three, and the data were grouped in stems.



CHAPTER 6: FINDINGS

This chapter represents the findings obtained from the semantic network analysis and word frequency analysis of 77 abstracts and practical implications, respectively and their interpretations. In this study, using Pajek software, the nodes structure of *Abstracts Network* is analyzed based on five different measures, including degree centrality, closeness centrality, betweenness centrality, valued core, and articulation points. The 100 most prominent concepts in abstracts and practical implications are selected for analysis and interpretation.

6.1. Semantic Network Analysis Metrics of Abstracts Network

Table 1 summarizes the overall analysis of *Abstracts Network*. This analysis provides key information related to *Abstracts Network*, such as the number of vertices and lines, the density of the network, and the average degree centrality.

Table 1. All-degree centrality analysis of *Abstracts Network*

	Abstracts Network
Number of vertices	1371
Number of lines	30599
Number of lines with value =1	20361
Number of lines with value #1	10238
Density of the network	0.03258211
Average degree centrality	44.63749088

According to table 1, *Abstracts Network* has 1371 vertices that reflect the total number of associations in *Abstracts Network*. A high number of vertices points out the presence of a substantial diversity in using words. The *Abstracts Network* vertices build 30599 lines, referring to the number of relationships between these vertices. The number of lines with a value of 1 is 20361, whereas the number of lines with a value of more than 1 is 10238.

Density is an essential indicator to measure in a network. Density reveals the overall level of a network connectedness (Otte, and Rousseau, 2002). It is obtained by the number of lines in a network divided by all probable lines (Türkel, Uzunoğlu, and Kip,

2020). Density reflects if a network is dense or sparse. A dense network demonstrates the existence of high coherency in terms of relations among words. A sparse network expresses the presence of a lack of coherency in respect of relations among words (Drieger, 2013). The density of *Abstracts Network* is 0.033, far below the maximum density. Therefore, the *Abstracts Network* is sparse. Average degree centrality indicates the average number of associations per node in a network (Türkel, Uzunoğlu, and Kip, 2020). In *Abstracts Network*, the average degree centrality is 44.64. Each word in *Abstracts Network* possesses an average between 44 and 45 associations. Hence, on average, each word in *Abstracts Network* ties other words between 44 and 45 times.

6.2. Degree Centrality Analysis

After the overall analysis completion of *Abstracts Network*, it is crucial to perform an analysis at the level of its nodes. Centrality is the most used measure in studying the structure of the nodes. Centrality is a considerable measure that aims to illustrate the importance of a node in the network (Borgatti et al., 2009; Drieger, 2013). It contributes to determining the central nodes by studying and assessing the distribution of relationships within the network (Wambeke, Liu, and Hsiang, 2012). The principal forms of centrality are degree centrality, closeness centrality, and betweenness centrality.

Degree centrality is the number of direct associations a node creates with other nodes in the network (Otte, and Rousseau, 2002). Degree centrality evaluates the connectedness level of a node (Drieger, 2013). A node is central in terms of degree centrality if it has a high degree centrality value. It is indispensable to measure input degree and output degree in the directed network because the number of incoming and outgoing connections of a node are different. While in the undirected network, only all-degree centrality is measured. All-degree centrality includes the total associations that come in and out of a node (Türkel, Uzunoğlu, and Kip, 2020). In this study, the network is undirected. Therefore, all-degree centrality is measured. Table 2 illustrates the all-degree centrality values of the first 100 important words in *Abstracts Network*.

Table 2. All-degree centrality analysis of *Abstracts Network*

Rank	Vertex	Value	ID
1	22	1.0000	employee
2	31	0.8214	internal
3	67	0.7799	communication
4	5	0.7456	study
5	19	0.7061	engagement
6	11	0.6179	organization
7	80	0.5504	organizational
8	42	0.5223	examine
9	3	0.4912	purpose
10	26	0.4860	paper
11	53	0.4403	social
12	21	0.4393	research
13	47	0.4237	explore
14	25	0.4008	company
15	52	0.3936	media
16	28	0.3769	public
17	58	0.3416	investigate
18	62	0.3385	influence
19	235	0.3229	work
20	81	0.3229	use
21	88	0.3105	role
22	50	0.2939	relationship
23	56	0.2835	change
24	36	0.2825	aim
25	83	0.2783	practice
26	127	0.2731	factor
27	79	0.2700	management
28	128	0.2700	model
29	130	0.2451	business
30	71	0.2440	approach

Table 2 (cont'd)

31	186	0.2409	behavior
32	142	0.2409	positive
33	161	0.2388	relation
34	51	0.2378	provide
35	40	0.2347	focus
36	261	0.2264	achieve
37	108	0.2233	strategy
38	86	0.2212	important
39	611	0.2201	result
40	160	0.2181	job
41	102	0.2160	innovation
42	72	0.2118	test
43	180	0.2087	corporate
44	115	0.2077	perception
45	84	0.2066	effect
46	179	0.2056	effectiveness
47	290	0.2046	improve
48	82	0.2025	link
49	146	0.2025	have
50	74	0.2004	understand
51	68	0.2004	analysis
52	286	0.1952	share
53	125	0.1931	network
54	136	0.1900	satisfaction
55	282	0.1890	data
56	318	0.1869	context
57	69	0.1859	perceive
58	116	0.1838	information
59	199	0.1817	success
60	121	0.1796	finding
61	120	0.1786	platform

Table 2 (cont'd)

62	204	0.1786	engage
63	57	0.1776	identify
64	202	0.1776	resource
65	17	0.1755	enterprise
66	105	0.1734	marketing
67	2	0.1734	goal
68	162	0.1724	human
69	37	0.1724	effective
70	55	0.1713	survey
71	78	0.1713	number
72	24	0.1703	increasingly
73	147	0.1682	experience
74	49	0.1672	increase
75	89	0.1672	stakeholder
76	154	0.1672	literature
77	285	0.1672	relate
78	39	0.1661	impact
79	76	0.1661	implementation
80	265	0.1589	external
81	6	0.1578	consider
82	165	0.1547	need
83	211	0.1516	discipline
84	59	0.1506	propose
85	35	0.1485	importance
86	218	0.1464	technology
87	9	0.1443	environment
88	176	0.1433	new
89	222	0.1412	leadership
90	309	0.1412	idea
91	73	0.1412	develop
92	54	0.1381	emerge

Table 2 (cont'd)

93	70	0.1381	knowledge
94	4	0.1381	objective
95	123	0.1371	concept
96	231	0.1371	branding
97	137	0.1371	effort
98	63	0.1350	adopt
99	346	0.1340	level
100	7	0.1308	advance

Dimension: 1371

The lowest value: 0.0073

The highest value: 1.0000

Based on table 2, the highest value of all-degree centrality in *Abstracts Network* is 1, and the lowest value is 0.0073. The word “employee” has the highest all-degree centrality value (1.0000). Hence, it is considered the most central and popular word in *Abstracts Network*. It is substantial in its neighborhood in the network. The all-degree centrality value of the node ranked first "employee" is relatively higher than the values of other nodes. The words “internal”, “communication”, “study”, and “engagement” have, also important all-degree centrality values, respectively, 0.8214, 0.7799, 0.7456, and 0.7061. Therefore, in respect of all-degree centrality analysis, they are significant words in *Abstracts Network*.

6.3. Closeness Centrality Analysis

Closeness centrality signifies the sum of the distance from a specific node to all other nodes in the network (Otte, and Rousseau, 2002; Wambeke, Liu, and Hsiang, 2012). Closeness centrality is based on the path shortness and fastness between a node and all other nodes in the network. Hence, the more the path is short and fast from a node to all other nodes, the more that node is central and easily accessible. A high closeness centrality value of a node demonstrates that this node is tied with all other nodes through a slight number of routes and vis versa (Otte, and Rousseau, 2002).

Like degree centrality, if the network is directed, it is essential to study input closeness

and output closeness; if the network is undirected, it is sufficient to assess all-closeness centrality. In this study, the network is undirected. Therefore, all-closeness centrality is measured. Table 3 shows the all-closeness centrality values of the first 100 important words in *Abstracts Network*.

Table 3. All-closeness centrality analysis of *Abstracts Network*

Rank	Vertex	Value	ID
1	22	1.0000	employee
2	31	0.9117	internal
3	67	0.8934	communication
4	5	0.8788	study
5	19	0.8626	engagement
6	11	0.8284	organization
7	80	0.8041	organizational
8	42	0.7944	examine
9	3	0.7839	purpose
10	26	0.7821	paper
11	53	0.7673	social
12	21	0.7669	research
13	47	0.7620	explore
14	25	0.7549	company
15	52	0.7526	media
16	28	0.7476	public
17	58	0.7370	investigate
18	62	0.7361	influence
19	235	0.7316	work
20	81	0.7316	use
21	88	0.7280	role
22	50	0.7232	relationship
23	56	0.7203	change
24	36	0.7200	aim
25	83	0.7189	practice
26	127	0.7174	factor

Table 3 (cont'd)

27	79	0.7165	management
28	128	0.7165	model
29	130	0.7097	business
30	71	0.7094	approach
31	186	0.7085	behavior
32	142	0.7085	positive
33	161	0.7080	relation
34	51	0.7077	provide
35	40	0.7068	focus
36	261	0.7046	achieve
37	108	0.7038	strategy
38	86	0.7032	important
39	611	0.7029	result
40	160	0.7024	job
41	102	0.7018	innovation
42	72	0.7007	test
43	180	0.6999	corporate
44	84	0.6993	effect
45	179	0.6991	effectiveness
46	290	0.6988	improve
47	82	0.6982	link
48	146	0.6982	have
49	74	0.6977	understand
50	68	0.6977	analysis
51	115	0.6974	perception
52	286	0.6963	share
53	125	0.6958	network
54	136	0.6950	satisfaction
55	318	0.6941	context
56	69	0.6939	perceive
57	116	0.6933	information

Table 3 (cont'd)

58	199	0.6928	success
59	282	0.6925	data
60	121	0.6922	finding
61	120	0.6920	platform
62	204	0.6920	engage
63	57	0.6917	identify
64	202	0.6917	resource
65	17	0.6912	enterprise
66	105	0.6906	marketing
67	2	0.6906	goal
68	162	0.6904	human
69	55	0.6901	survey
70	78	0.6901	number
71	24	0.6898	increasingly
72	147	0.6893	experience
73	49	0.6890	increase
74	89	0.6890	stakeholder
75	154	0.6890	literature
76	285	0.6890	relate
77	39	0.6888	impact
78	76	0.6888	implementation
79	265	0.6869	external
80	6	0.6866	consider
81	165	0.6858	need
82	37	0.6856	effective
83	211	0.6850	discipline
84	59	0.6848	propose
85	35	0.6843	importance
86	218	0.6837	technology
87	176	0.6829	new
88	222	0.6824	leadership

Table 3 (cont'd)

89	309	0.6824	idea
90	73	0.6824	develop
91	70	0.6816	knowledge
92	4	0.6816	objective
93	123	0.6814	concept
94	231	0.6814	branding
95	137	0.6814	effort
96	9	0.6811	environment
97	63	0.6808	adopt
98	346	0.6806	level
99	7	0.6798	advance
100	114	0.6798	theory

Dimension: 1371

The lowest value: 0.4964

The highest value: 1.0000

As reported in table 3, the highest value of all-closeness centrality in *Abstracts Network* is 1, and the lowest value is 0.4964. The all-closeness centrality values of the top 100 words in *Abstracts Network* are close to each other. Similar to the analysis of all-degree centrality, the word “employee” has the highest all-closeness centrality value (1). Hence, it is the most accessible and central word in *Abstracts Network*. The words “internal”, “communication”, “study”, and “engagement” have, also important values in terms of all-closeness centrality. Therefore, they are considered reachable and central words in *Abstracts Network* regarding all-closeness centrality analysis. The word “theory” appears only in the closeness centrality measure. Consequently, although the word “theory” is not significant and popular in respect of degree centrality measure and has a low all-closeness centrality value, it remains an easily reachable word in *Abstracts Network*.

6.4. Betweenness Centrality Analysis

Betweenness centrality is

“the number of shortest paths passing through a given node” (Otte, and Rousseau, 2002, p. 443).

It studies the ability of a node to play the mediator role between pairs of other nodes (Wambeke, Liu, and Hsiang, 2012). A node with a high betweenness centrality value means that this node connects pairs of other nodes. Hence, it enables the circulation of information within the network (Otte, and Rousseau, 2002). Table 4 displays the betweenness centrality values of the first 100 important words in *Abstracts Network*.

Table 4. Betweenness centrality analysis of *Abstracts Network*

Rank	Vertex	Value	ID
1	22	1.0000	employee
2	31	0.4937	internal
3	67	0.4263	communication
4	5	0.4091	study
5	19	0.3843	engagement
6	11	0.2690	organization
7	80	0.1998	organizational
8	42	0.1528	examine
9	26	0.1419	paper
10	21	0.1261	research
11	3	0.1226	purpose
12	47	0.1155	explore
13	53	0.1047	social
14	25	0.0992	company
15	52	0.0988	media
16	28	0.0954	public
17	62	0.0710	influence
18	56	0.0695	change
19	58	0.0610	investigate
20	235	0.0538	work
21	88	0.0501	role
22	83	0.0456	practice

Table 4 (cont'd)

23	81	0.0408	use
24	125	0.0380	network
25	71	0.0359	approach
26	128	0.0357	model
27	142	0.0349	positive
28	130	0.0334	business
29	186	0.0300	behavior
30	50	0.0298	relationship
31	86	0.0276	important
32	102	0.0272	innovation
33	160	0.0262	job
34	36	0.0256	aim
35	161	0.0249	relation
36	127	0.0237	factor
37	72	0.0234	test
38	79	0.0225	management
39	2	0.0218	goal
40	108	0.0197	strategy
41	261	0.0196	achieve
42	146	0.0190	have
43	24	0.0181	increasingly
44	76	0.0177	implementation
45	69	0.0177	perceive
46	282	0.0174	data
47	154	0.0165	literature
48	204	0.0163	engage
49	51	0.0162	provide
50	115	0.0158	perception
51	290	0.0156	improve
52	89	0.0152	stakeholder
53	78	0.0150	number

Table 4 (cont'd)

54	68	0.0147	analysis
55	40	0.0145	focus
56	179	0.0143	effectiveness
57	17	0.0139	enterprise
58	180	0.0139	corporate
59	318	0.0135	context
60	309	0.0134	idea
61	211	0.0125	discipline
62	265	0.0125	external
63	147	0.0118	experience
64	84	0.0116	effect
65	136	0.0116	satisfaction
66	37	0.0115	effective
67	325	0.0114	workplace
68	218	0.0114	technology
69	286	0.0113	share
70	57	0.0111	identify
71	82	0.0109	link
72	96	0.0104	service
73	74	0.0100	understand
74	119	0.0099	mediation
75	116	0.0098	information
76	120	0.0095	platform
77	16	0.0095	draw
78	110	0.0094	trend
79	333	0.0094	support
80	304	0.0091	productivity
81	158	0.0091	condition
82	165	0.0090	need
83	199	0.0089	success
84	54	0.0088	emerge

Table 4 (cont'd)

85	254	0.0088	emotional
86	105	0.0088	marketing
87	29	0.0082	personal
88	39	0.0079	impact
89	202	0.0077	resource
90	49	0.0076	increase
91	162	0.0073	human
92	6	0.0071	consider
93	123	0.0071	concept
94	103	0.0070	hypothesis
95	293	0.0069	initiate
96	121	0.0068	finding
97	246	0.0067	broad
98	27	0.0067	potential
99	611	0.0066	result
100	331	0.0066	generation

Dimension: 1371

The lowest value: 0.0000

The highest value: 1.0000

In accordance with table 4, the highest value of betweenness centrality in *Abstracts Network* is 1, and the lowest value is 0. The betweenness centrality value of the first ranked node is far higher than all other nodes values. Similar to the two previous analyses (all-degree centrality and all-closeness centrality), the word “employee” has the highest betweenness centrality value (1). Therefore, it is the word that connects a considerable number of pairs of other words. It plays a fundamental role as a mediator and connector of two other words in *Abstracts Network*. Likewise, the words “internal”, “communication”, “study”, “engagement”, and “organization” have important betweenness centrality values compared with the values of other words. Hence, they considerably link pairs of other words. Betweenness centrality is the first measure that mentions the words “workplace”, “service”, “mediation”, “draw”, “trend”, “support”, “productivity”, “condition”, “emotional”, “personal”,

“hypothesis”, “initiate”, “broad”, “potential”, and “generation”. Consequently, although these words are not popular and accessible in *Abstracts Network*, they play a role in connecting pairs of other words.

6.5. Valued Core Analysis

The valued core partition examines the parts associated with a certain number of lines. It aims to investigate and determine the network's densest parts (Batagelj, and Mrvar, 2002). Table 5 illustrates the lowest and highest values of valued core in *Abstracts Network*.

Table 5. All max valued core values in *Abstracts Network*

	Abstracts Network
Dimension	1371
The lowest value	1
The highest value	201

According to table 5, the lowest value of the valued core in *Abstracts Network* is 1, and the highest value is 201, which indicates that the words in *Abstracts Network* are linked to each other at least with 1 line and at most with 201 lines. Table 6 shows the frequency distribution of the valued core values in *Abstracts Network*. Table 7 displays the ten words with the highest valued core values in *Abstracts Network*.

Table 6. Frequency distribution of the valued core values in *Abstracts Network*

Cluster	Freq	Freq%	Cumfreq	Cumfreq	Representative
1	431	31.4369	431	31.4369	integrative
2	334	24.3618	765	55.7987	long-term
3	96	7.0022	861	62.8009	bringing
4	76	5.5434	937	68.3443	consideration
5	66	4.8140	1003	73.1583	academic
6	55	4.0117	1058	77.1699	historical
7	56	4.0846	1114	81.2546	give
8	40	2.9176	1154	84.1721	first
9	29	2.1152	1183	86.2874	goal

Table 6 (cont'd)

10	12	0.8753	1195	87.1627	analyze
11	20	1.4588	1215	88.6214	theoretical
12	21	1.5317	1236	90.1532	objective
13	12	0.8753	1248	91.0284	increasingly
14	17	1.2400	1265	92.2684	e-newsletter
15	10	0.7294	1275	92.9978	consider
16	6	0.4376	1281	93.4354	effective
17	5	0.3647	1286	93.8001	increase
18	6	0.4376	1292	94.2378	focus
19	3	0.2188	1295	94.4566	importance
20	4	0.2918	1299	94.7484	impact
21	3	0.2188	1302	94.9672	enterprise
22	4	0.2918	1306	95.2589	provide
23	4	0.2918	1310	95.5507	adoption
24	3	0.2188	1313	95.7695	program
25	6	0.4376	1319	96.2071	environmental
26	4	0.2918	1323	96.4989	important
27	4	0.2918	1327	96.7907	practice
28	4	0.2918	1331	97.0824	stakeholder
29	3	0.2188	1334	97.3012	aim
30	2	0.1459	1336	97.4471	understand
31	1	0.0729	1337	97.5201	improve
32	2	0.1459	1339	97.6659	survey
33	1	0.0729	1340	97.7389	satisfaction
34	2	0.1459	1342	97.8848	investigate
35	3	0.2188	1345	98.1036	change
36	2	0.1459	1347	98.2495	perceive
38	1	0.0729	1348	98.3224	use
40	2	0.1459	1350	98.4683	influence
42	1	0.0729	1351	98.5412	job
46	2	0.1459	1353	98.6871	explore

Table 6 (cont'd)

47	1	0.0729	1354	98.7600	effect
49	1	0.0729	1355	98.8330	public
50	1	0.0729	1356	98.9059	perception
53	1	0.0729	1357	98.9788	paper
54	1	0.0729	1358	99.0518	research
60	1	0.0729	1359	99.1247	company
64	1	0.0729	1360	99.1977	purpose
78	1	0.0729	1361	99.2706	relationship
87	1	0.0729	1362	99.3435	media
98	1	0.0729	1363	99.4165	examine
107	1	0.0729	1364	99.4894	social
112	1	0.0729	1365	99.5624	organizational
125	1	0.0729	1366	99.6353	organization
171	1	0.0729	1367	99.7082	study
197	2	0.1459	1369	99.8541	engagement
201	2	0.1459	1371	100.0000	internal
Sum	1371	100.0000			

Table 7. 10 words with the highest valued core values in *Abstracts Network*

	Frequency
internal	201
engagement	197
study	171
organization	125
organizational	112
social	107
examine	98
media	87
relationship	78
purpose	64

Based on table 6, 431 of 1371 words in *Abstracts Network* are tied with value 1, which means they are connected with other words only once. Therefore, in terms of semantic network analysis, these words do not constitute remarkable words in *Abstracts Network* because they build the weakest relations in the network. According to the last ten lines of table 6, 1 of 1371 words is bound with value 64; 1 of them is linked with value 78, 1 of them is associated with value 87; 1 of them is tied with value 98; 1 of them is connected with value 107; 1 of them is associated 112 times; 1 of them is tied 125 times; 1 of them is linked 171 times; 2 of them are associated 197 times, and 2 of them are tied 201 times.

As reported in tables 6 and 7, the words “internal” and “engagement” are tied with other words 201 and 197 times, respectively. Hence, they are the most eminent words in *Abstracts Network* because they are the most words that establish relations with other words in *Abstracts Network*. Moreover, the words “study”, “organization”, “organizational”, “social”, “examine”, “media”, “relationship”, and “purpose” are salient words in *Abstracts Network*. They form a significant number of associations with other words in *Abstracts Network*.

The valued core is the first measure that identifies the words “integrative”, “long-term”, “bringing”, “consideration”, “academic”, “historical”, “give”, “first”, “analyze”, “theoretical”, “e-newsletter”, “adoption”, “program”, and “environmental”. These words do not represent important words in the previous measures (all-degree centrality, all-closeness centrality, and betweenness centrality). However, they are noteworthy words in respect of the valued core measure. The thing that means although these words are not central and reachable, and they do not link pairs of other nodes; however, they create a decent number of relations with other nodes in the *Abstracts Network*.

Figure 1 illustrates the graphic representation of the words tied more than 15 times in *Abstracts Network*.

6.6. Articulation Points Analysis

Articulation points or cut-points are the nodes that generate the separation of the graph into two or more independent subgraphs or otherwise increase of the number of linked components when they are removed (Leydesdorff, 2004; Ausiello, Firmani, and Laura, 2012). Articulation points are located between two biconnected components (Leydesdorff, 2007). They play a critical role in ensuring the connectivity of the graph. In terms of articulation points analysis, *Abstracts Network* has no articulation points.

6.7. Total Findings of Five Measures

The nodes structure of *Abstracts Network* is analyzed based on five different measures, including degree centrality, closeness centrality, betweenness centrality, valued core, and articulation points. Table 8 summarizes the number of repeats of each word in these measures. *Abstracts Network* has no articulation points. Therefore, table 8 does not encompass this measure. The table analysis and interpretation consider only four measures (degree centrality, closeness centrality, betweenness centrality, and valued core). Table 8 includes the entire results obtained from the tables of the four measures studied. Some words are mentioned in all four measures, while others are identified only in some measures. Hence, the more a word appears in all measures, the more it is considered a notable word in *Abstracts Network*.

Table 8. Words with their number of repeats in measures

Words	Number of Repeats	Measures
internal	4	degree, closeness, betweenness, valued core
study	4	degree, closeness, betweenness, valued core
engagement	4	degree, closeness, betweenness, valued core
organization	4	degree, closeness, betweenness, valued core
organizational	4	degree, closeness, betweenness, valued core
examine	4	degree, closeness, betweenness, valued core
purpose	4	degree, closeness, betweenness, valued core
paper	4	degree, closeness, betweenness, valued core
social	4	degree, closeness, betweenness, valued core

Table 8 (cont'd)

research	4	Degree, Closeness, Betweenness, Valued core
explore	4	Degree, Closeness, Betweenness, Valued core
company	4	Degree, Closeness, Betweenness, Valued core
media	4	Degree, Closeness, Betweenness, Valued core
public	4	Degree, Closeness, Betweenness, Valued core
investigate	4	Degree, Closeness, Betweenness, Valued core
influence	4	Degree, Closeness, Betweenness, Valued core
use	4	Degree, Closeness, Betweenness, Valued core
relationship	4	Degree, Closeness, Betweenness, Valued core
change	4	Degree, Closeness, Betweenness, Valued core
aim	4	Degree, Closeness, Betweenness, Valued core
practice	4	Degree, Closeness, Betweenness, Valued core
provide	4	Degree, Closeness, Betweenness, Valued core
focus	4	Degree, Closeness, Betweenness, Valued core
important	4	Degree, Closeness, Betweenness, Valued core
job	4	Degree, Closeness, Betweenness, Valued core
perception	4	Degree, Closeness, Betweenness, Valued core
effect	4	Degree, Closeness, Betweenness, Valued core
improve	4	Degree, Closeness, Betweenness, Valued core
understand	4	Degree, Closeness, Betweenness, Valued core
satisfaction	4	Degree, Closeness, Betweenness, Valued core
perceive	4	Degree, Closeness, Betweenness, Valued core
enterprise	4	Degree, Closeness, Betweenness, Valued core
goal	4	Degree, Closeness, Betweenness, Valued core
effective	4	Degree, Closeness, Betweenness, Valued core
increasingly	4	Degree, Closeness, Betweenness, Valued core
increase	4	Degree, Closeness, Betweenness, Valued core
stakeholder	4	Degree, Closeness, Betweenness, Valued core
impact	4	Degree, Closeness, Betweenness, Valued core
consider	4	Degree, Closeness, Betweenness, Valued core
employee	3	Degree, Closeness, Betweenness

Table 8 (cont'd)

communication	3	degree, closeness, betweenness
work	3	degree, closeness, betweenness
role	3	degree, closeness, betweenness
factor	3	degree, closeness, betweenness
management	3	degree, closeness, betweenness
model	3	degree, closeness, betweenness
business	3	degree, closeness, betweenness
approach	3	degree, closeness, betweenness
behavior	3	degree, closeness, betweenness
positive	3	degree, closeness, betweenness
relation	3	degree, closeness, betweenness
achieve	3	degree, closeness, betweenness
strategy	3	degree, closeness, betweenness
result	3	degree, closeness, betweenness
innovation	3	degree, closeness, betweenness
test	3	degree, closeness, betweenness
corporate	3	degree, closeness, betweenness
effectiveness	3	degree, closeness, betweenness
link	3	degree, closeness, betweenness
have	3	degree, closeness, betweenness
analysis	3	degree, closeness, betweenness
share	3	degree, closeness, betweenness
network	3	degree, closeness, betweenness
data	3	degree, closeness, betweenness
context	3	degree, closeness, betweenness
information	3	degree, closeness, betweenness
success	3	degree, closeness, betweenness
finding	3	degree, closeness, betweenness
platform	3	degree, closeness, betweenness
engage	3	degree, closeness, betweenness
identify	3	degree, closeness, betweenness

Table 8 (cont'd)

resource	3	degree, closeness, betweenness
marketing	3	degree, closeness, betweenness
human	3	degree, closeness, betweenness
survey	3	degree, closeness, valued core
number	3	degree, closeness, betweenness
experience	3	degree, closeness, betweenness
literature	3	degree, closeness, betweenness
implementation	3	degree, closeness, betweenness
external	3	degree, closeness, betweenness
need	3	degree, closeness, betweenness
discipline	3	degree, closeness, betweenness
importance	3	degree, closeness, valued core
technology	3	degree, closeness, betweenness
idea	3	degree, closeness, betweenness
objective	3	degree, closeness, valued core
concept	3	degree, closeness, betweenness
relate	2	degree, closeness
propose	2	degree, closeness
environment	2	degree, closeness
new	2	degree, closeness
leadership	2	degree, closeness
develop	2	degree, closeness
emerge	2	degree, betweenness
knowledge	2	degree, closeness
branding	2	degree, closeness
effort	2	degree, closeness
adopt	2	degree, closeness
level	2	degree, closeness
advance	2	degree, closeness
theory	1	closeness
workplace	1	betweenness

Table 8 (cont'd)

service	1	betweenness
mediation	1	betweenness
draw	1	betweenness
trend	1	betweenness
support	1	betweenness
productivity	1	betweenness
condition	1	betweenness
emotional	1	betweenness
personal	1	betweenness
hypothesis	1	betweenness
initiate	1	betweenness
broad	1	betweenness
potential	1	betweenness
generation	1	betweenness
integrative	1	valued core
long-term	1	valued core
bringing	1	valued core
consideration	1	valued core
academic	1	valued core
historical	1	valued core
give	1	valued core
first	1	valued core
analyze	1	valued core
theoretical	1	valued core
e-newsletter	1	valued core
adoption	1	valued core
program	1	valued core
environmental	1	valued core

In accordance with table 8, the words “internal”, “study”, “engagement”, “organization”, “organizational”, “examine”, “purpose”, “paper”, “social”, “research”, “explore”, “company”, “media”, “public”, “investigate”, “influence”, “use”,

“relationship”, “change”, “aim”, “practice”, “provide”, “focus”, “important”, “job”, “perception”, “effect”, “improve”, “understand”, “satisfaction”, “perceive”, “enterprise”, “goal”, “effective”, “increasingly”, “increase”, “stakeholder”, “impact”, and “consider” are reiterated in all four measures studied including, degree centrality, closeness centrality, betweenness centrality, and valued core. Therefore, they are the most central and eminent words in *Abstracts Network*. These words characterize *Abstracts Network*.

The words “employee”, “communication”, “work”, “role”, “factor”, “management”, “model”, “business”, “approach”, “behavior”, “positive”, “relation”, “achieve”, “strategy”, “result”, “innovation”, “test”, “corporate”, “effectiveness”, “link”, “have”, “analysis”, “share”, “network”, “data”, “context”, “information”, “success”, “finding”, “platform”, “engage”, “identify”, “resource”, “marketing”, “human”, “survey”, “number”, “experience”, “literature”, “implementation”, “external”, “need”, “discipline”, “importance”, “technology”, “idea”, “objective”, and “concept” are repeated in three different measures. These words are also salient in *Abstracts Network*.

The words “relate”, “propose”, “environment”, “new”, “leadership”, “develop”, “knowledge”, “branding”, “effort”, “adopt”, “level”, and “advance” take place in two measures: degree centrality and closeness centrality. Except for the word “emerge”, which manifests in degree centrality and betweenness centrality measures.

The word “theory” appears only in closeness centrality measure. The words “workplace”, “service”, “mediation”, “draw”, “trend”, “support”, “productivity”, “condition”, “emotional”, “personal”, “hypothesis”, “initiate”, “broad”, “potential”, and “generation” occur in one measure which is betweenness centrality measure. The words “integrative”, “long-term”, “bringing”, “consideration”, “academic”, “historical”, “give”, “first”, “analyze”, “theoretical”, “e-newsletter”, “adoption”, “program”, and “environmental” manifest merely in valued core measure.

6.8. Word Frequency Analysis of Practical Implications

NVivo software counted the number of times each word appears in practical implications. Hence, a list of the 100 most frequent words was generated. This list includes words, length, number of frequencies, and percentage of frequency. The

words are ordered in a descending way based on the total number of times of their occurrence. The minimum word length was determined to be 3. Therefore, the list encompasses the words that contain three or more characters. Table 9 shows the list of the 100 most frequent words in practical implications.

Table 9. The list of the 100 most frequent words in practical implications

Word	Length	Count	Weighted (%)	Similar Words
employee	8	470	4,33	employee
communication	13	413	3,81	communicate, communication, communicative, communicator, communal, community
organization	12	224	2,07	organization, organize
internal	8	209	1,93	internal, internalize, internally, international, internationally
management	10	176	1,62	manage, management, manager
engagement	10	144	1,33	engage, engagement
organizational	14	101	0,93	organizational
information	11	98	0,90	inform, informal, informally, information, informative
social	6	95	0,88	social
media	5	83	0,77	media
relation	8	80	0,74	relate, relation, relational, relative, relatively
study	5	80	0,74	study
use	3	79	0,73	use, useful
examine	7	78	0,72	examine
work	4	70	0,65	work
leader	6	67	0,62	leader

Table 9 (cont'd)

company	7	66	0,61	company
relationship	12	64	0,59	relationship
finding	7	63	0,58	find, finding
effect	6	61	0,56	effect, effective, effectively, effectiveness
important	9	57	0,53	importance, important, importantly
provide	7	57	0,53	provide, provider, provides
practice	8	55	0,51	practical, practice
support	7	51	0,47	support, supportive
practitioner	12	49	0,45	practitioner
level	5	48	0,44	level
change	6	47	0,43	change
strategy	8	47	0,43	strategy
develop	7	47	0,43	develop, developer, development
result	6	46	0,42	result
create	6	45	0,41	create
positive	8	45	0,41	position, positive, positively
process	7	45	0,41	process
way	3	45	0,41	way
public	6	44	0,41	public, publicity
job	3	43	0,40	job
implementation	14	43	0,40	implement, implementation, implementer
program	7	42	0,39	program
branding	8	40	0,37	brand, branding
culture	7	40	0,37	cultural, culture
value	5	40	0,37	value

Table 9 (cont'd)

increase	8	39	0,36	increase, increasingly
share	5	39	0,36	share
activity	8	38	0,35	activate, active, actively, activeness, activity
esm	3	38	0,35	esm
suggest	7	38	0,35	suggest, suggestion
business	8	37	0,34	business
research	8	37	0,34	research
strategic	9	36	0,33	strategic, strategically
role	4	35	0,32	role
effort	6	34	0,31	effort
make	4	34	0,31	make,
enhance	7	33	0,30	enhance, enhancement
professional	12	33	0,30	professional
encourage	9	32	0,30	encourage, encouragement
paper	5	31	0,29	paper
feel	4	31	0,29	feel, feeling
performance	11	31	0,29	perform, performance
implication	11	30	0,28	implication
platform	8	30	0,28	platform
time	4	30	0,28	time, timely, timing
trust	5	30	0,28	trust
commitment	10	29	0,27	commit, commitment
corporate	9	29	0,27	corporate, corporation
involve	7	29	0,27	involve, involvement
participation	13	29	0,27	participant, participate, participation, participative
personal	8	29	0,27	person, personal, personality, personalize, personally
understand	10	29	0,27	understand

Table 9 (cont'd)

approach	8	28	0,26	approach, approche
consider	8	28	0,26	consider
help	4	28	0,26	help, helpful
innovation	10	28	0,26	innovate, innovation, innovative, innovativeness
new	3	28	0,26	new, newness
resource	8	28	0,26	resource, resourceful
system	6	28	0,26	system
become	6	27	0,25	become
identify	8	27	0,25	identifiers, identify
improve	7	27	0,25	improve, improvement
measure	7	27	0,25	measurable, measure, measurement
show	4	27	0,25	show
voice	5	27	0,25	voice
environment	11	26	0,24	environment
leadership	9	26	0,24	leadership
team	4	26	0,24	team
knowledge	9	25	0,23	knowledge
success	7	25	0,23	success, successful, successfully
transparent	11	25	0,23	transparency, transparent
build	5	24	0,22	build
individual	10	24	0,22	individual, individualize
satisfaction	12	24	0,22	satisfaction
contribute	10	23	0,21	contribute, contribution
different	9	23	0,21	differ, difference, different
emotional	9	23	0,21	emotion, emotional, emotionally
influence	9	23	0,21	influence
message	7	23	0,21	message, messaging

Table 9 (cont'd)

train	5	23	0,21	train
benefit	7	22	0,20	benefit
core	4	22	0,20	core
focus	5	22	0,20	focus
foster	6	22	0,20	foster

According to table 9, the words “employee” and “communication” have the highest frequency values. The word “employee” appears 470 times, representing 4.33% of the total number of words used in practical implications, followed by the word “communication”, repeated 413 times. These two words occur most in practical implications. Hence, they constitute the most frequent and eminent words in practical implications.

The words “organization” (f = 224; 2,07%), “internal” (f = 209; 1,93%), “management” (f = 176; 1,62%), “engagement” (f = 144; 1,33%), “organizational” (f = 101; 0,93%), “information” (f = 98; 0,90%), “social” (f = 95; 0,88%), “media” (f = 83; 0,77%), and “relation” (f = 80; 0,74%) have, also, important frequency values. They are widely used in practical implications. Therefore, in respect of word frequency analysis, they represent salient words in the practical implications.

6.9. Comparison Between Semantic Network Analysis and Word Frequency Analysis

Semantic network analysis of abstracts and word frequency analysis of practical implications are compared to explore their similarities and differences. The two analyses yield some common and different results regarding the words representing great importance in abstracts and practical implications. Table 10 displays the common words in semantic network analysis and word frequency analysis. Table 11 illustrates the words unique to word frequency analysis.

Table 10. Common words in semantic network analysis and word frequency analysis

employee	communication	organization	internal	management
engagement	organizational	information	social	media

Table 10 (cont'd)

relation	study	use	examine	work
company	relationship	finding	effect	important
provide	practice	support	level	change
strategy	develop	result	positive	public
job	implementation	program	branding	increase
share	business	research	role	effort
paper	platform	corporate	personal	understand
approach	consider	innovation	new	resource
identify	improve	environment	leadership	knowledge
success	satisfaction	emotional	influence	focus

Based on table 10, these words constitute the common words between the semantic network analysis of abstracts and word frequency analysis of practical implications. Hence, they are the most prominent words in previous academic studies dealing with internal communication, internal social media, and employee engagement.

Table 11. Words unique to word frequency analysis

leader	practitioner	create	process	way
culture	value	activity	esm	suggest
make	enhance	professional	encourage	feel
performance	implication	time	trust	commitment
involve	participation	help	system	become
measurement	show	voice	team	transparent
build	individual	contribute	different	message
train	benefit	core	foster	

CHAPTER 7: DISCUSSION

This study aims to examine the impact of internal communication through using internal social media on employee engagement by disclosing the most prominent concepts covered by the previous academic studies dealing with internal communication, internal social media, and employee engagement and assessing the relationship among these concepts. The methods used to analyze the study data are semantic network analysis and word frequency analysis. The findings obtained from the analyses enabled the author to build meaningful insights and attain the study's purpose. This chapter discusses the study findings in accordance with the literature review to extract conclusions that answer the research question. The words to discuss must respond to two criteria: **1)** Appearing in the semantic network analysis findings and word frequency analysis findings. **2)** Appearing in four or three measures of semantic network analysis.

Table 10 summarizes the common words between the semantic network analysis of abstracts and word frequency analysis of practical implications. According to table 10, there are sixty common words between the two analyses. However, the words that take place in four or three dimensions of semantic network analysis are the following: “employee”, “communication”, “organization”, “internal”, “management”, “organizational”, “information”, “social”, “media”, “relation”, “study”, “use”, “examine”, “work”, “company”, “relationship”, “finding”, “effect”, “important”, “provide”, “practice”, “change”, “strategy”, “result”, “positive”, “public”, “job”, “implementation”, “increase”, “share”, “business”, “research”, “role”, “paper”, “platform”, “corporate”, “understand”, “approach”, “consider”, “innovation”, “resource”, “identify”, “improve”, “success”, “satisfaction”, “influence”, “focus”. Based on their values in the semantic network analysis measures and word frequency analysis, these words constitute the most remarkable concepts addressed by the existing studies dealing with internal communication, internal social media, and employee engagement.

The words “internal”, “communication”, “social”, “media”, “employee”, and “engagement” have high values in the dimensions studied in the framework of semantic network analysis, including degree centrality, closeness centrality, betweenness centrality, and valued core. Also, in terms of word frequency analysis,

these words have an interesting number of repetitions: they are repeated 470, 413, 209, 144, 95, and 83 times, respectively. It is not surprising that these words are the most noteworthy concepts in both analyses since they are the study keywords. Currently, most organizations are orienting toward the Enterprise 2.0 concept, which is the social media implementation in the workplace for reaching communication, collaboration, and other organizational goals (Robertson, and Kee, 2017). Thanks to its rich features and multiple benefits, many organizations have embraced internal social media as a novel internal communication channel in the internal communication process (Men, O'Neil, and Ewing, 2020a). Internal social media helps easily, fast, and constantly connect to the organization's members. This innovative channel and its attributes cover some of the deficits and limitations of the existing internal communication channels (King, and Lee, 2016). Ewing, Men, and O'Neil (2019) claimed that in the future, internal communication practitioners will rely more on internal social media as an internal communication channel for four reasons: **(1)** Internal social media is more conversational, interactive, dialogical, and humanized. **(2)** Internal social media makes the employees content collaborators and social ambassadors. **(3)** Internal social media is a multimedia and mobilization channel. **(4)** Internal social media is behavior-driven.

Furthermore, several studies affirmed that internal social media as an internal communication channel reinforces employee engagement (Friedl, and Verčič, 2011; Leonardi, Huysman, and Steinfield, 2013; Men, 2014; 2015; King, and Lee, 2016; Sievert, and Scholz, 2017; Ewing, Men, and O'Neil, 2019; Men, O'Neil, and Ewing, 2020a). Sharma, and Bhatnagar (2016) declared that internal social media is a strategic communication channel for enhancing employee engagement as it offers various experiences that involve, empower, motivate, and engage the employees, including **(1)** connecting and interacting with colleagues from diverse teams and departments not only within the organization but across the globe, **(2)** building new relationships and developing the social networks, **(3)** sharing easily and quickly innovative ideas and solutions for existing and potential job and non-job-related problems on one common platform, **(4)** providing meaningful feedback, **(5)** reducing boundaries in communication between top management and employees at all levels, and **(6)** facilitating the socialization process for new employees. Men, O'Neil, and Ewing (2020a) cited that internal social media usage as an internal communication channel

creates high levels of perceived transparency regarding the organization and its identification. Therefore, it leads to employee engagement.

According to semantic network analysis and word frequency analysis, the words “study”, “use”, “examine”, “findings”, “effect”, “important”, “provide”, “practice”, “result”, “positive”, “implementation”, “increase”, “share”, “research”, “role”, “understand”, “approach”, “consider”, “resource”, “identify”, “improve”, “influence”, and “focus” are indispensable concepts. It is acceptable that these words have important values in the different semantic network analysis measures and word frequency analysis. The study sample is articles, and these words represent a part of the frequently used language in scientific research papers. Despite the importance of their values, these words do not constitute valuable concepts to concentrate on in the discussion.

Likewise, based on the findings of semantic network analysis and word frequency analysis, the words “organization”, “organizational”, “company”, “business”, “corporate”, “management”, “public”, “relation”, “work”, “job”, “strategy”, and “platform” are considerable concepts. These words form a part of the business language. Hence, it is axiomatic and expected that they have high values in both analyses since the present study covers concepts that belong to the management, communication, and public relations fields. The words “information”, “relationship”, “satisfaction”, “innovation”, “change”, and “success” constitute the most eminent concepts revealed from the study findings. Therefore, it must shed light on these concepts and detailly discuss them.

The word “information” occurs in three dimensions of semantic network analysis, including degree centrality, closeness centrality, and betweenness centrality, and it is reiterated 98 times in word frequency analysis. The action of communication is based essentially on the exchange of information. Internal communication is the interaction between managers and employees within the organization (Mishra, Boynton, and Mishra, 2014). It is the action of information interchange among the organization members to build a unified understanding (Verčič, Verčič, and Sriramesh, 2012). As mentioned in the literature review, the first primary role of internal communication is information dissemination. King, and Lee (2016) noted that the main role of internal communication is delivering to employees the key information related to their job and

responsibilities. Mishra, Boynton, and Mishra (2014) argued that internal communication mainly intends to offer employees information about the organization's values, vision, missions, goals, and strategies. Internal communication must satisfy the employee's needs related to information (Kulachai et al., 2018). Carriere, and Bourque (2009) stated that to create successful internal communication strategies and practices that respond to the employee information needs and engender employee communication satisfaction, managers must comprehend and determine the type, quantity, and quality of information that employee wants to obtain. High-quality information characterizes by accuracy, relevancy, and usefulness (Lee, 2016).

There are diverse internal communication channels to share information among the organization members, including oral, written, and electronic channels. These channels differ in terms of media richness, formality, and sociability (Gillis, 2006; King, and Lee, 2016). Employees may prefer different internal communication channels for different information sorts or depending on their job and responsibilities (Welch, and Jackson, 2007; Mishra, Boynton, and Mishra, 2014). Lee (2016) claimed that four main factors influence the employee adoption and use of a specific channel, including **(1) information quality, (2) ease of access, (3) network externalities, and (4) dyadic interactions**. Managers need to be aware of the employee preferred internal communication channels for different types of information (Mishra, Boynton, and Mishra, 2014; Verčič, and Špoljarić, 2020) and understand which internal communication channels are greatest suited for the information (Ishii, Lyons, and Carr, 2019). Selecting the right channel for specific information is a critical action for communication managers (Liu, Liao, and Pratt, 2009). Lengel, and Daft (1984) declared that media selection relies on media richness. The richness of a medium is grounded on the availability of **(1) instant and direct feedback, (2) various signals, (3) language diversity, and (4) personal focus** (Ishii, Lyons, and Carr, 2019).

Internal social media represents the contemporary internal communication channel that organizations rely on to communicate and share information among their members. Internal social media is the social media used within the organization to achieve internal communication purposes (Haddud, Dugger, and Gill, 2016). It features by the speed and ease of disseminating information (Hewitt, 2006; Lee, 2013; Young, and Hinesly, 2014; Sievert, and Scholz, 2017). Haddud, Dugger, and Gill (2016) cited that internal social media platforms and applications aid employees in

efficiently communicating and sharing personal and professional information with their co-workers. Several organizations have integrated internal social media as an important tactic of the internal communication strategy to disseminate information, encourage collaboration, and accomplish other long-term organizational outcomes (Lipiäinen, Karjaluoto, and Nevalainen, 2014, Ewing, Men, and O'Neil, 2019).

Regarding the relationship between information and employee engagement, Truss et al. (2006) noted that being well informed and receiving high-quality information about the organization's updates are fundamental elements for enhancing and strengthening employee engagement. Moreover, easy access to information and obtaining information in one's preferred form and channel leads to employee engagement (Mishra, Boynton, and Mishra, 2014).

The word "relationship" takes place in all four measures of semantic network analysis, and it is repeated 64 times in word frequency analysis. Hence, it is notable for prior internal communication, internal social media, and employee engagement research. This finding underpins the literature review. Many studies confirmed the presence of a significant and positive relationship among internal communication, internal social media, employee engagement, and employee-organization relationship. Employees represent the most critical resources of any organization. They are not only the production force for the organization but also the representatives of its image and reputation. Their performance and productivity directly influence the performance and success of the organization. Therefore, the organization must build positive, trusted, powerful, and lasting relationships with its members at all levels, and recognize the factors that improve these relationships (Men, and Stacks, 2014). Generally, the employee-organization relationship refers to the relations and connections between the employee and the organization (Shore et al., 2004). Tsui, and Wang (2002, p. 78) defined the employee-organization relationship as

“the formal and informal, the economic, social, and psychological connection between an employee and his or her employer.”

Men, and Stacks (2014) argued that the employee-organization relationship indicates the extent to which the level of trust, power and control mutuality, satisfaction, and commitment exists between an organization and its employee. A strong EOR reflects

the effectiveness of human resources management policies and practices and fulfills various tangible organizational outcomes (Kang, and Sung, 2017).

As pointed out previously in the literature review, the second primary role of internal communication is relationship management. Jo, and Shim (2005) stated that internal communication is a principal part of constructing a positive EOR. Their study emphasized that excellent internal communication management cultivates trusted relationships between the organization and its employees. Effective internal communication creates positive, close, and strong relationships among the organization members at all levels (Welch, and Jackson, 2007; King, and Lee, 2016; Kang, and Sung, 2017). Men, and Stacks (2014) claimed that symmetrical and transparent internal communication establishes a positive and favorable EOR.

Elving (2005) declared that internal social media applications help widely and effectively attain the two main internal communication goals: disseminating information and building a positive EOR. Internal social media facilitates constructing and strengthening the personal and professional relationships among all the organization members (Buettner, 2015; Haddud, Dugger, and Gill, 2016; King, and Lee, 2016; Weber, and Shi, 2017; Robertson, and Kee, 2017).

Furthermore, Eldor, and Vigoda-Gadot (2017) cited that employee engagement plays a crucial role in improving the relationship between the employee and the organization. They asserted that employee engagement is a fundamental and unique component in creating a positive EOR. Employee engagement develops high-quality relationships between the employer and other stakeholders within and beyond the organization (Saks, 2006; Ram, and Prabhakar, 2011).

According to the semantic network analysis and word frequency analysis findings, the word “satisfaction” signifies a worthwhile concept covered by the previous studies dealing with internal communication, internal social media, and employee engagement. Numerous studies have illuminated the substantial and positive relationship among internal communication, employee engagement, and job satisfaction. Job satisfaction is the positive sentimental state that an employee constructs through the job assessment or job experience (Kamalanabhan, Sai, and Mayuri, 2009). Different factors influence the job satisfaction level. Based on the

motivational theory of Herzberg (1968), the factors impacting job satisfaction can be divided into two main categories: intrinsic factors (motivators) and extrinsic factors (hygiene). Intrinsic factors of job satisfaction incorporate job characteristics and requirements, responsibilities, achievement, recognition, advancement opportunities, and career development. Extrinsic factors of job satisfaction include job security, work and social environment, management style, organizational policies, compensation policies, status and seniority, EOR, and personal life (Tepayakul, and Rinthaisong, 2018). Wang et al. (2020) provided other categorizations of job satisfaction factors. These latter are classified into two main groups: organizational factors and individual or personal factors. Organizational factors encompass organizational culture, work environment, work conditions, EOR, human resources management practices, compensation and rewards policies, and regulation systems. Individual/personal factors embrace gender, age, level of education, social status, and personality. Job satisfaction is a key instrument that accomplishes various bottom-line organizational outcomes; Hence, organizations must recognize the importance of job satisfaction and identify the determinants that help improve it (Nikolić et al., 2013).

Effective internal communication practices are vital in developing and fostering job satisfaction (Men, and Stacks, 2014; Suh, Harrington, and Goodman, 2018). Carriere, and Bourque (2009) noted that internal communication satisfaction plays the mediator role in the relationship between internal communication and job satisfaction. The implementation of effective and successful internal communication strategies and activities reinforces internal communication satisfaction, which, in turn, boosts job satisfaction.

Kamalanabhan, Sai, and Mayuri (2009) and Vorina, Simonič, and Vlasova (2017) affirmed the significant and positive interrelationship between employee engagement and job satisfaction. Saks's model of the determinants and results of employee engagement (2006) enlightened that job satisfaction is one of the employee engagement outcomes. Wang et al. (2020) argued that an employee's high level of job satisfaction leads to an elevated level of employee engagement.

The word “innovation” is one of the remarkable concepts addressed by the existed research related to internal communication, internal social media, and employee engagement; It appears in three dimensions of semantic network analysis, including degree centrality, closeness centrality, and betweenness centrality. Organizational innovation is embracing new and creative ideas or behaviors for an organization related to a product, service, technology, practice, system, policy, program, or strategy (Lam, 2004). García-Morales, Matias-Reche, and Verdú-Jover (2011, p. 156) defined organizational innovation as

“a social process based on the communicative interaction among members at all levels.”

A meta-analysis directed by Damanpour (1991) to explore the determinants of organizational innovation confirmed the substantial and positive relationship between internal communication and organizational innovation. Internal communication is a principal element that enhances organizational innovation. A symmetrical and open system of internal communication assists in raising awareness regarding the organizational innovation, its characteristics, goals, and benefits, lowering the uncertainty level related to the organizational innovation, reducing the resistance degree towards the organizational innovation plans and procedures, creating a positive environment framing the organizational innovation, and encouraging all organization members to accept, support, collaborate and involve in the organizational innovation process (García-Morales, Matias-Reche, and Verdú-Jover, 2011). A study conducted by Suh, Harrington, and Goodman (2018) to assess the influence of internal communication on organizational innovation across three different sectors (for-profit, nonprofit, and public sectors) generated the following findings: In for-profit organizations, internal communication plays a crucial role in driving organizational innovation. In nonprofit organizations, it has a slight effect on promoting organizational innovation. While, in public organizations, internal communication has no impact on fostering organizational innovation. As mentioned in the literature review, internal communication through internal social media reinforces organizational innovation (Young, and Hinesly, 2014; Buettner, 2015; Men, O’Neil, and Ewing, 2020b). Internal social media features by speed and ease in disseminating information (Hewitt, 2006; Lee, 2013; Young, and Hinesly, 2014; Sievert, and Scholz,

2017). Therefore, it helps quickly and efficiently deliver information related to organizational innovation.

Regarding employee engagement, Rao (2016) emphasized a positive causal relationship between employee engagement and organizational innovation. The model proposed by Welch (2011) enlightened that employee engagement supported by effective internal communication promotes organizational innovation. Arshi, and Rao (2019) developed a model of employee engagement and organizational innovation, suggesting that employee engagement is a fundamental determinant of organizational innovation. Also, they explored that employee engagement mediated by readiness for innovation (RFI) boosts highly organizational innovation. Employee engagement enhances the innovative behavior of an employee. The more an employee is engaged, the more he or she proposes new and creative ideas and adopts the teamwork spirit to create a positive organizational climate. Likewise, an engaged employee is more able to face the changes and challenges related to organizational innovation.

The word “change” has important values in all four semantic network analysis measures, and it is reiterated 47 times in word frequency analysis. Hence, change management is considered an essential concept in prior internal communication, internal social media, and employee engagement studies. Plentiful studies asserted the significant and positive relationship between internal communication and change management. Harkness (2000) stated that internal communication is a principal instrument of change management that guides employees to embrace organizational change. The success or failure of change management is often linked to the internal communication effectiveness level (Daly, Teague, and Kitchen, 2003). Men, Neill, and Yue (2020) claimed that in times of organizational change, internal communication marked by symmetrical, two-way, and open style positively impacts positive and rational employee reactions and behaviors toward changes. Therefore, employees orient toward supporting and committing the organizational change. There are numerous effective internal communication programs and practices that internal communication managers can adopt to deliver to employees information related to organizational change and, simultaneously, gather their feedback using the different formal and informal communication channels (Neill, 2018). Implementing excellent internal communication strategies, programs, and practices during the organizational change period helps to communicate to employees the major information concerning

the changes. Hence, creating a shared understanding, decreasing the level of doubt, hesitation, and resistance to changes, and increasing the employee's motivation level to support and participate in changes (Men, Neill, and Yue, 2020). Neill (2018) suggested the basic information that managers must deliver during organizational change, which is the following: The alignment of changes with the organization's core values, the meaning of changes for employees, the changes' impact on the employee's job and responsibilities, the changes main and end purposes, the changes benefits, and the possible alternatives and resources.

Chien (2015) affirmed the substantial and positive relationship between employee engagement and change management. Patro (2013) declared that employee engagement has a dynamic role in fulfilling successful change management. Employee engagement efficiently strengthens the employees' adaptability to organizational change (Parent, and Lovelace, 2015).

The word "success" has high values in the different dimensions of semantic network analysis and word frequency analysis. It is a noticeable concept that scholars and practitioners have focused on in their previous research on internal communication, internal social media, and employee engagement. Internal communication is a central ingredient in organizational success (Fletcher, 1999). Several studies confirmed the significant and positive relationship between internal communication and organizational success (Robson, and Tourish, 2005; Ruck, and Welch, 2012). The success of an organization is intimately related to the existence of effective internal communication strategies and practices that aim to respond to the employee information needs and generate a high level of communication satisfaction (Kalla, 2005).

Moreover, many studies emphasized the substantial and positive relationship between employee engagement and organizational success. Employee engagement constitutes the ultimate key to organizational success. A high level of employee engagement stimulates organizational and financial success (Ram, and Prabhakar, 2011; Patro, 2013; Anitha, 2014). These results underpin the findings obtained above. Internal communication and employee engagement positively impact the different bottom-line outcomes of the organization, including employee-organization relationship, job

satisfaction, organizational innovation, and change management. These outcomes represent the basic yardsticks that reflect the success of an organization.

The study findings assert the significant and positive relationship between internal communication, internal social media, and employee engagement. Communicating and sharing information with employees at all levels through using internal social media as a primary channel in the internal communication process leads to greater employee engagement. Furthermore, the findings obtained from the semantic network analysis of abstracts and word frequency analysis of practical implications of 77 articles indicate that the most prominent concepts covered by the previous academic studies dealing with internal communication, internal social media, and employee engagement are: “information”, “employee-organization relationship”, “job satisfaction”, “organizational innovation”, “change management”, and “organizational success”.

The findings of this present study demonstrate that a high level of employee engagement mediated by effective internal communication strategies and practices that rely on sharing high-quality information via internal social media contributes to attaining some core organizational outcomes, including employee-organization relationship, job satisfaction, organizational innovation, change management, and organizational success.

Although most research has affirmed that using internal social media as a channel to communicate with employees has positive impacts on many core organizational outcomes, other studies shed light on the negative side and consequences resulting from using this channel (Karr-Wisniewski, and Lu, 2010; Ayyagari, Grover, and Purvis, 2011; Harris, Lambert, and Harris, 2013; Harris et al., 2015; Zhang et al., 2016; Sun et al., 2019; Chen, and Wei, 2019; Sun et al., 2021; Saleem, Feng, and Luqman, 2021).

Sun et al. (2021) argued that the inappropriate usage of internal social media might create three major types of conflicts within the organization: technology-personal conflict, technology-life conflict, and technology-work conflict. Technology-personal conflict is the collision between the user's personal values and internal social media usage influenced mainly by cultural conflict and institutional logic contradiction (Sun

et al., 2021). Technology-life or technology-family conflict represents the friction between family and life demands and internal social media usage (Turel, Serenko, and Bontis, 2011; Zheng, and Lee, 2016). This conflict occurs when employees ignore and abandon their family and social life while using internal social media for work-related purposes in their spare time (Zheng, and Lee, 2016). Technology-life conflict is basically generated by work-life conflict and privacy invasion (Sun et al., 2021). Technology-work conflict indicates the extreme usage of internal social media at work that distracts employees from achieving their work duties and responsibilities (Zheng, and Lee, 2016; Cao, and Yu, 2019). Technology-work conflict is fundamentally engendered by information, communication, and social overload. Information overload is the existence of a vast amount of data on internal social media that surpasses an employee's average ability to absorb and process (Sun et al., 2019; Sun et al., 2021; Zhang, Ding, and Ma, 2022). Communication overload appears when employees are required to respond to the communication needs using diverse communication sources that exceed their communication abilities, thereby deflecting them from their current work tasks (Delpechitre, Black, and Farrish, 2018). Social overload implies the intemperate social relations and activities built on internal social media (Zhang, Ding, and Ma, 2022). It occurs when employees sense that they are receiving and responding to plentiful social support requests, and they are providing immoderate social support to other individuals in their network on internal social media (Maier et al., 2015). Excessive internal social media usage produces information, communication, and social overload, which might develop adverse psychological and behavioral effects that influence the completion of daily work tasks (Cao, and Sun, 2018).

Technology-personal, technology-life, and technology-work conflicts are caused by (1) improper use behavior and (2) ISM technical features (Sun et al., 2021). Employees can utilize internal social media in diverse manners to accomplish different purposes: work-related and non-work-related (Brooks, and Califf, 2017). The improper use behavior represents the usage manners of internal social media that diverge from the optimal level (over or under the ideal level). It is evaluated based on two dimensions: usage degree (excessive or deficit use) and usage purpose (work-related and non-work-related). Therefore, the excessive or deficit usage of internal social media for work-related and non-work-related purposes is responsible for unexpected conflicts and

negative consequences. The improper use behavior might be stimulated by the technical features of internal social media, including complexity, visibility, persistence, interactivity, ubiquity, and pace of change (Sun et al., 2021). Complexity is the necessary effort and time to use technology. The more an internal social media platform is complex, the more it requires the devotion of more effort and time while using it, which will create an imbalance between abilities and demands (Ayyagari, Grover, and Purvis, 2011). Visibility refers to the users' information, behaviors, activities, contributions, and network connections to be visible to others (Treem, and Leonardi, 2013). The visibility characteristic of internal social media generates the privacy invasion issue (Sun et al., 2021). Persistence or reviewability signifies the permanent availability of information and previous contributions to users without expiring or disappearing (Leonardi, Huysman, and Steinfield, 2013). According to Erickson, and Kellogg (2000, p. 68), persistence

“opens the door to a variety of new uses and practices: persistent conversations may be searched, browsed, replayed, annotated, visualized, restructured, and recontextualized, with what are likely to be profound impacts on personal, social, and institutional practices”.

Although the persistence attribute of internal social media expands and improves the knowledge base within the organization, it might engender the information overload problem (Sun et al., 2021). Interactivity entails the internal social media's capacity to allow users to interact with others (Chen et al., 2016). The interactivity feature of internal social media might develop unscheduled and unexpected communication requests, leading to communication overload, which might interrupt the completion of the current work tasks (Sun et al., 2021). Ubiquity permits employees to communicate and reach and manage knowledge in any place at any time (Kane, 2017). The ubiquity characteristic of internal social media makes employees always online and available, which can cause the problems of privacy invasion, information overload, and communication overload (Sun et al., 2021). The pace of change is

“the degree to which an individual perceives the changes in his or her technological environment to be rapid” (Ayyagari, Grover, and Purvis, 2011, p. 841).

The permanent improvements of existing internal social media platforms and the continuous evolution of new ones force employees to dedicate more time and energy to respond to the adaptation demands revealed by these changes (Sun et al., 2021).

The technology-personal, technology-life, and technology-work conflicts -generated by the misuse of internal social media- yield some adverse consequences on the employees' psychological and behavioral levels (Wanigasinghe, 2019; Sun et al., 2021; Luqman et al., 2021). On the psychological level, internal social media features lead employees to work out of their regular working hours, blurring the balance between their personal and professional lives, disinheriting their leisure rights, and developing the employees' always-online and available culture. The thing that increases stress and exhaustion and drives job dissatisfaction and burnout (Wanigasinghe, 2019). For example, the complexity attribute of internal social media requires employees to devote more effort and time to use the technology. Hence, it engenders stress and exhaustion (Sun et al., 2021). Likewise, the persistence characteristic of internal social media produces information overload, thus leading to strain (Li, Pitafi, and Li, 2022). Similarly, the internal social media's interactivity and ubiquity features enable employees to interact and communicate anywhere at any time, evolving unplanned communication and blurring the boundary between personal and professional lives. Therefore, communication overload and privacy invasion might increase strain, anxiety, and exhaustion (Sun et al., 2019; Sun et al., 2021). Information, communication, and social overload caused by the excessive usage of internal social media might drive to a sense of strain and exhaustion (Yu et al., 2018; Chen, and Wei, 2019).

On the behavioral level, the persistence attribute of internal social media empowers employees to constantly access more information and knowledge than needed, causing information overload. Hence, employees might skip essential information and knowledge, resulting in a lower quality of knowledge shared and a higher level of knowledge hiding (Sun et al., 2019). The visibility characteristic of internal social media generates the privacy invasion issue, thereby discouraging and hindering employees from sharing knowledge, especially those concerned about their privacy (Sun et al., 2019). Also, several studies asserted that excessive internal social media usage negatively impacts employee performance (Yu et al., 2018; Luqman et al., 2021; Saleem, Feng, and Luqman, 2021; Li, Pitafi, and Li, 2022). The unrestricted usage of

internal social media for work and non-work-related purposes might drain the employee's mental, emotional, and physical resources while working, thus, weakening job performance (Saleem, Feng, and Luqman, 2021). Likewise, inappropriate internal social media usage stimulates interruption overload (triggered by communication and social overload), which adversely affects employees' performance, productivity, and creativity (Luqman et al., 2021).

In order to reduce the intensity of the negative consequences on employees' mental and physical health and the adverse effects on their behaviors yielded by the improper usage of internal social media, some countries enacted "the right to disconnect" from the digital platforms and devices after the regular working hours to codify and regulate the use of the digital tools by employees and employers (Lerouge, and Trujillo Pons, 2022). France is one of the first European countries to legally recognize and apply the right to disconnect outside the regular working hours (8 hours of work per day or 48 hours of work per week) agreed in (1) the Hours of Work Conventions, respectively, 1919 (Industry) (No.01) (ILO, 1919) and 1930 (Commerce and Offices) (No. 30) (ILO, 1930) issued by International Labour Organisation, and (2) the Working Time Directive 2003/88/EC enacted by the European Parliament and the Council of November 4, 2003, of the European Union regarding certain aspects of the organization of working time (European Union, 2003). From 2001 to 2015, the French government made many attempts to develop a legal framework to regulate the usage of digital tools outside regular working hours. In 2016, the French government proposed implementing overall reforms to the Labor Code, consulting with the social partners and the commission on the foundation of Labor Code proposals. The new Labor Code was formally adopted in 2017 (Wanigasinghe, 2019). One of the key regulations embraced by this new Labor Code is the right to disconnect. The Article L2242-17 of the Labor Code states the importance of (1) the agreements' establishment within the companies regarding the procedures that guarantee the employees exercise of their right to disconnect from work, and (2) the companies' implementation and execution of mechanisms that arrange and adjust the usage of digital tools in light with the compliance with rest and leave times and building a healthier balance between personal and professional lives (Légifrance, 2022). The right to disconnect protects employees from the employers' exploitation and any punishments if they do not respond to their employers, managers, or supervisors on

internal social media or any digital tools beyond the regular working hours. The right to disconnect safeguards employees from work overload, guarantees their rights to rest and privacy, and ensures the work-life balance for employees (Lerouge, and Trujillo Pons, 2022).



CHAPTER 8: CONCLUSION

This study aims to examine the impact of internal communication through using internal social media on employee engagement by disclosing the most prominent concepts covered by the previous academic studies dealing with internal communication, internal social media, and employee engagement and assessing the relationship among these concepts. The study findings assert the significant and positive relationship between internal communication, internal social media, and employee engagement. Communicating and sharing information with employees at all levels through using internal social media as a primary channel in the internal communication process leads to greater employee engagement. Furthermore, the findings obtained from the semantic network analysis of abstracts and word frequency analysis of practical implications of 77 articles indicate that the most eminent concepts covered by the prior studies on internal communication, internal social media, and employee engagement are: “information”, “employee-organization relationship”, “job satisfaction”, “organizational innovation”, “change management”, and “organizational success”. The findings of this present study demonstrate that a high level of employee engagement mediated by effective internal communication strategies and practices that rely on sharing high-quality information via internal social media contributes to attaining some core organizational outcomes, including employee-organization relationship, job satisfaction, organizational innovation, change management, and organizational success.

8.1. Theoretical and Practical Implications

This study offers important theoretical and practical implications for academics and professionals in the management, communication, and public relations fields. On the theoretical level, the present study has five major theoretical implications. Firstly, this study contributes to the growing bodies of knowledge on internal communication and employee engagement by confirming the substantial and positive relationship between the two concepts. Consistent with the previous studies, this study indicates that internal communication plays a crucial role in greater employee engagement. Secondly, this study contributes to the existing internal social media literature. A dearth of research deals with internal social media as an internal communication channel. This study provides a theoretical framework and a comprehensive understanding of internal social

media, its forms, rich features, valuable benefits, and its dynamic role as an internal communication channel. Internal social media helps widely and effectively accomplish the two main internal communication goals: disseminating information and building positive and trusted relationships (Elving, 2005). Internal social media represents a superior internal communication channel to connect easily, fast, and constantly with the organization's members. This innovative channel and its attributes can cover some of the deficits and limitations of existing internal communication traditional channels (King, and Lee, 2016). Thirdly, although the prior studies pointed out the potential association between internal social media and employee engagement, only a few empirical research have investigated their relationship due to the novelty of the internal social media concept and the lack of data. This study fills this gap in the literature by affirming the significant and positive relationship between internal social media and employee engagement. This study illuminates how using internal social media as an internal communication channel positively reinforces the level of employee engagement. Fourthly, limited studies have examined, in one integrated study, the relationship among the concepts of internal communication, internal social media, employee engagement, employee-organization relationship, job satisfaction, organizational innovation, change management, and organizational success. This study is one of the few attempts to emphasize the substantial and positive relationship among all these concepts. The study findings assert that a high level of employee engagement mediated by excellent internal communication strategies and practices fulfills core organizational outcomes, including employee-organization relationship, job satisfaction, organizational innovation, change management, and organizational success. Finally, surveys and in-depth interviews are the most used research methods in most internal communication and employee engagement research. Also, only a moderate number of studies on internal communication and employee engagement rely on case studies and critiques (Lee, and Yue, 2020). This study is one of the few attempts that use semantic network analysis as the research method to analyze data linked to internal communication and employee engagement research.

On the practical level, this study offers valuable managerial implications for internal communication and public relations practitioners. First, the study findings confirm that successful internal communication strategies and practices positively impact employee engagement, employee-organization relationship, job satisfaction, organizational

innovation, change management, and organizational success. Therefore, internal communication practitioners are recommended to continuously evolve new and innovative internal communication strategies and practices that aim to inform, update, and satisfy the communication needs of the employee, guide and create a unified understanding, and increase the employee level of motivation and engagement. To achieve this end, internal communication practitioners can follow these suggestions: **(1)** Orient towards an open, two-way, conversational, and symmetrical internal communication system that relies on dialogue and negotiation and takes into consideration the employees' feedback and concerns; **(2)** Assure that the message delivered to employees is understood and accepted by all of them; And **(3)** ensure that these strategies and practices positively impact the different core organizational outcomes such as employee engagement, organizational commitment, employee-organization relationship, job satisfaction, organizational innovation, change management, performance, productivity, profitability, and organizational success. Likewise, internal communication practitioners are recommended to develop dashboards to monitor the effectiveness of internal communication strategies and practices. These dashboards can include some indicators related to internal communication and employee engagement that intend to measure, evaluate, and control the progress of employee communication satisfaction and engagement levels.

Second, as mentioned in the literature review, immediate managers are considered the best information source for employees (Men, 2014). Hence, internal communication practitioners are recommended to collaborate with managers at all levels to determine the information and the principal points to deliver to employees. Also, internal communication practitioners are recommended to organize training programs for managers. The primary goals of these training programs are **(1)** providing managers an in-depth understanding of the internal communication concept, **(2)** improving their communication skills and capabilities to identify and respond to the employee communication needs, **(3)** training them to determine the appropriate content, channels, and timing to communicate with their employees (Mishra, Boynton, and Mishra, 2014; Men, 2015; Neill, 2018), and **(4)** orienting them to involve all employees in the internal communication process.

Third, according to the study findings, the word “information” arises as one of the noteworthy concepts in internal communication, internal social media, and employee engagement studies. Therefore, this study suggests the following recommendations to internal communication practitioners and managers: **(1)** Comprehend the type, quantity, and quality of information employees want to obtain. **(2)** Disseminate updated and high-quality information characterized by accuracy, relevancy, and usefulness (Lee, 2016). **(3)** Select the appropriate internal communication channel for each sort of information. **(4)** As pointed out before, employees may prefer different internal communication channels for different information sorts or depending on their job and responsibilities (Welch, and Jackson, 2007; Mishra, Boynton, and Mishra, 2014). Hence, internal communication practitioners and managers must identify the employees’ preferences in terms of internal communication channels for different types of information.

Fourth, the internal communication landscape has witnessed a radical change, especially after the development of social media and its penetration into the workplace. Internal social media integration as a novel internal communication channel became an absolute necessity for organizations. This contemporary channel widely facilitates the communication and collaboration process among all the organization members. Therefore, internal communication practitioners are recommended to show more interest in internal social media, start to use it as one of the strategic internal communication channels, and strategically exploit its diverse and rich features. Likewise, before and during implementing internal social media platforms in the workplace, internal communication practitioners are recommended to organize workshops that aim to **(1)** orient employees towards the wise usage of internal social media, **(2)** provide employees the opportunity to share their worries and difficulties confronted during its usage **(3)** increase the employees' abilities to adapt its permanent updates and challenges, **(4)** clarify the difference between the public social media and internal social media platforms, and **(5)** guarantee the understanding of the importance of the boundary management of personal and professional lives when using internal social media. The possibility to fast embracing internal social media as an internal communication channel by employees in the workplace is very high because 21st-century employees are more technology savvy. Also, social media constitutes a part of the employees' personal lives, and most of them are familiar with it.

8.2. Limitations and Future Research

Although the interesting findings obtained from this present study and the functional theoretical and practical implications discussed earlier, this study reveals some limitations. These limitations need to be addressed by future research. First, the study data were collected from the research papers published only in the Web of Science database. Future research can gather data from research papers issued in other popular scientific databases, such as ELSEVIER, Scopus, Springer, and EBSCO. Second, the study findings indicate that effective internal communication and employee engagement positively impact various organizational outcomes, including employee-organization relationship, job satisfaction, organizational innovation, change management, and organizational success. Future research should develop a comprehensive study that profoundly investigates the relationship among all these concepts. Likewise, future research should examine the role of internal social media as an internal communication channel in enhancing the different organizational outcomes revealed by this study (employee-organization relationship, job satisfaction, organizational innovation, change management, and organizational success). Third, there is a lack of research related to internal social media. Hence, future research should fill this gap and develop more studies on internal social media to enrich its literature. As mentioned in the literature review, there are three forms of internal social media: public sites, private systems, and in-house developed proprietary solutions. Future research should explore the most preferred internal social media form by employees. Also, with the new wave of mobile technologies (smartphones) and the broad emergence of mobile applications, it became easy to get to social media platforms on mobiles. Future research should investigate which device employees prefer to use to reach internal social media platforms (computer, laptop, tablet, or smartphone). Likewise, internal social media may create the problem of separating personal and professional life and increase conflicts among employees. Future research should assess the critical role of boundary management in improving the wise and effective usage of internal social media by employees in the workplace. Moreover, future research should establish cross-cultural studies to analyze the adaptation level of internal social media as an internal communication channel by employees that belong to different geographical areas and cultures.

REFERENCES

- Albrecht, S.L. (2010) *Employee engagement: 10 key questions for research and practice*, in Albrecht, S.L. (ed.) *Handbook of employee engagement: Perspectives, issues, research and practice*. 1st edition. Cheltenham: Edward Elgar Publishing Limited, pp. 1-19.
- AL-Ghaswyneh, O.F.M. (2018) *Pillars of internal marketing and their impact on staff performance*, Marketing, Vol. (2), pp. 313-326.
- Ali, S. and Farooqi, Y. A. (2014) *Effect of work overload on job satisfaction, effect of job satisfaction on employee performance and employee engagement (a case of public sector University of Gujranwala Division)*, International Journal of Multidisciplinary Sciences and Engineering, Vol. 5(8), pp. 23-30.
- Ali, Z., Sabir, S. and Mehreen, A. (2019) *Predicting engagement and performance through firm's internal factors: evidence from textile sector*, Journal of Advances in Management Research, Vol. 16(5), pp. 763-780.
- Anitha, J. (2014) *Determinants of employee engagement and their impact on employee performance*, International journal of productivity and performance management, Vol. 63(3), pp. 308-323.
- Araújo, M. and Miranda, S. (2020). *Multidisciplinarity in internal communication and the challenges ahead*, Corporate Communications: An International Journal. Vol. 26(1), pp. 107-123.
- Archambault, A. and Grudin, J. (2012) *A Longitudinal Study of Facebook, LinkedIn, and Twitter Use*, *Proceedings of the CHI 2012*. Austin, TX, USA. 5-12 May 2012. pp. 2741-2750.
- Argenti, P. A. (1996) *Corporate communication as a discipline: toward a definition*, Management communication quarterly, Vol. 10(1), pp. 73-97.
- Argenti, P. A. (1998) *Strategic employee communications*, Human Resource Management, Vol. 37(3-4), pp. 199-206.
- Ariani, D. W. (2013) *The relationship between employee engagement, organizational citizenship behavior, and counterproductive work behavior*, International Journal of Business Administration, Vol. 4(2), p. 46.
- Arshi, T. and Rao, V. (2019) *Assessing impact of employee engagement on innovation and the mediating role of readiness for innovation*, International Journal of Comparative Management, Vol. 2(2), pp. 174-202.

- Ausiello, G., Firmani, D. and Laura, A.L. (2012) *Real-time monitoring of undirected networks: Articulation points, bridges, and connected and biconnected components*, *Networks*, Vol. 59(3), pp. 275-288.
- Aydin, A., Sarier, Y. and Uysal, S. (2011) *The Effect of Gender on Organizational Commitment of Teachers: A Meta-Analytic Analysis*, *Educational Sciences: Theory and Practice*, Vol. 11(2), pp. 628-632.
- Ayyagari, R., Grover, V. and Purvis, R. (2011) *Technostress: Technological antecedents and implications*, *MIS Quarterly*, Vol. 35(4), pp. 831-858.
- Bakker, A.B., Albrecht, S.L. and Leiter, M.P. (2011) *Key questions regarding work engagement*, *European Journal of Work and Organizational Psychology*, Vol. 20(1), pp. 4-28.
- Bakker, A.B., Tims, M. and Derks, D. (2012) *Proactive personality and job performance: The role of job crafting and work engagement*, *Human relations*, Vol. 65(10), pp. 1359-1378.
- Bala, H., Massey, A.P., and Hsieh, C.J. (2016). *A multimethod study of enterprise social media implementation and use: Mitigating the gap between theory and practice*, *Journal of Organizational and End User Computing (JOEUC)*, Vol. 28(3), pp. 141-162.
- Balakrishnan, C. and Masthan, D. (2013) *Impact of internal communication on employee engagement—A study at Delhi International Airport*, *International Journal of Scientific and Research Publications*, Vol. 3(8), pp. 1-13.
- Baldissara-Kunnela, R. (2016) *Microsoft SharePoint and IBM Connections Content Management Issues*, Bachelor's thesis. Jyväskylä, Jamk University of Applied Sciences.
- Barnett, G. and Jiang, K. (2017) *Issues in Intercultural Communication: A Semantic Network Analysis*, *Intercultural Communication*, Vol. 9, p. 99.
- Batagelj, V. and Mrvar, A. (1998) *Pajek-program for large network analysis*, *Connections*, Vol. 21(2), pp. 47-57.
- Batagelj, V. and Mrvar, A. (2002) *Network Analysis of Reuters News about the Terrorist Attack on September 11, 2001*, [Online]. Available at <http://vlado.fmf.uni-lj.si/pub/networks./doc/terror/TerrorNet.pdf>. (Accessed: March 2022).
- Becker, H.S. (1960) *Notes on the concept of commitment*, *American Journal of Sociology*, Vol. 66(1), pp. 32-40.
- Biswas, S., Varma, A. and Ramaswami, A. (2013) *Linking distributive and procedural*

justice to employee engagement through social exchange: A field study in India, The International Journal of Human Resource Management, Vol. 24(8), pp. 1570-1587.

Bizzi, L. (2018) *The hidden problem of Facebook and social media at work: What if employees start searching for other jobs?*, Business Horizons, Vol. 61(1), pp. 23-33.

Borgatti, S.P., Mehra, A., Brass, D.J. and Labianca, G. (2009) *Network analysis in the social sciences*, Science, Vol. 323(5916), pp. 892-895.

Bossio, D., McCosker, A., Milne, E., Golding, D. and Albarrán-Torres, C. (2020) *Social media managers as intermediaries: negotiating the personal and professional in organisational communication*, Communication Research and Practice, Vol. 6(2), pp. 95-110.

Boyd, D. M. and Ellison, N.B. (2007) *Social network sites: Definition, history, and scholarship*, Journal of computer-mediated Communication, Vol. 13(1), pp. 210-230.

Briggs, D. (2007) *Finding the Right Channel for your CEO*, Strategic Communication Management, Vol. 11(3), p. 13.

Brooks, S. and Califf, C. (2017) *Social media-induced technostress: Its impact on the job performance of it professionals and the moderating role of job characteristics*, Computer networks, Vol. 114, pp. 143-153.

Brun, J.P. and Dugas, N. (2005) *La reconnaissance au travail: analyse d'un concept riche de sens*, Gestion, Vol. 30(2), pp. 79-88.

Brzozowski, M.J. (2009) *WaterCooler: Exploring an organization through enterprise social media. Proceedings of the ACM 2009 International Conference on Supporting Group Work (GROUP '09)* (pp. 219–228). ACM Press, New York. May 2009.

Buckingham, M. and Coffman, C. (1999) *First, Break All the Rules: What the World's Greatest Managers Do Differently*. 1st edition. New York: The Gallup Organization, Simon and Schuster.

Buettner, R. (2015) *Analyzing the problem of employee internal social network site avoidance: Are users resistant due to their privacy concerns?*. *Proceedings of the 48th Hawaii International Conference on System Sciences* (pp. 1819-1828). IEEE. 2015.

Buil, I., Martínez, E. and Matute, J. (2016) *From internal brand management to organizational citizenship behaviours: Evidence from frontline employees in the hotel industry*, Tourism Management, Vol. 57, pp. 256-271.

Campos, C.J.G. and Turato, E.R. (2009) *Content analysis in studies using the clinical-qualitative method: application and perspective*, Revista Latino-Americana de Enfermagem, Vol. 17, pp. 259-264.

- Cao, X. and Sun, J. (2018) *Exploring the effect of overload on the discontinuous intention of social media users: An SOR perspective*, Computers in human behavior, Vol. 81, pp. 10-18.
- Cao, X. and Yu, L. (2019) *Exploring the influence of excessive social media use at work: A three-dimension usage perspective*, International Journal of Information Management, Vol. 46, pp. 83-92.
- Cao, Y., Bungler, A.C., Hoffman, J. and Robertson, H.A. (2016) *Change communication strategies in public child welfare organizations: Engaging the front line*, Human Service Organizations: Management, Leadership & Governance, Vol. 40(1), pp. 37-50.
- Carriere, J. and Bourque, C. (2009) *The effects of organizational communication on job satisfaction and organizational commitment in a land ambulance service and the mediating role of communication satisfaction*, Career Development International, Vol. 14 (1), pp. 29-49.
- Castro-Martínez, A. and Díaz-Morilla, P. (2021) *Internal communication as a strategic area for innovation through change management and organizational happiness*, pp. 133-148.
- Chen, C.H.V. and Indartono, S. (2011) *Study of commitment antecedents: The dynamic point of view*, Journal of business ethics, Vol. 103(4), pp. 529-541.
- Chen, Q., Xu, X., Cao, B. and Zhang, W. (2016) *Social media policies as responses for social media affordances: The case of China*, Government information quarterly, Vol. 33(2), pp. 313-324.
- Chen, X. and Wei, S. (2019) *Enterprise social media use and overload: A curvilinear relationship*, Journal of Information Technology, Vol. 34(1), pp. 22-38.
- Chien, J. (2015) *The impact of change management on employee satisfaction and engagement*, World Academy of Science, Engineering and Technology, Open Science Index 101, International Journal of Economics and Management Engineering, Vol. 9(5), pp. 1717-1722.
- Chughtai, A.A. and Zafar, S. (2006) *Antecedents and consequences of organizational commitment among Pakistani university teachers*, Applied HRM research, Vol. 11(1), p. 39.
- Cole, M.S., Walter, F., Bedeian, A.G. and O'Boyle, E.H. (2012) *Job burnout and employee engagement: A meta-analytic examination of construct proliferation*, Journal of management, Vol. 38(5), pp. 1550-1581.

- CYONE. *HCL Connections*, [Blog]. Available at: <https://cyone.eu/products-and-solutions/hcl-connections/>. (Accessed: March 2021).
- Dahl, A., Lawrence, J. and Pierce, J. (2011) *Building an innovation community*, *Research-Technology Management*, Vol. 54(5), pp. 19-27.
- Daly, F., Teague, P. and Kitchen, P. (2003) *Exploring the role of internal communication during organisational change*, *Corporate Communications: An International Journal*, Vol. 8(3), pp. 153-162.
- Damanpour, F. (1991) *Organizational innovation: A meta-analysis of effects of determinants and moderators*, *Academy of management journal*, Vol. 34(3), pp. 555-590.
- Daugherty, T., Eastin, M.S. and Bright, L. (2008) *Exploring consumer motivations for creating user-generated content*, *Journal of interactive advertising*, Vol. 8(2), pp. 16-25.
- Delpechitre, D., Black, H.G. and Farrish, J. (2018) *The dark side of technology: examining the impact of technology overload on salespeople*, *Journal of Business & Industrial Marketing*, Vol. 34(2), pp. 317-337.
- Diffin, J., Chirombo, F. and Nangle, D. (2010) *Cloud collaboration: using Microsoft SharePoint as a tool to enhance access services*, *Journal of Library Administration*, Vol. 50(5-6), pp. 570-580.
- DiMicco, J.M., Geyer, W., Millen, D.R., Dugan, C. and Brownholtz, B. (2009) *People sensemaking and relationship building on an enterprise social network site. Proceedings of the 42nd Hawaii International Conference on System Sciences* (pp. 1-10). IEEE. 2009.
- DiMicco, J.M., Millen, D.R., Geyer, W., Dugan, C. and Street, O.R. (2008) *Research on the Use of Social Software in the Workplace*, Paper presented at the Computer Supported Collaborative Work workshop on Social Networking in Organizations, San Diego, CA, pp. 1-2.
- Doerfel, M.L. and Barnett, G.A. (1999) *A semantic network analysis of the International Communication Association*, *Human communication research*, Vol. 25(4), pp. 589-603.
- Dortok, A. (2006) *A managerial look at the interaction between internal communication and corporate reputation*, *Corporate reputation review*, Vol. 8(4), pp. 322-338.
- Downe-Wamboldt, B. (1992) *Content analysis: method, applications, and*

- issues*, Health care for women international, Vol. 13(3), pp. 313-321.
- Downs, C.W. and Adrian, A.D. (2004) *Assessing organizational communication: Strategic communication audits*. 1st edition. New York: The Guilford Press.
- Drieger, P. (2013) *Semantic network analysis as a method for visual text analytics*, Procedia-social and behavioral sciences, Vol. 79, pp. 4-17.
- DuFrene, D.D. and Lehman, C.M. (2014) *Navigating change: Employee communication in times of instability*, Business and Professional Communication Quarterly, Vol. 77(4), pp. 443-452.
- Duncan, T. and Moriarty, S.E. (1998) *A communication-based marketing model for managing relationships*, Journal of Marketing, Vol. 62(2), pp. 1-13.
- Duthler, G. and Dhanesh, G.S. (2018) *The role of corporate social responsibility (CSR) and internal CSR communication in predicting employee engagement: Perspectives from the United Arab Emirates (UAE)*, Public relations review, Vol. 44(4), pp. 453-462.
- Eldor, L. and Vigoda-Gadot, E. (2017) *The nature of employee engagement: Rethinking the employee–organization relationship*, The International Journal of Human Resource Management, Vol. 28(3), pp. 526-552.
- Elo, S. and Kyngäs, H. (2008) *The qualitative content analysis process*, Journal of advanced nursing, Vol. 62(1), pp. 107-115.
- Elving, W.J. (2005) *The role of communication in organisational change*, Corporate communications: an international journal, Vol. 10(2), pp. 129-138.
- Erickson, T. and Kellogg, W.A. (2000) *Social translucence: an approach to designing systems that support social processes*, ACM transactions on computer-human interaction (TOCHI), Vol. 7(1), pp. 59-83.
- European Union. (2003) *Directive 2003/88/EC of the European Parliament and of the Council of 4 November 2003 concerning certain aspects of the organisation of working time*, [Online]. Available at: <https://eur-lex.europa.eu/legal-content/EN/TXT/?uri=celex%3A32003L0088>. (Accessed: August 2022).
- Evans, M., Novicevic, M.M., Martin, J.S. and Dorn, F.J. (2008) *CEO blogs: credibility issues*, International journal of information technology and management, Vol. 7(2), pp. 161-177.
- Ewing, M., Men, L.R. and O’Neil, J. (2019) *Using social media to engage employees: Insights from internal communication managers*, International Journal of Strategic Communication, Vol. 13(2), pp. 110-132.

- Fleming, J.H. and Asplund, J. (2007) *Human Sigma: Managing the employee-customer encounter*. 1st edition. New York: Gallup Press.
- Fletcher, M. (1999) *The effects of internal communication, leadership and team performance on successful service quality implementation: A South African perspective*, *Team performance management: An international journal*, Vol. 5(5), pp. 150-163.
- Freeney, Y. and Tiernan, J. (2006) *Employee engagement: An overview of the literature on the proposed antithesis to burnout*, *The Irish Journal of Psychology*, Vol. 27(3-4), pp. 130-141.
- Friedl, J. and Verčič, A.T. (2011) *Media preferences of digital natives' internal communication: A pilot study*, *Public Relations Review*, Vol. 37(1), pp. 84-86.
- Fronzetti Colladon, A., Saint-Charles, J. and Mongeau, P. (2021) *From words to connections: Word use similarity as an honest signal conducive to employees' digital communication*, *Journal of Information Science*, Vol. 47(6), pp. 699-711.
- Fulk, J. and Yuan, Y.C. (2013) *Location, motivation, and social capitalization via enterprise social networking*, *Journal of Computer-Mediated Communication*, Vol. 19(1), pp. 20-37.
- García-Morales, V.J., Matias-Reche, F. and Verdú-Jover, A.J. (2011) *Influence of internal communication on technological proactivity, organizational learning, and organizational innovation in the pharmaceutical sector*, *Journal of Communication*, Vol. 61(1), pp. 150-177.
- Ghosh, P., Rai, A., Chauhan, R., Baranwal, G. and Srivastava, D. (2016) *Rewards and recognition to engage private bank employees: Exploring the "obligation dimension"*, *Management Research Review*, Vol. 39(12), pp. 1738-1751.
- Gillis, T. (2007) *Internal communication media*, in Gillis, T. (ed.) *The IABC Handbook of Organizational Communication: A Guide to Internal Communication, Public Relations, Marketing and Leadership*. 1st edition. San Francisco, CA: Jossey-Bass, pp. 257–267.
- Gode, H.E., Johansen, W. and Thomsen, C. (2019) *Employee engagement in generating ideas on internal social media: A matter of meaningfulness, safety and availability*, *Corporate Communications: An International Journal*, Vol. 25(2), pp. 263-280.
- Grant, M.A. and Hofmann, A.D. (2011) *Role expansion as a persuasion process: The interpersonal influence dynamics of role redefinition*, *Organizational Psychology*

Review, Vol. 1(1), pp. 9-31.

Griffin, M.L., Hogan, N.L., Lambert, E.G., Tucker-Gail, K.A. and Baker, D.N. (2010) *Job involvement, job stress, job satisfaction, and organizational commitment and the burnout of correctional staff*, Criminal Justice and Behavior, Vol. 37(2), pp. 239-255.

Haddud, A., Dugger, J.C. and Gill, P. (2016) *Exploring the impact of internal social media usage on employee engagement*, Journal of Social Media for Organizations, Vol. 3(1), pp. 1-23.

Handa, M. and Gulati, A. (2014) *Employee engagement: Does individual personality matter*, Journal of Management Research, Vol. 14(1), p. 57.

Harkness, J. (2000) *Measuring the effectiveness of change—The role of internal communication in change management*, Journal of Change Management, Vol. 1(1), pp. 66-73.

Harris, K.J., Harris, R.B., Carlson, J.R. and Carlson, D.S. (2015) *Resource loss from technology overload and its impact on work-family conflict: Can leaders help?*, Computers in Human Behavior, Vol. 50, pp. 411-417.

Harris, K.J., Lambert, A. and Harris, R.B. (2013) *HRM effectiveness as a moderator of the relationships between abusive supervision and technology work overload and job outcomes for technology end users*, Journal of Applied Social Psychology, Vol. 43(8), pp. 1686-1695.

Harter, J.K., Schmidt, F.L. and Hayes, T.L. (2002) *Business-unit-level relationship between employee satisfaction, employee engagement, and business outcomes: a meta-analysis*, Journal of applied psychology, Vol. 87(2), p. 268.

HCLSOFTWARE. *What is IBM Connections?*, [Blog]. Available at: https://help.hcltechsw.com/connections/v55/admin/overview/c_what_is_lc.html.

(Accessed: March 2021).

Herrera, K. (2008) *From static files to collaborative workspace with SharePoint*, Library Hi-Tech, Vol. 26(1), pp. 80-94.

Herzberg, F. (1968) *One more time: How do you motivate employees*, Boston, MA: Harvard Business Review, Vol. 65.

Hewitt, P. (2006) *Electronic mail and internal communication: A three-factor model*, Corporate Communications: An International Journal, Vol. 11(1), pp. 78-92.

Hilal, A.H. and Alabri, S.S. (2013) *Using NVivo for data analysis in qualitative research*, International interdisciplinary journal of education, Vol. 2(2), pp. 181-186.

Holá, J. and Pikhart, M. (2014) *The implementation of internal communication system*

as a way to company efficiency, *E+ M Ekonomie a Management*, Vol. 17(2), pp. 161-169.

Hollis, L.P. (2015) *Bully university? The cost of workplace bullying and employee disengagement in American higher education*, Sage Open, Vol. 5(2), pp.1-11.

Hsieh, H.F. and Shannon, S.E. (2005) *Three approaches to qualitative content analysis*, *Qualitative health research*, Vol. 15(9), pp. 1277-1288.

IBM. (2021) *Integration with IBM Connections*, [Blog]. Available at: <https://www.ibm.com/docs/en/fcs/2.0.0?topic=applications-integration-connections>. (Accessed: March 2021).

IBM. *Beehive (SocialBlue)*, [Blog]. Available at: https://researcher.watson.ibm.com/researcher/view_group.php?id=1231. (Accessed: March 2021).

Iker, H.P. (1974) *An historical note on the use of word-frequency contiguities in content analysis*, *Computers and the Humanities*, Vol. 8(2), pp. 93-98.

Ingelmo Palomares, M., Navarro, C. and Sanz Lara, J.Á. (2018) *Determining factors of success in internal communication management in Spanish companies: The influence of social media*, *Corporate Communications: An International Journal*, Vol. 23(3), pp. 405-422.

International Labour Organisation. (1919) *Hours of Work (Industry) Convention, 1919 (No. 1)*, [Online]. Available at: https://www.ilo.org/dyn/normlex/en/f?p=NORMLEXPUB:12100:0::NO::P12100_IL O_CODE:C001. (Accessed: August 2022).

International Labour Organisation. (1930) *Hours of Work (Commerce and Offices) Convention, 1930 (No. 30)*, [Online]. Available at: https://www.ilo.org/dyn/normlex/en/f?p=NORMLEXPUB:12100:0::NO::P12100_IL O_CODE:C030. (Accessed: August 2022).

Ioannidis, E., Varsakelis, N. and Antoniou, I. (2019) *Change agents and internal communications in organizational networks*, *Physica A: Statistical Mechanics and its Applications*, Vol. 528, pp. 1-15.

Ishii, K., Lyons, M.M. and Carr, S.A. (2019) *Revisiting media richness theory for today and future*, *Human Behavior and Emerging Technologies*, Vol. 1(2), pp. 124-131.

Jankelová, N. and Joniaková, Z. (2021) *How to increase production performance of Slovak agricultural companies: The key task of supporting innovative work behavior*

- and information sharing*, Agricultural Economics, Vol. 67(1), pp. 11-20.
- Jennings, S.E., Blount, J.R. and Weatherly, M.G. (2014) *Social media—A virtual Pandora's box: Prevalence, possible legal liabilities, and policies*, Business and Professional Communication Quarterly, Vol. 77(1), pp. 96-113.
- Jiang, H. and Luo, Y. (2018) *Crafting employee trust: from authenticity, transparency to engagement*. Journal of Communication Management, Vol. 22(2), pp. 138-160.
- Jo, S. and Shim, S.W. (2005) *Paradigm shift of employee communication: The effect of management communication on trusting relationships*, Public relations review, Vol. 31(2), pp. 277-280.
- Jose, G. and Mampilly, S.R. (2014) *Psychological empowerment as a predictor of employee engagement: An empirical attestation*, Global Business Review, Vol. 15(1), pp. 93-104.
- Jose, G. and Mampilly, S.R. (2015) *Relationships among perceived supervisor support, psychological empowerment and employee engagement in Indian workplaces*, Journal of Workplace Behavioral Health, Vol. 30(3), pp. 231-250.
- Kahn, W.A. (1990) *Psychological conditions of personal engagement and disengagement at work*, Academy of management journal, Vol. 33(4), pp. 692-724.
- Kahn, W.A. (1992) *To be fully there: Psychological presence at work*, Human Relations, Vol. 45(4), pp. 321-349.
- Kalla, H.K. (2005) *Integrated internal communications: a multidisciplinary perspective*, Corporate Communications: An International Journal, Vol. 10(4), pp. 302-314.
- Kamalanabhan, T.J., Sai, L.P. and Mayuri, D. (2009) *Employee engagement and job satisfaction in the information technology industry*, Psychological Reports, Vol. 105(3), pp. 759-770.
- Kane, G.C. (2017) *The evolutionary implications of social media for organizational knowledge management*, Information and Organization, Vol. 27(1), pp. 37-46.
- Kang, M. and Sung, M. (2017) *How symmetrical employee communication leads to employee engagement and positive employee communication behaviors: The mediation of employee-organization relationships*, Journal of Communication Management, Vol. 21(1), pp. 82-102.
- Kang, M. and Sung, M. (2017) *How symmetrical employee communication leads to employee engagement and positive employee communication behaviors: The mediation of employee-organization relationships*, Journal of Communication

Management, Vol. 21(1), pp. 82-102.

Kang, M. and Sung, M. (2019) *To leave or not to leave: the effects of perceptions of organizational justice on employee turnover intention via employee-organization relationship and employee job engagement*, Journal of Public Relations Research, Vol. 31(5-6), pp. 152-175.

Kaplan, A.M. and Haenlein, M. (2010) *Users of the world, unite! The challenges and opportunities of Social Media*, Business Horizons, Vol. 53(1), pp. 59-68.

Karanges, E., Johnston, K., Beatson, A. and Lings, I. (2015) *The influence of internal communication on employee engagement: A pilot study*, Public relations review, Vol. 41(1), pp. 129-131.

Karanges, E.R. (2014) *Optimising employee engagement with internal communication: a social exchange perspective*, Doctoral Dissertation. Masters by Research thesis, Queensland University of Technology.

Karjaluoto, H. and Huhtamäki, M. (2010) *The role of electronic channels in micro-sized brick-and-mortar firms*, Journal of Small Business and Entrepreneurship, Vol. 23(1), pp. 17-38.

Karr-Wisniewski, P. and Lu, Y. (2010) *When more is too much: Operationalizing technology overload and exploring its impact on knowledge worker productivity*, Computers in Human Behavior, Vol. 26(5), pp. 1061-1072.

Katz, D. and Kahn, R.L. (1978) *The social psychology of organizations*, New York: Wiley, Vol. 2, p. 528.

Khatoun, S. (2016) *A conceptual framework for effective organizational adoption of social technologies*. INTERNATIONAL JOURNAL OF ADVANCED AND APPLIED SCIENCES, Vol. 3(9), pp. 78-89.

Kim, A.J. and Ko, E. (2012) *Do social media marketing activities enhance customer equity? An empirical study of luxury fashion brand*, Journal of Business Research, Vol. 65(10), pp. 1480-1486.

Kim, D. (2018) *Examining effects of internal public relations practices on organizational social capital in the Korean context: Mediating roles of employee-organization relationships*, Corporate Communications: An International Journal, Vol. 23(1), pp. 100-116.

King, C. and Lee, H. (2016) *Enhancing internal communication to build social capital amongst hospitality employees—the role of social media*, International Journal of Contemporary Hospitality Management, Vol. 28(12), pp. 2675-2695.

- Koch, A.R., Binnewies, C. and Dormann, C. (2015) *Motivating innovation in schools: School principals' work engagement as a motivator for schools' innovation*, European Journal of Work and Organizational Psychology, Vol. 24(4), pp. 505-517.
- Kovaitė, K., Šūmakaris, P. and Stankevičienė, J. (2020) *Digital communication channels in Industry 4.0 implementation: The role of internal communication*, Management: Journal of Contemporary Management Issues, Vol. 25(1), pp. 171-191.
- Kulachai, W., Narkwatchara, P., Siripool, P. and Vilailert, K. (2018, March) *Internal communication, employee participation, job satisfaction, and employee performance*. Proceedings of the 15th International Symposium on Management (INSYMA 2018), Vol. 186, pp. 124-128.
- Kuoppakangas, P., Suomi, K., Clark, P., Chapleo, C. and Stenvall, J. (2020) *Dilemmas in re-branding a university "Maybe people just don't like change": Linking meaningfulness and mutuality into the reconciliation*, Corporate Reputation Review, Vol. 23(2), pp. 92-105.
- Lam, A. (2004) *Organizational innovation*, MPRA Paper 11539, Brunel University. Brunel Research in Enterprise, Innovation, Sustainability, and Ethics, London, pp.1-44.
- Landsberg, T. and Wiggill, M.N. (2017) *Relationship management with managers of countryside offices of SEESA: a case study*, Communication, Vol. 43(3-4), pp. 114-133.
- Lasswell, H.D. (1948) *The structure and function of communication in society*, The communication of ideas, Vol. 37(1), pp. 136-139.
- Lee, E. (2013) *How Do Online Social Networks Drive Internal Communication and Improve Employee Engagement?*, Cornell University, ILR School, pp.1-7.
- Lee, J.J. (2015) *Drivers of work engagement: An examination of core self-evaluations and psychological climate among hotel employees*, International Journal of Hospitality Management, Vol. 44, pp. 84-98.
- Lee, Y. (2020) *Motivations of employees' communicative behaviors on social media: Individual, interpersonal, and organizational factors*, Internet Research, Vol. 30 (3), pp. 971-994.
- Lee, Y. and Kim, J.N. (2017) *Authentic enterprise, organization-employee relationship, and employee-generated managerial assets*, Journal of Communication Management, Vol. 21(3), pp. 236-253.

Lee, Y. and Kim, K. H. (2020) *Enhancing employee advocacy on social media: the value of internal relationship management approach*, Corporate Communications: An International Journal. Vol. 26(2), pp. 311-327.

Lee, Y. and Kim, K.H. (2020) *De-motivating employees' negative communication behaviors on anonymous social media: The role of public relations*, Public Relations Review, Vol. 46(4), pp. 1-8.

Lee, Y. and Li, J.Y.Q. (2020) *The value of internal communication in enhancing employees' health information disclosure intentions in the workplace*, Public relations review, Vol. 46(1), pp. 1-9.

Lee, Y. and Yue, C. A. (2020) *Status of internal communication research in public relations: An analysis of published articles in nine scholarly journals from 1970 to 2019*, Public Relations Review, Vol. 46(3), pp. 1-10.

Lee, Y., Mazzei, A. and Kim, J.N. (2018) *Looking for motivational routes for employee-generated innovation: Employees' scouting behavior*, Journal of Business Research, Vol. 91, pp. 286-294.

Lee, Y., Tao, W., Li, J. Y. Q. and Sun, R. (2020) *Enhancing employees' knowledge sharing through diversity-oriented leadership and strategic internal communication during the COVID-19 outbreak*, Journal of Knowledge Management. Vol. 25(6), pp. 1526-1549.

Légifrance. (2022) *Egalité professionnelle entre les femmes et les hommes et qualité de vie et des conditions de travail (Articles L2242-17 à L2242-19-1)*, [Online]. Available at:

https://www.legifrance.gouv.fr/codes/article_lc/LEGIARTI000039785096/.

(Accessed: August 2022).

Leiter, M.P. and Bakker, A.B. (2010) *Work engagement: introduction*, in Bakker, A.B. and Leiter, M.P. (ed.) *Work engagement: A handbook of essential theory and research*. 1st edition. London and New York: Psychology Press, pp. 1-9.

Lemon, L.L. (2019) *Diving deeper into shared meaning-making: Exploring the zones of engagement within a single case study*, Public Relations Review, Vol. 45(4), pp.1-13.

Lemon, L.L. (2019) *Diving deeper into shared meaning-making: Exploring the zones of engagement within a single case study*, Public Relations Review, Vol. 45(4), pp. 1-13.

Lemon, L.L. (2019) *The employee experience: How employees make meaning of*

- employee engagement*, Journal of Public Relations Research, Vol. 31(5-6), pp. 176-199.
- Lemon, L.L. and Palenchar, M.J. (2018) *Public relations and zones of engagement: Employees' lived experiences and the fundamental nature of employee engagement*, Public Relations Review, Vol. 44(1), pp. 142-155.
- Lengel, R.H. and Daft, R.L. (1984) *An exploratory analysis of the relationship between media richness and managerial information processing*. Texas A And M Univ College Station Dept Of Management.
- Leonardi, P.M., Huysman, M. and Steinfield, C. (2013) *Enterprise social media: Definition, history, and prospects for the study of social technologies in organizations*, Journal of Computer-Mediated Communication, Vol. 19(1), pp. 1-19.
- Lerouge, L. and Trujillo Pons, F. (2022) *Contribution to the study on the 'right to disconnect' from work. Are France and Spain examples for other countries and EU law?*, European labour law journal, Vol. 13(3), pp. 450-465.
- Levenshus, A.B., Lemon, L.L., Childers, C. and Cho, M. (2019) *"I thought they'd do more": conflicting expectations of crowdfunding communication*, Journal of Communication Management, Vol. 23 (2), pp. 123-141.
- Leydesdorff, L. (2004) *Clusters and maps of science journals based on bi-connected graphs in journal citation reports*, Journal of documentation, Vol. 60(4), pp. 371-427.
- Leydesdorff, L. (2007) *Mapping interdisciplinarity at the interfaces between the Science Citation Index and the Social Science Citation Index*, Scientometrics, Vol. 71(3), pp. 391-405.
- Li, Y., Pitafi, A.H. and Li, H. (2022) *Investigating the factors of enterprise social media strain: The role of enterprise social media's visibility as a moderator*, Plos one, Vol. 17(3), pp. 1-19.
- Li, Z. (2016) *Psychological empowerment on social media: who are the empowered users?*, Public Relations Review, Vol. 42(1), pp. 49-59.
- Lipiäinen, H.S.M., Karjaluoto, H.E. and Nevalainen, M. (2014) *Digital channels in the internal communication of a multinational corporation*, Corporate Communications: An International Journal, Vol. 19(3), pp. 275-286.
- Liu, S.H., Liao, H.L. and Pratt, J.A. (2009) *Impact of media richness and flow on e-learning technology acceptance*, Computers and Education, Vol. 52(3), pp. 599-607.
- Liu, Y. and Bakici, T. (2019), *Enterprise social media usage: The motives and the moderating role of public social media experience*, Computers in Human

Behavior, Vol. 101, pp. 163-172.

Locke, E. A. (1969) *What is job satisfaction?*, Organizational behavior and human performance, Vol. 4(4), pp. 309-336.

Luhmann, N. (1992) *What is communication?*, Communication theory, Vol. 2(3), pp. 251-259.

Luqman, A., Talwar, S., Masood, A. and Dhir, A. (2021) *Does enterprise social media use promote employee creativity and well-being?*, Journal of Business Research, Vol. 131, pp. 40-54.

Luthans, F., Peterson, Suzanne, J. (2002) *Employee engagement and manager self-efficacy*, Journal of Management Development, Vol. 21(5), pp. 376–387.

Macey, W.H. and Schneider, B. (2008) *The meaning of employee engagement*, Industrial and Organizational Psychology, Vol. 1(1), pp. 3-30.

Maier, C., Laumer, S., Eckhardt, A. and Weitzel, T. (2015) *Giving too much social support: social overload on social networking sites*, European Journal of Information Systems, Vol. 24(5), pp. 447-464.

Malik, M.S., Aslam, S. and Aslam, S. (2018) *Selling the brand inside: corporate image, corporate identity and employer brand: case study of I-SEC Netherlands BV*, International Journal of Business Performance Management, Vol. 19(3), pp. 371-384.

Malinen, S. and Harju, L. (2017) *Volunteer engagement: Exploring the distinction between job and organizational engagement*, VOLUNTAS: International Journal of Voluntary and Nonprofit Organizations, Vol. 28(1), pp. 69-89.

Martic, K. (2019) *Internal Communications (IC): The What, Why, Who and How*, [Blog]. Available at: <https://haiilo.com/blog/internal-communications-ic-the-what-why-who-and-how/>. (Accessed: March 2021).

Maslach, C., Schaufeli, W.B. and Leiter, M.P. (2001) *Job burnout*, Annual review of psychology, Vol. 52(1), pp. 397-422.

May, D.R., Gilson, R.L. and Harter, L.M. (2004) *The psychological conditions of meaningfulness, safety, and availability, and the engagement of the human spirit at work*, Journal of occupational and organizational psychology, Vol. 77(1), pp. 11-37.

Mazzei, A. (2010) *Promoting active communication behaviours through internal communication*, Corporate Communications: An International Journal, Vol. 15(3), pp. 221-234.

Men, L. R. and Stacks, D. (2014) *The effects of authentic leadership on strategic*

internal communication and employee-organization relationships, Journal of public relations research, Vol. 26(4), pp. 301-324.

Men, L. R., O'Neil, J. and Ewing, M. (2020) *Examining the effects of internal social media usage on employee engagement*, Public Relations Review, Vol. 46(2), pp. 1-9.

Men, L. R., O'Neil, J. and Ewing, M. (2020) *From the employee perspective: Organizations' administration of internal social media and the relationship between social media engagement and relationship cultivation*, International Journal of Business Communication, Vol. 00(0), pp. 1-28.

Men, L.R. (2014) *Strategic internal communication: Transformational leadership, communication channels, and employee satisfaction*, Management communication quarterly, Vol. 28(2), pp. 264-284.

Men, L.R. (2015) *The internal communication role of the chief executive officer: Communication channels, style, and effectiveness*, Public Relations Review, Vol. 41(4), pp. 461-471.

Men, L.R. and Tsai, W.H.S. (2013) *Toward an integrated model of public engagement on corporate social networking sites: Antecedents, the process, and relational outcomes*, International Journal of Strategic Communication, Vol. 7(4), pp. 257-273.

Men, L.R., and Yue, C.A. (2019) *Creating a positive emotional culture: Effect of internal communication and impact on employee supportive behaviors*, Public relations review, Vol. 45(3), pp. 1-12.

Men, L.R., Neill, M. and Yue, C.A. (2020) *Examining the Effects of Symmetrical Internal Communication and Employee Engagement on Organizational Change Outcomes*, Public Relations Journal, Vol. 13(4), pp. 1-19.

Men, L.R., O'Neil, J. and Ewing, M. (2020a) *Examining the effects of internal social media usage on employee engagement*, Public Relations Review, Vol. 46(2), pp.1-9.

Men, L.R., O'Neil, J. and Ewing, M. (2020b) *From the Employee Perspective: Organizations' Administration of Internal Social Media and the Relationship between Social Media Engagement and Relationship Cultivation*, International Journal of Business Communication, pp.1-28.

Meng, J. and Berger, B.K. (2012) *Measuring return on investment (ROI) of organizations' internal communication efforts*, Journal of Communication Management, Vol. 16(4), pp. 332-354.

Meng, J. and Pan, P.L. (2012) *Using a balanced set of measures to focus on long-term competency in internal communication*, Public Relations Review, Vol. 38(3), pp. 484-

490.

Meyer, J.P. and Allen, N. J. (1991) *A three-component conceptualization of organizational commitment*, Human resource management review, Vol. 1(1), pp. 61-89.

Meyer, J.P., Stanley, D.J., Herscovitch, L. and Topolnytsky, L. (2002) *Affective, continuance, and normative commitment to the organization: A meta-analysis of antecedents, correlates, and consequences*, Journal of vocational behavior, Vol. 61(1), pp. 20-52.

Miles, S.J. and Mangold, W.G. (2014) *Employee voice: untapped resource or social media time bomb?*, Business Horizons, Vol. 57(3), pp. 401-411.

Mirabito, A.M. and Berry, L.L. (2015) *You say you want a revolution? Drawing on social movement theory to motivate transformative change*, Journal of Service Research, Vol. 18(3), pp. 336-350.

Mishra, K., Boynton, L. and Mishra, A. (2014) *Driving employee engagement: The expanded role of internal communications*, International Journal of Business Communication, Vol. 51(2), pp. 183-202.

Morey, R. (2018) *What Business Leaders Can Learn From 9 Successful CEO Bloggers*, [Blog]. Available at: <https://pagely.com/blog/business-leaders-ceo-bloggers/>. (Accessed: March 2021).

Morrow, P.C. (1983) *Concept redundancy in organizational research: The case of work commitment*, Academy of Management Review, Vol. 8(3), pp. 486-500.

Mrvar, A. and Batagelj, V. (2016) *Analysis and visualization of large networks with program package Pajek*, Complex Adaptive Systems Modeling, Vol. 4(1), pp. 1-8.

Mrvar, A. and Ljubljana, V.B. (2018). *Programs for analysis and visualization of very large networks reference manual*, Recuperado el, Vol. 12, pp. 1-112.

Muller, M., Ehrlich, K., Matthews, T., Perer, A., Ronen, I. and Guy, I. (2012) *Diversity among enterprise online communities: collaborating, teaming, and innovating through social media. Proceedings of the SIGCHI Conference on Human Factors in Computing Systems* (pp. 2815-2824). 2012.

Neill, M.S. (2018) *Change management communication: Barriers, strategies and messaging*, Public Relations Journal, Vol. 12(1), pp. 1-26.

Neill, M.S. and Jiang, H. (2017) *Functional silos, integration and encroachment in internal communication*, Public Relations Review, Vol. 43(4), pp. 850-862.

Neill, M.S. and Jiang, H. (2017) *Functional silos, integration and encroachment in*

- internal communication*, Public Relations Review, Vol. 43(4), pp. 850-862.
- Newman, D.A., Joseph, D.L. and Hulin, C.L. (2010) *Job attitudes and employee engagement: Considering the attitude “A-factor.”*, in Albrecht, S.L (ed.) *Handbook of employee engagement: Perspectives, issues, research, and practice*. 1st edition. Cheltenham: Edward Elgar Publishing Limited , pp. 43-61.
- Nikolić, M., Vukonjanski, J., Nedeljković, M., Hadžić, O. and Terek, E. (2013) *The impact of internal communication satisfaction dimensions on job satisfaction dimensions and the moderating role of LMX*, Public Relations Review, Vol. 39(5), pp. 563-565.
- Ojala, M. (2005) *Blogging: For knowledge sharing, management and dissemination*, Business information review, Vol. 22(4), pp. 269-276.
- Opitz, I. and Hinner, M.B. (2003) *Good internal communication increases productivity*, Freiburger Arbeitspapiere, Vol. 7, pp. 1-23.
- Otte, E. and Rousseau, R. (2002) *Social network analysis: a powerful strategy, also for the information sciences*, Journal of Information Science, Vol. 28(6), pp. 441-453.
- Ozkan, B.C. (2004) *Using NVivo to analyze qualitative classroom data on constructivist learning environments*, The qualitative report, Vol. 9(4), pp. 589-603.
- Pan, J. (2020) *Temporality alignment: how WeChat transforms government communication in Chinese cities*, Chinese Journal of Communication, Vol. 13(3), pp. 241-257.
- Papalexandris, N. and Galanaki, E. (2009) *Leadership's impact on employee engagement*, Leadership and Organization Development Journal, Vol. 30(4), pp. 365-385.
- Parent, J.D. and Lovelace, K.J. (2015) *The impact of employee engagement and a positive organizational culture on an individual's ability to adapt to organization change*. 2015 Eastern Academy of Management Proceedings: Organization Behavior and Theory Track, pp. 1-20. [Online]. Available at: https://scholarworks.merrimack.edu/mgt_facpub/10. (Accessed: April 2021).
- Patro, C.S. (2013) *The impact of employee engagement on organization's productivity*. *Proceedings of the 2nd International Conference on Managing Human Resources at the Workplace*. 13-14 December 2013.
- Pech, R. and Slade, B. (2006) *Employee disengagement: is there evidence of a growing problem?*, Handbook of Business Strategy, Vol. 7(1), pp. 21-25.
- Petrick, J.A. (2014) *Mapping research themes in communication: Semantic network*

analysis of papers from annual meetings of the international communication association, Doctoral Dissertation. Buffalo, State University of New York.

Pieterse-Landman, E. (2012) *The relationship between transformational leadership, employee engagement, job characteristics and intention to quit*, Doctoral Dissertation. Stellenbosch, Stellenbosch University.

Potoski, M., and Callery, P.J. (2018) *Peer communication improves environmental employee engagement programs: Evidence from a quasi-experimental field study*, Journal of Cleaner production, Vol. 172, pp. 1486-1500.

Pouramini, Z. and Fayyazi, M. (2015) *The relationship between positive organizational behavior with job satisfaction, organizational citizenship behavior, and employee engagement*, International Business Research, Vol. 8(9), p. 57.

Quirke, B. (2017) *Making the connections: Using internal communication to turn strategy into action*. 2nd edition. London: Routledge.

Ram, P. and Prabhakar, G.V. (2011) *The role of employee engagement in work-related outcomes*, Interdisciplinary Journal of Research in Business, Vol. 1(3), pp. 47-61.

Rana, S., Ardichvili, A. and Tkachenko, O. (2014) *A theoretical model of the antecedents and outcomes of employee engagement*, Journal of Workplace Learning, Vol. 26(3/4), pp. 249-266.

Rao, V. (2016) *Innovation through employee engagement*, Asia Pacific Journal of Advanced Business and Social Studies, Vol. 2(2), pp. 337-345.

Reichers, A.E. (1985) *A review and reconceptualization of organizational commitment*, Academy of management review, Vol. 10(3), pp. 465-476.

Rhoades, L. and Eisenberger, R. (2002) *Perceived organizational support: a review of the literature*, Journal of applied psychology, Vol. 87(4), p. 698.

Richards, L. (1999) *Data alive! The thinking behind NVivo*, Qualitative health research, Vol. 9(3), pp. 412-428.

Robertson, B.W. and Kee, K.F. (2017) *Social media at work: The roles of job satisfaction, employment status, and Facebook use with co-workers*, Computers in Human Behavior, Vol. 70, pp. 191-196.

Robison, J. (2012) *Boosting engagement at Stryker*, Gallup Management Journal, Vol. 1(1), pp. 1-5.

Robson, P.J. and Tourish, D. (2005) *Managing internal communication: an organizational case study*, Corporate Communications: An International Journal, Vol. 10(3), pp. 213-222.

- Rockinson-Szapkiw, A.J. (2012) *Investigating uses and perceptions of an online collaborative workspace for the dissertation process*, Research in Learning Technology, Vol. 20(3), pp. 267- 282.
- Ruck, K. and Welch, M. (2012) *Valuing internal communication; management and employee perspectives*, Public Relations Review, Vol. 38(2), pp. 294-302.
- Ruck, K., Welch, M. and Menara, B. (2017) *Employee voice: an antecedent to organisational engagement?*, Public Relations Review, Vol. 43(5), pp. 904-914.
- Saks, A.M. (2006) *Antecedents and consequences of employee engagement*. Journal of managerial psychology, Vol. 21(7), pp. 600-619.
- Salancik, G.R. (1977) *Commitment is too easy!*, Organizational Dynamics, Vol. 6(1), pp. 62-80.
- Saleem, S., Feng, Y. and Luqman, A. (2021) *Excessive SNS use at work, technological conflicts and employee performance: A social-cognitive-behavioral perspective*, Technology in Society, Vol. 65, pp. 1-11.
- Sanchez-Hernandez, I. and Grayson, D. (2012), *Internal marketing for engaging employees on the corporate responsibility journey*, Intangible Capital, Vol. 8(2), pp. 275-307.
- Scharf, E.R., Gomes, G. and Huck, N.K. (2020) *Internal marketing in Brazilian credite cooperative*, REMark, Vol. 19(4), pp. 809-837.
- Schaufeli, W.B. (2013) *What is engagement*, Employee engagement in theory and practice, Vol. 15, p. 321.
- Schaufeli, W.B. and Bakker, A.B. (2004) *Job demands, job resources, and their relationship with burnout and engagement: A multi-sample study*, Journal of Organizational Behavior, The International Journal of Industrial, Occupational and Organizational Psychology and Behavior, Vol. 25(3), pp. 293-315.
- Schaufeli, W.B., Salanova, M., González-Romá, V. and Bakker, A.B. (2002) *The measurement of engagement and burnout: A two sample confirmatory factor analytic approach*, Journal of Happiness Studies, Vol. 3(1), pp. 71-92.
- Schaufeli, W.B., Taris, T.W. and Van Rhenen, W. (2008) *Workaholism, burnout, and work engagement: Three of a kind or three different kinds of employee well-being?*, Applied psychology, Vol. 57(2), pp. 173-203.
- Scholl, R.W. (1981) *Differentiating organizational commitment from expectancy as a motivating force*, Academy of Management Review, Vol. 6(4), pp. 589-599.
- Schulz-Knappe, C., Koch, T. and Beckert, J. (2019) *The importance of communicating*

change: Identifying predictors for support and resistance toward organizational change processes, Corporate Communications: An International Journal, Vol. 24(4), pp. 670-685.

Scott, J. (1988) *Trend report social network analysis*, Sociology, Vol. 22(1), pp. 109-127.

Scott, P.B. (2012) *How is the study of communication changing?*, Corporate Communications: An International Journal, Vol. 17(3), pp. 350-357.

Sharma, A. and Bhatnagar, J. (2016) *Enterprise social media at work: web-based solutions for employee engagement*, Human Resource Management International Digest, Vol. 24(7), pp. 16-19.

Shen, H. and Jiang, H. (2019) *Engaged at work? An employee engagement model in public relation.*, Journal of Public Relations Research, Vol. 31(1-2), pp. 32-49.

Shore, L.M., Tetrick, L.E., Taylor, M.S., Jaqueline, A.M., Liden, R.C., Parks, J.M. ... and Van Dyne, L. (2004) *The employee-organization relationship: A timely concept in a period of transition*, Research in personnel and human resources management, Emerald Group Publishing Limited, Bingley, Vol. 23, pp. 291-370.

Shuck, B. and Wollard, K. (2010) *Employee engagement and HRD: A seminal review of the foundations*, Human resource development review, Vol. 9(1), pp. 89-110.

Sievert, H. and Scholz, C. (2017) *Engaging employees in (at least partly) disengaged companies. Results of an interview survey within about 500 German corporations on the growing importance of digital engagement via internal social media*, Public relations review, Vol 3(5), pp 94-903.

Sinčić, D. and Pološki Vokić, N. (2007) *Integrating internal communications, human resource management and marketing concepts into the new internal marketing philosophy*, EFZG working paper series, Vol. 12, pp. 1-13.

Skeels, M.M. and Grudin, J. (2009) *When social networks cross boundaries: a case study of workplace use of Facebook and LinkedIn. Proceedings of the ACM 2009 international conference on Supporting group work* (pp. 95-104). ACM Press. 2009.

Slabbert, Y. (2016) *A new conceptual framework to strengthen internal corporate image: A stakeholder-inclusive perspective*, Communication, Vol. 42(2), pp. 253-275.

Smith, A.D. and Rupp, W.T. (2002) *Communication and loyalty among knowledge workers: a resource of the firm theory view*, Journal of knowledge management, Vol. 6(3), pp. 250-261.

Smith, C. and Wiid, J.A. (2019) *The characteristics of e-newsletters in predicting*

- higher education institution employees' usage*, *Communitas*, Vol. 24, pp. 1-17.
- Smith, G. (2005) *Communication skills are critical for internal auditors*, *Managerial Auditing Journal*, Vol. 20(5), pp. 513-519.
- Sohail, M.S. (2018) *The impact of internal marketing on employee job satisfaction and customer satisfaction: empirical evidence from restaurant industry of Saudi Arabia*, *Middle East Journal of Management*, Vol. 5(4), pp. 321-339.
- Staw, B.M. and Fox, F.V. (1977) *Escalation: The determinants of commitment to a chosen course of action*, *Human Relations*, Vol. 30(5), pp. 431-450.
- Steinfeld, C., DiMicco, J.M., Ellison, N.B. and Lampe, C. (2009) *Bowling online: social networking and social capital within the organization. Proceedings of the fourth international conference on Communities and technologies* (pp. 245-254). ACM, New York. 2009.
- Stevens, G.R. and McElhill, J. (2000) *A qualitative study and model of the use of e-mail in organisations*, *Internet Research*, Vol. 10(4), pp. 271-283.
- Suh, J., Harrington, J. and Goodman, D. (2018) *Understanding the link between organizational communication and innovation: An examination of public, nonprofit, and for-profit organizations in South Korea*, *Public Personnel Management*, Vol. 47(2), pp. 217-244.
- Sun, L. and Bunchapattanasakda, C. (2019) *Employee engagement: A literature review*, *International Journal of Human Resource Studies*, Vol. 9(1), pp. 63-80.
- Sun, Y., Liu, Y., Zhang, J.Z., Fu, J., Hu, F., Xiang, Y. and Sun, Q. (2021) *Dark side of enterprise social media usage: A literature review from the conflict-based perspective*, *International Journal of Information Management*, Vol. 61, pp. 1-19.
- Sun, Y., Zhou, X., Jeyaraj, A., Shang, R.A. and Hu, F. (2019) *The impact of enterprise social media platforms on knowledge sharing: An affordance lens perspective*, *Journal of Enterprise Information Management*, Vol. 32(2), pp. 233-250.
- Suomi, K., Saraniemi, S., Vähätalo, M., Kallio, T.J. and Tevameri, T. (2021) *Employee engagement and internal branding: two sides of the same coin?*, *Corporate Reputation Review*, Vol. 24(1), pp. 48-63.
- Tepayakul, R. and Rinthaisong, I. (2018) *Job satisfaction and employee engagement among human resources staff of Thai private higher education institutions*, *The Journal of Behavioral Science*, Vol. 13(2), pp. 68-81.
- Theaker, A. (2020) *The public relations handbook*. 6th edition. Oxon: Routledge.
- Thelen, P.D. and Men, L.R. (2020) *Commentary: The Role of Internal Communication*

in Fostering Employee Advocacy: An Exploratory Study, International Journal of Business Communication, pp. 1-14.

Thompson, P. (2011) *Social networking sites and content communities: Similarities, differences, and affordances for learning*, In Proceedings, Vol. 2, pp. 8-12.

Tierney, M.L. and Drury, J. (2013) *Continuously improving innovation management through enterprise social media*, Journal of Social Media for Organizations, Vol. 1(1), pp. 1-16.

Tirabeni, L. and Soderquist, K.E. (2019) *Connecting the dots: Framing employee-driven innovation in open innovation contexts*, International Journal of Innovation and Technology Management, Vol. 16(04), pp. 1-27.

Tiwari, B. and Lenka, U. (2020) *Employee engagement: A study of survivors in Indian IT/ITES sector*. IIMB Management Review, Vol. 32(3), pp. 249-266.

Togna, G. (2014) *Does internal communication to generate trust always increase commitment? A study at Micron Technology*, Corporate Communications: An International Journal, Vol. 19(1), pp. 64-81.

Towers Watson Wyatt Worldwide. (2010). *Communication ROI study report 2009–2010. Capitalizing on effective communication: How courage, innovation, and discipline drive business results in challenging times*, Watson Wyatt Worldwide, San Diego.

Treem, J.W. and Leonardi, P.M. (2013) *Social media use in organizations: Exploring the affordances of visibility, editability, persistence, and association*, Annals of the International Communication Association, Vol 6(1), pp. 143-189.

Truss, K., Soane, E., Edwards, C.Y.L., Wisdom, K., Croll, A. and Burnett, J. (2006) *Working life: Employee attitudes and engagement 2006*, Chartered Institute of Personnel and Development.

Tse, D.C., Lau, V.W.Y., Perlman, R. and McLaughlin, M. (2020) *The development and validation of the autotelic personality questionnaire*, Journal of personality assessment, Vol. 102(1), pp. 88-101.

Tsui, A. and Wang, D. (2002) *Employment relationships from the employer's perspective: Current research and future directions*, International review of industrial and organizational psychology, Vol. 17, pp. 77-114.

Tufail, M., Zia, Y.A., Khan, S. and Irfan, M. (2012) *A Glance at Organizational Commitment, Antecedents and Consequences (1960-2005)*, Journal of Managerial Sciences, Vol. 6(1), pp.73-91.

- Turel, O., Serenko, A. and Bontis, N. (2011) *Family and work-related consequences of addiction to organizational pervasive technologies*, Information & Management, Vol. 48(2-3), pp. 88-95.
- Türkel, S., Uzunoğlu, E. and Kip, S.M. (2020) *Shared meaning at the intersection of NPO reputation and trust: a personification perspective*, Corporate Communications: An International Journal, Vol. 26(1), pp. 124-142.
- Ulus, M. and Hatipoglu, B. (2016) *Human aspect as a critical factor for organization sustainability in the tourism industry*. Sustainability, Vol. 8, pp. 232. 1-18.
- Verčič, A. T. and Špoljarić, A. (2020) *Managing internal communication: How the choice of channels affects internal communication satisfaction*, Public relations review, Vol. 46(3), pp. 1-7.
- Verčič, A.T. and Vokić, N.P. (2017) *Engaging employees through internal communication*, Public Relations Review, Vol. 43(5), pp. 885-893.
- Verčič, A.T., Verčič, D. and Sriramesh, K. (2012) *Internal communication: Definition, parameters, and the future*, Public relations review, Vol. 38(2), pp. 223-230.
- Vitak, J., Lampe, C., Gray, R. and Ellison, N.B. (2012) *Why won't you be my Facebook friend? strategies for managing context collapse in the workplace. Proceedings of the 7th Annual iConference* (pp. 555-557). Ontario, Canada. 2012.
- Vorina, A., Simonič, M. and Vlasova, M. (2017) *An analysis of the relationship between job satisfaction and employee engagement*, Economic themes, Vol. 55(2), pp. 243-262.
- Walden, J. (2018) *Guiding the conversation: A study of PR practitioner expectations for nonnominated employees' social media use*, Corporate Communications: An International Journal, Vol. 23(3), pp. 423-437.
- Walden, J., Jung, E. H. and Westerman, C.Y. (2017) *Employee communication, job engagement, and organizational commitment: A study of members of the Millennial Generation*, Journal of Public Relations Research, Vol. 29(2-3), pp. 73-89.
- Wambeke, B.W., Liu, M. and Hsiang, S.M. (2012) *Using Pajek and centrality analysis to identify a social network of construction trades*, Journal of construction engineering and management, Vol. 138(10), pp. 1192-1201.
- Wang, C., Xu, J., Zhang, T.C. and Li, Q.M. (2020) *Effects of professional identity on turnover intention in China's hotel employees: The mediating role of employee engagement and job satisfaction*, Journal of Hospitality and Tourism Management, Vol. 45, pp. 10-22.

- Wang, Y. (2022) *When relationships meet situations: Exploring the antecedents of employee communication behaviors on social media*, *Social science computer review*, Vol. 40(1), pp. 77-94.
- Wang, Y. and Kobsa, A. (2009) *Privacy in online social networking at workplace. Proceedings of the 2009 International Conference on Computational Science and Engineering* (Vol. 4, pp. 975-978). IEEE. 2009.
- Wanigasinghe, N. (2019) *How Disconnected is Disconnection?: A Critical Analysis of the Employee Right to Disconnect. Proceedings of 12th International Research Conference*. KDU. 2019.
- Ward, T. *Beehive builds buzz at IBM*, [Blog]. Available at: <https://www.prescientdigital.com/articles/intranet-articles/beehive-builds-buzz-at-ibm>. (Accessed: March 2021).
- Weber, M.S. and Shi, W. (2017) *Enterprise social media*, *The international encyclopedia of organizational communication*, pp. 1-9.
- Welch, M. (2011) *The evolution of the employee engagement concept: communication implications*, *Corporate Communications: An International Journal*, Vol. 16(4), pp. 328-346.
- Welch, M. (2012) *Appropriateness and acceptability: Employee perspectives of internal communication*, *Public Relations Review*, Vol. 38(2), pp. 246-254.
- Welch, M. (2013) *Mastering internal communication: Knowledge foundations and postgraduate education*, *Public Relations Review*, Vol. 39(5), pp. 615-617.
- Welch, M. (2015) *Internal communication education: a historical study*, *Journal of Communication Management.*, Vol. 19(4), pp. 388-405.
- Welch, M. and Jackson, P.R. (2007) *Rethinking internal communication: a stakeholder approach*, *Corporate communications: An international journal*, Vol. 12(2), pp. 177-198.
- Wiener, Y. (1982) *Commitment in organizations: A normative view*, *Academy of management review*, Vol. 7(3), pp. 418-428.
- Wright, D.K. (1995) *The role of corporate public relations executives in the future of employee communications*, *Public relations review*, Vol. 21(3), pp. 181-198.
- Yahaya, R. and Ebrahim, F. (2016) *Leadership styles and organizational commitment: literature review*, *Journal of Management Development*, Vol. 35(2), pp. 190-216.
- Yates, K. (2006) *Internal communication effectiveness enhances bottom-line results*, *Journal of Organizational Excellence*, Vol. 25(3), pp. 71-79.

- Young, A.M. and Hinesly, M.D. (2014) *Social media use to enhance internal communication: Course design for business students*, Business and Professional Communication Quarterly, Vol. 77(4), pp. 426-439.
- Young, H.R., Glerum, D.R., Wang, W. and Joseph, D.L. (2018) *Who are the most engaged at work? A meta-analysis of personality and employee engagement*, Journal of Organizational Behavior, Vol. 39(10), pp. 1330-1346.
- Yu, L., Cao, X., Liu, Z. and Wang, J. (2018) *Excessive social media use at work: Exploring the effects of social media overload on job performance*, Information technology & people, Vol. 31(6), pp. 1091-1112.
- Yue, C.A., Men, L.R. and Ferguson, M.A. (2021) *Examining the effects of internal communication and emotional culture on employees' organizational identification*, International Journal of Business Communication, Vol. 58(2), pp. 169-195.
- Zhang, S., Zhao, L., Lu, Y. and Yang, J. (2016) *Do you get tired of socializing? An empirical explanation of discontinuous usage behaviour in social network services*, Information & Management, Vol. 53(7), pp. 904-914.
- Zhang, X., Ding, X. and Ma, L. (2022) *The influences of information overload and social overload on intention to switch in social media*, Behaviour & Information Technology, Vol. 41(2), pp. 228-241.
- Zheng, X. and Lee, M.K. (2016) *Excessive use of mobile social networking sites: Negative consequences on individuals*, Computers in Human Behavior, Vol. 65, pp. 65-76.
- Zheng, Y. (2009). *Internal Communication from a Managerial Perspective*, Bachelor's Thesis. Halmstad, Halmstad University, School of Social Health & Sciences Media & Communication Studies.