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RELATIONSHIP OF KNOWLEDGE MANAGEMENT CAPABILITIES, INTERGROUP CONTACT, AND INTERGROUP BIAS AMONG PRINT NEWS JOURNALISTS

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FLOYD SANDERS

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Doctoral Director:
Gene Roth

ProQuest LLC.
789 East Eisenhower Parkway
P.O. Box 1346
Ann Arbor, MI 48106 - 1346

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DEDICATION

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CHAPTER 1

INTRODUCTION

The information explosion has made the impact of sharing, codifying and integrating knowledge an important area of study in recent years. It has also helped to create what is referred to as Knowledge Management (KM), a phenomenon that has become a priority for many organizations (Eraut, 2000). Organizations endeavor to utilize knowledge to increase profitability by recognizing assets that were previously unacknowledged. These existing and unknown employee knowledge assets are comprised and hidden in beliefs, attitudes, and values. KM is primarily concerned with structuring these knowledge assets in such a way that they feed back into the organization and provides profitability. Gold, Malhotra, and Segars (2001) found that executing KM effectively involves certain capabilities. They posit that an organization's KM process and infrastructure capabilities are critical to KM effectiveness.

As KM is concerned with structuring knowledge assets to feed back into an organization, KM capabilities describe the infrastructure and procedures that allow KM to take place. The following is an example using the corporation *Yahoo* to illustrate the distinction between KM and its capabilities. If KM was *Yahoo*, then the ability to use and access computers, routers, I.P. addresses, e-mail addresses, check e-mail, send e-mail, and maintain a record of e-mails in a folder for future use might

be considered some of the characteristics of KM's infrastructure and process capabilities. Keeping with the *Yahoo* theme, most use *Yahoo* for email and to read its aggregated news content. But could *Yahoo* provide benefits of which users are unaware? For many organizations developing KM capabilities, few have examined their specific implications and usefulness outside of the usual main KM objective. For instance, while most KM initiatives focus on profitability, developing KM capabilities might have an impact on an organization's culture. Because KM is closely aligned with culture as a company's KM capabilities improve, a need emerges to better understand how these improvements might affect company culture.

One aspect of a company's culture can be measured in part by the level of intergroup bias exhibited by its employees. Intergroup bias describes workers' tendency to view their work group more positively than other groups in the organization (Hewstone, Rubin, & Willis, 2002). Hewstone et al. found that increasing intergroup contact has a negative relationship with intergroup bias, thereby decreasing it. Intergroup contact is described as contact with those considered to be outside one's own group. This study seeks to examine how media workers' perceptions of their organization's KM capabilities are related to the perceived level of intergroup contact as well as their perception of intergroup bias.

Background

Knowledge Management (KM) refers to the infrastructure and processes within an organization (Gold et al., 2001) that enable it to integrate, acquire, create,

store, share, diffuse, develop, and deploy knowledge (Rastogi, 2000). Zheng, Yang, and McLean (2009) note that the positive outcomes resulting from KM are widely acknowledged and that an organization's cultural dynamics have a major impact on those positive outcomes. Gold, Malhotra, and Segars (2001) posit that knowledge infrastructure and knowledge process capabilities provide for effective KM and an excellent way to manage organizational culture and stress. The Zheng et al. (2009) study is based on the assumption that an organization's cultural dynamics must be addressed for successful KM, and that effective KM is based on the degree to which it allows an organization to realize its goals. The Gold et al. (2001) study focused heavily on indentifying what KM capabilities best enable an organization to achieve such goals. These studies and others found that an organization's cultural dynamics strongly influence KM outcomes. Some organizations may have a culture suitable for developing Gold et al.'s (2001) infrastructure and process KM capabilities, whereas the cultural dynamics of other organizations may evolve as their KM capabilities develop.

Research indicates that culture is a major component of KM, but few researchers have investigated the impact KM capabilities have on the organization's cultural dynamics as KM initiatives develop. Because the nature of KM is to generate information that flows across organizational channels as opposed to from top to bottom, many organizations may undergo a cultural transformation. Furthermore, research suggests that members of groups within an organization will interact more as the organization develops KM capabilities (Burk, 1999). Burk

(1999) suggests that KM's collaborative approach provides an organization with the opportunity to improve the efficiency, effectiveness, and timeliness of sharing while emphasizing community. KM supplies organizations with an apparatus that emphasizes sharing and community, the implications of which have not been widely investigated. That sense of community is developed as a result of increased levels of contact resulting from developing capabilities associated with KM. The result should decrease the level of bias commonly found among workers in an organization. Considering that intergroup bias can hinder an organization's performance (Filak, 2004), this study will analyze the impact KM capabilities have on both intergroup contact and intergroup bias.

According to Burk (1999), only about 20 percent of KM is attributable to databases and networks, whereas nearly 80 percent involves creating an environment for sharing and exchange. Sharing and exchange is a major focus of the infrastructure and process capabilities associated with KM. Many studies have examined the infrastructure and processes associated with KM and have validated that they result in increased sharing among group members within an organization. For example, Gupta (2010) posits that KM leads to peer-to-peer collaboration. Additionally, Lee and Kim (2005) assert that KM has a positive impact on knowledge sharing for those working in the private sector. These studies indicate positive effects associated with sharing within organizations. A meta-analysis of more than 500 studies by Pettigrew and Troop (2006) indicates that intergroup contact may reduce intergroup bias in three major ways: (a) by enhancing knowledge

about out-groups, (b) by reducing anxiety about future contact with out-groups, (c) and by increasing empathy and perspective taking.

To the extent that a large percentage of developing KM capabilities focuses on creating an environment for sharing and exchange, the influence these capabilities have on an organization's cultural dynamics warrants investigation. The theoretical basis for this investigation will be intergroup contact theory, which posits that intergroup contact may reduce intergroup bias (Allport, 1954). The infrastructure and process capabilities associated with KM positively influences intergroup contact. Allport posits that intergroup contact will lead to cohesion between group members (1954). The print news media is an industry undergoing changes that have led to high levels of intergroup bias. This change is referred to as "media convergence," which, briefly described, is the reshaping of the print news work environment in order to distribute news content via multiple media platforms. Print media organizations and companies are beginning to develop KM capabilities. The impact these capabilities have on print journalists' level of intergroup contact and intergroup bias is the focus of this study.

Research Problem

Media convergence can be defined as news organizations' creation of different versions of their news product for different platforms. This product may include web, print, broadcast, radio, text, and magazine platforms. Filak (2004)

explains that news organizations are in need of new ways to deal with cultural conflicts that reside within today's media working environment.

Intergroup bias, a specific type of cultural conflict, exists in organizations that have distinct groups of workers – such as print news organizations. If newsrooms encourage staff to work together they are more apt to be open, collaborative, and innovative organizations (Filak, 2004). However, most newsrooms suffer from a culture that has historically been closed and workers who are clustered based on their similar job titles (Dailey, Demo, & Spillman, 2005). Media organizations' attempts to shift into a converged model are creating problems of intergroup bias among employees. Research indicates that intergroup bias in converged newsrooms grows as a result of respective medium platform group members working together for the first time (Filak, 2004). Some studies indicate that this bias may decrease over time. However, little is known about the relationships between KM and intergroup bias. Given the growth of KM initiatives in media organizations, a better understanding of how intergroup contact might mediate a relationship between KMC and Intergroup Bias is needed.

Purpose of this Study

The purpose of this study is to examine how KM capabilities are related to intergroup contact and intergroup bias. This study will focus on the level of intergroup bias exhibited by journalists who work in the print news media towards those who work in online or broadcast news. Research indicates that KM

capabilities might reduce the level of intergroup bias among employees of an organization by increasing intergroup contact. This study will analyze the impact KM capabilities have on print journalists, who according to past studies are uniquely influenced by intergroup bias.

Research Questions

The following research questions were derived for this study based on the existing literature:

RQ1: What is the relationship between print journalists' perception of their organization's (KM) capabilities and their perceived level of contact with online and broadcast news journalists?

RQ2: What is the relationship between print journalists' perception of their organization's (KM) capabilities and their perceived level of intergroup bias towards online and broadcast news journalists?

RQ3: What is the relationship between print journalists' perceived level of intergroup contact and perceived level of intergroup bias towards online or broadcast news journalists?

RQ4: Does perceived intergroup contact with online and broadcast journalists mediate the relationship between perceived knowledge management capabilities and perceptions of intergroup bias?

Rationale and Significance

Considering Burk's (1999) view that KM works with and not against an organization's culture, this study will explore how KM works with two significant cultural factors: intergroup contact and intergroup bias. The study is particularly significant for organizations with high levels of intergroup bias and cultural conflict, such as those found among journalists working in the print news media. Furthermore, the study provides insight for organizations looking for ways to use KM to positively influence cultural development and combat cultural conflict. In terms of organizational learning, this study expands Liao's (2009) findings that KM positively affects organization learning in part because both are impacted by an organization's culture (Zheng, 2005). Although KM's effects on organizational performance through organization learning are not the primary foci of this study, support for such relationships have been established by other research (2009).

Hypotheses

Gold et al. (2001) found that KM is positively influenced by an organization's KM infrastructure capabilities and process capabilities. These capabilities enable the use of an organization's technology and structure for the acquisition and conversion of knowledge. Both infrastructural and process capabilities are designed to produce high levels of sharing and employee interaction. Burk (1999) believes that "successful KM programs work with organizational cultures and behaviors, not against them" (np). The study suggests that some

business leaders have adopted the term "knowledge-sharing" to de-emphasize KM as a new objective, and emphasize its need to align with and influence an organization's existing culture (Burk, 1999). Furthermore, Lee and Kim (2005), Gupta (2010), and Burk (1999) also found that KM or "knowledge-sharing" will increase intergroup contact. As converged print newsrooms develop more KM infrastructure capabilities and process capabilities, journalists are being influenced. Based on the existing literature, the following hypotheses were generated in support of this study. Hypotheses 1 and 2 suggest a positive relationship between KM and intergroup contact and were devised in support of research question 1:

H1: There is a positive relationship between print journalists' perception of their organization's KM capabilities and the level of intergroup contact with journalists working in online news.

H2: There is a positive relationship between print journalists' perception of their organization's KM capabilities and the level of intergroup contact with journalists working in broadcast news.

Research indicates that the properties of KM infrastructure and process capabilities can provide a barrier to intergroup bias. Thus it is hypothesized that the higher print journalists rate their organization's level of KM infrastructure and process capabilities, the lower level of intergroup bias they will exhibit towards those who work outside their group. For example, print news workers will exhibit lower levels of bias towards Internet or broadcast workers. This idea was used to develop

the hypotheses below. Hypotheses 3 and 4 suggest a negative relationship between KM and intergroup bias and were devised in support of research question 2.

H3: There is a negative relationship between print journalists' perceptions of their organization's KM capabilities and the perceived level of intergroup bias towards journalists working in online news.

H4: There is a negative relationship between print journalists' perceptions of their organization's KM capabilities and the perceived level of intergroup bias towards journalists working in broadcast news.

Research supports the notion that a strong relationship exists between an organization's KM structural and process capabilities and its level of employee sharing. Studies indicate a positive relationship between KM effectiveness and sharing within an organization. As stated, Burk (1999) suggests that 80 percent of KM activities are designed to build a community of sharing. Gold et al. (2001) suggest that knowledge infrastructural and procedural capabilities provide the web for sharing and other activities associated with KM. Hypothesis 3 and 4 below are based on the idea that KM infrastructure and process capabilities also create conditions consistent with intergroup contact (Allport, 1954). The resulting intergroup contact will mediate a negative relationship with intergroup bias (Sherif, 1958), thus providing a model that is fit for decreasing intergroup bias. Hypotheses 5, 6 and 7 suggest a negative and mediating relationship between intergroup contact and intergroup bias and were devised in support of research questions 3 and 4.

H5: There is a negative relationship between print journalists' perceived level of intergroup contact and perceived intergroup bias towards online journalists.

H6: There is a negative relationship between print journalists' perceived level of intergroup contact and perceived intergroup bias towards broadcast journalists.

H7: The negative relationship between perceived KM Capabilities and perceived intergroup bias will be mediated by intergroup contact.

Sherif (1968) posits that intergroup contact decreases the levels of intergroup bias. Therefore, if KM infrastructure and process capabilities increase levels of intergroup contact within an organization, the increased levels of contact should decrease levels of intergroup bias. A summary of both hypotheses is represented in Figure 1, which represents the hypothesized relationship between an organization's KM infrastructure and process capabilities and its level of intergroup contact. As these KM capabilities increased intergroup contact (Lee & Kim, 2005; Gupta, 2010; Burk, 1999), research indicates that that contact should decrease the level of intergroup bias (Sherif, 1958).

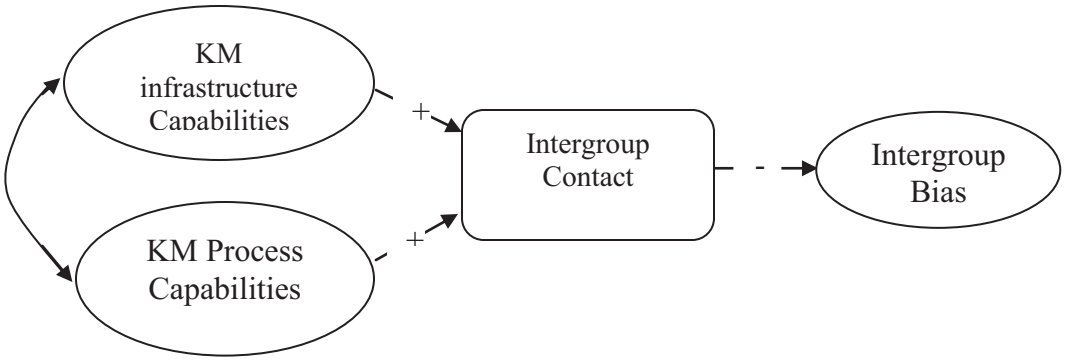

Figure 1. Hypothesized model.

Definitions

This study contains three major concepts: knowledge management capabilities, intergroup bias, and intergroup contact. Definitions of these concepts and others associated with this study are located in the following paragraphs.

Knowledge is defined as a fluid mix of information framed by experiences, values, context, and expert insight (Davenport & Prusak, 1998). For the purpose of this study it is interpreted as a journalist's know-how, experiences, skills, and trade-secrets.

Knowledge management capabilities (KM capabilities) refers to both an organization's infrastructure capabilities and process capabilities (Gold, Malhotra, & Segars, 2004) that enable it to integrate, acquire, create, store, share, diffuse, develop, and deploy knowledge (Rastogi, 2000). The concept of infrastructure capabilities has three dimensions: technology, structure, and culture. The technology dimension refers to the use of technology to allow for knowledge to be discovered, tracked, mapped, disseminated, and stored. The structure dimension refers to a

workflow design that promotes and rewards employees who participate in KM activities. The cultural dimension describes the extent to which an organization's culture formally and informally encourages employee participation.

Process capabilities refer to activities that are specifically designed to collect knowledge that is used to redesign practices and procedures in the organization. It is based on the idea that employee collaboration leads to the creation of knowledge and that knowledge should be collected. After the knowledge is collected it is applied and used to alter the way the organization operates.

Intergroup Contact refers to contact that reduces prejudice and discrimination between group members based on the premise that as members work together they find cohesion (Allport, 1954).

Intergroup bias is a tendency to evaluate one's own membership group (the "in-group") or its members more favorably than a non-membership group (Hewstone, Rubin, & Willis, 2002).

Print news journalist is a journalist who works for a print newspaper organization with duties not limited to but commonly assigned in a print news organization.

A *group***,** for the purposes of this study, is made up of journalists with duties not limited to but commonly assigned in one of the following three work categories of the news business; print, broadcast, and online.

Summary

Practitioners and researchers are seeking to better understand how KM capabilities affect employee dynamics. This study is based on the premise that KM infrastructure and process capabilities interact with an organization's culture (Burk, 1999). The purpose of this study is to investigate relationships between KM capabilities and two specific components of organization culture, "intergroup contact" and "intergroup bias." Data will be gathered from journalists working in the print news media as a means to examine these two components. This study provides insight into how knowledge management may serve as a tool for building cohesiveness between groups of workers in an organization. It builds on other quantitative and anecdotal material by introducing KM as an influential element in analyzing the cultural environment associated with convergence in the news media. The next chapter is a review of the literature related to the variables analyzed in the study. The purpose of the literature review is to explore the impact of KM on the ongoing development of convergence.

CHAPTER 2

LITERATURE REVIEW

The hypotheses in Chapter 1 involve five key concepts: (1) knowledge management, (2) knowledge management capabilities, (3) intergroup contact, (4) intergroup bias, and (5) media convergence. This chapter will examine relevant literature and explore relationships among these concepts. The literature review is organized to explain and show the relationship among the ideas in this way: (a) key concepts of knowledge management are explained, (b) KM infrastructure capabilities and process capabilities are explained, (c) intergroup contact theory is explained, (d) how KM capabilities and Intergroup contact are related is explained, (e) intergroup bias is explained, (f) whether intergroup bias is decreased by intergroup contact is explored, (g) and finally, because the intergroup bias for the population of this study, print journalists, is brought on by media convergence, media convergence is explained along with its recent history with intergroup bias and KM.

Knowledge Management

Knowledge explains the way people behave on both a personal and organizational level (Nonaka & Takeuchi, 1995). The following paragraphs will review the literature on KM by providing a general explanation of KM, describing some of the challenges, and explaining what KM involves.

What is KM?

Based on a survey of KM practitioners, KM is defined as a system of practices in an organization that aims to create an environment that fosters value adding knowledge (KM in Practice survey, 2009, np). Rastogi (2000) describes it as a coordinated organization-wide integrated system of activities to acquire, create, store, share, diffuse, develop, and deploy knowledge from individuals and groups in pursuit of major organizational goals (p. 40). The goal of KM is to create new knowledge through a system that codes, shares, and integrates both tacit and explicit knowledge (Nonaka, 1991). What makes KM different from information management is the goal to create and redistribute new knowledge. The *KM in Practice* survey introduction page indicates that the ultimate aim is to increase individual effectiveness and corporate competitiveness and performance (2009, np). The site also lists a number of technologies used in the execution of KM. They include:

- *Intranet* infrastructures providing basic functionality for communication, as well as, for storing, exchanging, searching and retrieving of data and documents
- *Document and content management systems* handling electronic documents or Web content respectively
- *Workflow management systems* supporting the execution of well defined workflows
- *Artificial intelligence technologies* supporting search and retrieval of distributed knowledge, user profile management, text and Web mining
- *Business intelligence* tools and *data warehouses*, supporting the transformation of fragmented organizational and competitive data into goal-oriented information
- *Visualization tools* assisting the relationships between knowledge, people and processes
- *Groupware tools* supporting time management, discussions, meetings or creative workshops for work groups and teams

- *E-learning systems E-learning systems* supporting the teaching and/or learning process, by offering learning opportunities to employees in an interactive way (KM in Practice Survey, 2009, np).

A growing body of research indicates that companies that successfully create knowledge gain a competitive advantage. Drucker (1991) argues that knowledge is the only meaningful resource that provides a competitive edge and the highest quality of organizational power. Leaders of organizations are becoming aware of the influence knowledge can have on organizational environment and performance. This awareness has produced a desire to utilize these assets in the most constructive way, and the concept of Knowledge Management has emerged from this desire.

KM seeks to utilize vital informational assets of an organization by constructing a plan that synthesizes mechanisms that make up the organization. These mechanisms include employer-employee relations, customer relations, business processes, and technology. As these mechanisms are analyzed, they are better digested into a working model for synergy within a company. Consequently, a higher level of business performance takes place. An organization's desire to be "knowledge intensive" is one that is born of the proposition that knowledge is the main source of competitive advantage, and knowledge is greater than the advantages attributed to physical or financial contributions (Starbuck, 1992). Because the knowledge of workers constantly changes, a KM system provides for adaptation and flexibility (Malhotra, 2007).

Defining exactly who and what determines whether an idea can be classified as knowledge is contested in the literature. One researcher summed it up this way:

"to engage in knowledge management there is a need for knowledge about knowledge" (Christiansen, 2003). Knowledge needs to be defined contextually with reference to the individual organization.

Once of the challenges of KM is that knowledge is not easily identifiable. Unfortunately, knowledge is not a concrete object that is simply manipulated into profitability. It is abstract, changing, and elusive. Davenport and Prusak (1998) define knowledge as a fluid mix of information framed by experiences, values, context, and expert insight. It is housed in the expertise and experiences of an organization's workers. Managing it requires systematic processes that retrieve, organize, and utilize the informational assets of workers. These information assets include both subjective knowledge and documented knowledge. Researchers refer to these KM management categories as tacit and explicit knowledge (Rowley, 1999). Tacit knowledge is highly personal and hard to formalize, based on subjective hunches and intuitions (Nonaka & Takeuchi, 1995). Explicit knowledge can be expressed in words, communicated as scientific formulas, codified procedures, and universal procedures. Whether it is a file cabinet or a company intranet, explicit knowledge is more commonly recorded and stored. Tacit knowledge resides in the experiences and thoughts of an organization's employees and customers. Tacit knowledge is valuable in part because it cannot be easily acquired or duplicated. Nonaka posits that transferring tacit knowledge into explicit knowledge is difficult to achieve (1991). However, to be most effective, an organization's KM capabilities

should include codifying knowledge, sharing knowledge, and integrating new knowledge (Yahya & Goh, 2002).

What does KM Involve?

KM involves having an organizational infrastructure and processes aimed at coding, sharing, and integrating knowledge. This section will explain these three objectives.

Knowledge Codification

Codification describes KM techniques designed to help an organization stay on course with regard to organizational objectives. The objective of KM is to facilitate knowledge flow and thus better identify opportunities or threats that arise in the market. Identifying such threats will help lead to the development of a desired course of action. Codification can help the organization stay on course to meet such objectives (Vagenas, 2008).

Standardized and personalized are the primary approaches that sit at each end of the codification axis (Hansen, Nohria, & Tierney, 1999). Standardized codification uses data bases to store knowledge for repeated use by anyone in the organization. Depending on the company objectives, type of product being sold, and needs met by the respective products, an organization may choose to develop this standardized approach to KM (Hansen, Nohria, & Tierney, 1999).

Personalized codification is a highly customized approach that involves responding to unique problems as they arise. In this strategy, technology is used for communication and knowledge sharing; however, customization of KM initiatives is heavily supported by person-to-person contact (Hansen, Nohria, & Tierney, 1999). A company may choose to use both the standardized and personalized codification approaches for different types of knowledge. The codification method selected should be based on the nature of the knowledge being collected. For example, an organization may choose to use only personalized codification for marketing-related knowledge and alternatively choose to use a standard type of codification for technology-related knowledge (Schultz & Jobe, 2001).

Another approach to codification is the non-focused approach. A non-focused knowledge management approach does not singularly assign one codification form to a knowledge category. This non-focused approach is viewed as the less advantageous and more disorganized approach. Schultz and Jobe (2001) posit that the non-focused approach often results in less efficiency because it requires more skilled diversity in codifying, distributing, accessing, and decoding. This approach also results in codification that is "partially redundant," such as in cases in which knowledge is electronic and also written (Schultz & Jobe, 2001, p. 147). Many organizations that choose a non-focused KM approach choose to limit their engagement in KM. This limited engagement hinges on concerns regarding the exposure of proprietary company knowledge and the risk of infringement on guarded ideas. One benefit of a non-focused approach pertains to an organization's tacit

knowledge. Tacit knowledge that is not transformed into explicit knowledge escapes the analysis that may cloak its real value. In some cases, analysis can become a harsh process that strips value instead of recognizing significance. On the other hand, many times existing theories are so fiercely held that inconsistencies within them are ignored, which prevent innovation from manifesting. The concern is centered on defending old theories rather than allowing new information to address these inconsistencies (Eraut, 2000).

Regardless of which approach is utilized, the primary purpose of codification is to package knowledge, align it with the objectives of the organization, and prepare it for use throughout the organization.

Knowledge Sharing

Sharing is the starting point for knowledge distribution and a critical piece of any KM strategy. All other processes are heavily dependent on knowledge sharing. Sharing provides the stream that fills and refills the reservoir of knowledge assets. As explained previously, knowledge comes in two forms: tacit and explicit (Nonaka & Takeuchi, 1995). Tacit knowledge encompasses subjective knowledge that cannot be expressed by symbols and is difficult to transfer. Sharing information facilitates the transfer of tacit and explicit knowledge. Sharing results from either formal or informal socializing and usually aims to distribute tacit knowledge throughout an organization (Nonaka & Takeuchi, 1995). It involves expressing the inexpressible. During tacit-related sharing, employees often speak figuratively and symbolically

using metaphors and analogies. Explicit knowledge refers to knowledge that can be expressed in symbols and is communicable to others through these symbols (Kogut & Zander, 1993). Explicit-related sharing usually takes place in formal meetings. It may involve groups within an organization or one-on-one discussions.

KM systems allow tacit-related sharing to interact with explicit knowledge sharing and produce innovation or new knowledge (Nonaka & Takeuchi, 1995). The sharing phase of KM triggers KM's innovative cycle. For example, an individual who knows how to play a piano very well can sit down at a piano and start to play a song. If that individual was asked to describe the exact thought and action processes that were undertaken to successfully and instinctively play the song, it would prove to be a difficult task. This is an example of tacit knowledge -- knowledge that is very real and yet difficult to articulate. We know that one can learn how to play a piano because attempts have been made to convert the tacit knowledge that is associated with playing a piano into explicit knowledge. These attempts began with sharing tacit and explicit information that triggered the creation of books and piano theory that are used widely today. Yet, because sharing the tacit feelings associated with this skill is extremely difficult, new knowledge continues to surface about piano playing.

The concept of knowledge sharing is also largely influenced by an organization's culture. Organizational culture can determine the level of knowledge sharing that exists. The organizational culture is influenced by the knowledge (behavior, attitudes, and experiences) of the individuals within the organization.

Companies use different strategies to manipulate organizational culture in such a way that it benefits the organization the greatest. BP Amoco exploited a KM approach that focuses on creating teams. It required its managers to completely reorganize daily tasks that centered on conducting peer groups, emphasized human contact, and encouraged peer assistance within the company. For example, a manager who usually arrived at work expecting to complete many administrative tasks, which included an occasional staff meeting, found that much of her job centered on interacting with employees. In making this change, BP Amoco hoped to expand the practice of knowledge sharing among employees and business divisions while creating an organizational culture of inclusiveness (Yahya & Goh, 2002).

Lytras and Pouloudi (2006) proposed a similar strategy for influencing organizational culture in order to create unity among individuals. Their strategy also centers on creating project teams that work together to accomplish tasks and then evaluate their own results. This approach seeks to combine possessed knowledge of team members and create new knowledge from an environment that promotes knowledge sharing. Team dynamics uniquely stimulate knowledge sharing and knowledge creation as individuals bring their own perspectives toward a common goal/objective. Ideally, the abstract pursuit to create synergy among employees manifests knowledge and the knowledge is shared to create a flow in the completion of the proposed task. More importantly, a byproduct of this knowledge sharing leads to the creation of new knowledge.

Researchers believe the benefit of this newly created knowledge is where ideas and innovation are born. These new ideas pave an organization's pathway of potential growth and competitive edge. Yahya and Goh posit that "…the truth is that it is the interaction of humans through certain media or instruments that creates knowledge and adds to the pool of organizational knowledge and acts as the engine of an organization's growth and learning capability" (2002, p. 458). In summary, sharing involves infrastructure and processes that extract tacit and explicit information from individuals in an organization and creates "new" knowledge.

Integrating New Knowledge

The sharing and codification dimensions of KM should create new knowledge. Integration describes how the new knowledge is then merged into practices throughout the organization. A specific goal of any knowledge management strategy is the creation of new knowledge that results in competitive advantage; however, knowledge that is not integrated into the organization is insignificant. The capability of an organization to continually integrate new knowledge becomes the determiner of competitive advantage. This integration forms the basis for new service and product ideas and can create "a platform for expansion into new competitive arenas" (Nielson, 2006, p. 64).

A university may implement new programs that engage the attention and participation of their professors and students. The program could involve developing focus groups that seek to bring professors and students together in a casual

environment to interact and discuss opinions on teaching methods versus successful student acquisition of expected knowledge. The focus groups seek to bring tacit knowledge from each group and transfer and combine it with explicit knowledge in hopes of creating new learning methods. In this example, after these sessions professors and students feel as if they have both contributed perspectives and have determined what is not working versus what is working. At this point, integration and continued evaluation of these new methods is imperative to alter learning outcomes. Eraut (2000) suggests that knowledge is often acquired through participation and observation rather than formal training.

Tomlinson (1999) offers clarification through a view of the teaching world. Often, teachers are trained for years on how to teach. When they begin their first teaching job, they may conclude that the methods they were taught are inadequate, uninspiring, or just fail to promote learning. Unfortunately, in this environment, many continue to argue for these methods, as it becomes what defines them as "a teacher." These methods comprise what they have been taught that "teachers" do. Through observations of and conversations with experienced teachers, novice teachers can critically reflect on their personal approach to teaching. This type of direct sharing merges new and old ideas into practice and embodies knowledge integration.

Integration itself can be a challenge, as it involves careful focus and assembly of knowledge assets. From a human resources perspective, Soliman and Spooner (2000) propose that knowledge integration includes the following:

- Alignment of knowledge management with business directions
- Creating a supportive environment for knowledge management programs
- Use of enabling technologies for knowledge management programs
- Creating knowledge management leadership and teams (IT and upper management.

After knowledge is integrated, continued observation and evaluation of its usefulness should lead to codification for continued expansion and growth. Blanzeiri, Giorgini, Giunchiglia, and Zanoni (2004) posit that continued observation and building of knowledge will change an organization's environment. Thereby, people will begin to behave in accordance with particular components of new knowledge (2004).

A common strategy of KM involves developing an organizational structure that induces the use of technology for the acquisition, conversion, application, and the protection of knowledge. Gold, Malhotra, and Segars (2004) refer to this as an organization's knowledge infrastructure (technical, structural, cultural, and knowledge processes). Gold et al. (2004) posit that a knowledge infrastructure is essential to effective KM and an excellent way to influence organizational culture and stress. Although having KM infrastructure capabilities is undoubtedly very important in enhancing knowledge management initiatives, these capabilities may have benefits outside this main objective. For example, research indicates that KM and organizational culture are closely linked (Zheng, 2005). As an organization develops KM capabilities, the cultural dynamics of the organization are sure to change. One aspect of an organization's culture, intergroup bias, is often the origin

of most cultural conflict within an organization (Breed, 1955). Because intergroup bias can prohibit an organization's KM efforts, investigating the relationship between KM capabilities and this bias is important. Based on this need, the next section of this study will further discuss these KM capabilities based on a review and analysis of literature.

Knowledge Management Capabilities

In their examination of effective knowledge management, Gold, Malhotra, and Segars (2001) posit that an organization must have two KM capabilities: knowledge infrastructure capabilities and knowledge process capabilities. The subdivisions of a KM infrastructure are technology, structure, and culture. The technology subdivision involves the use of knowledge, such as discovery, mapping, application, and generation technologies. These may include XML, Intranet, and other technologies. The structural subdivision involves a formal organizational structure of developing systems that rewards knowledge creation and sharing. This strategy is mostly a management systems approach in which employees are rewarded for actively taking time to generate new ideas. The cultural subdivision is based on the idea that dialogue between individuals is the key to developing and transmitting new and innovative knowledge. Formal and informal encouragement of employee interaction is the focus of this infrastructural capability.

The subdivisions of KM procedural capabilities enable an organization to acquire, convert, apply, and protect knowledge. Acquisition of knowledge may

involve processes for discovering outstanding practices within the organization and/or benchmarking, and the knowledge acquisition results from the sharing of personal experiences and employee interaction (Gold et al., 2001). Because knowledge may reside in different areas within an organization, the conversion subdivision seeks to disseminate and integrate knowledge via the use of rules or directives, sequences, routines, group problem solving, and decision making (p. 191). The application subdivision involves the use of storage and retrieval mechanisms that allow for quick access to knowledge. The focus of this subdivision is the actual use of knowledge and may require the use of a company knowledge base system or intranet. The protection subdivision describes processes that need to generate and preserve the competitive edge and may involve processes that restrict or track access to vital knowledge (Gold et al., 2001). The common theme of these capabilities suggests KM needs employee contact and interaction to be effective.

This study is concerned with how KM capabilities impact an organization's level of intergroup contact and the resulting effect on intergroup bias. This analysis will be based on Gold, Malhotra, and Segars's (2001) two KM capabilities with an understanding that an organization may not exhibit the complete scope of KM infrastructure and process capabilities. Consequently, this study will determine if these capabilities influence print journalists' level of intergroup contact.

Knowledge Infrastructure Capabilities.

The knowledge infrastructure class of capabilities involves three dimensions: technical, structural, and cultural (Gold et al., 2001, p. 187).

The technological dimension includes building technology within an organization that allows knowledge to be stored and accessed. It offers individuals the opportunities to search for, add to information stored, as well as collaborate with others interactively thus furthering knowledge sharing (Gold et al., 2001). Technology becomes the link for communicating information about what routinely occurs during daily operations between different groups in an organization. Knowledge discovery, tracking, and mapping travel back and forth on the highway of the technology axis in an organization.

The structural dimension provides a flexible work flow design needed to encourage collaboration and sharing in an organization. The use of incentive systems are often deployed as part of this capability. Nonaka and Takeuchi's (1995) hypertext organization features a structure that enables knowledge creation. For example, employees are rewarded for taking the time to generate knowledge and work with members outside their groups in combination with formal structural activities. The rewards may range from public recognition, promotions, and a more flexible environment. Such strategies foster interaction which can encourage knowledge sharing.

The cultural dimension involves formally and informally encouraging employees to work with members outside their group. This intergroup contact helps

in the transmission of tacit knowledge and the conversion of that knowledge into explicit knowledge (Gold, Malhotra, & Segars, 2001). Corporate vision that promotes this cultural dynamic provides the necessary organizational values to facilitate the cultural dimension of a knowledge infrastructure capability. According to Gold et al. (2001), attention to the culture within an organization is an important knowledge management strategy.

Knowledge Process Capabilities

Gold et al. (2001) outline the second class of capabilities, which involves knowledge processes or activities. Their study focuses on the acquisition of knowledge, the conversion of knowledge, the application process, and the protection of knowledge.

The acquisition of knowledge includes activities designed to seek, acquire, generate, or collect knowledge. This accumulation centers on collecting information about best practices from within or outside of the organization to see if there are gaps in current practices and procedures. Gold et al. (2001) suggest that collaboration within an organization and between outside organizations are key ways to acquire knowledge.

The conversion of knowledge involves a framework for organizing or structuring knowledge in a way that is useful to the organization. Information is converted so that it can be applied.

The application of knowledge distinguishes knowledge management from information management and speaks to an organization's ability to integrate knowledge via rules, routines, sequences, and collective problem solving. A goal of knowledge management is to develop an organization's ability to assimilate and apply knowledge in an innovative and expansive way. If this ability is not achieved, the process is simply information management and not knowledge management.

The protection of knowledge describes activities that secure knowledge assets through incentive alignment, employee conduct, and job design, in order to maintain competitive advantage. These activities may involve using technology to track or restrict access to knowledge. Knowledge process capabilities provide an avenue for KM leaders and teams to manipulate future scenarios in a way that expected actions induce desired group behavior (Blanzeiri, Giorgini, Giunchiglia, & Zanoni, 2004).

Intergroup Contact Theory

In an effort to understand intergroup relationships, researchers began to study the contact between groups. These studies led to the theory of intergroup contact. In short, intergroup contact theory can be explained this way: the more one has contact with individuals the more positively they will view them and others like them (Allport, 1954). Most researchers have analyzed intergroup contact in efforts to improve social interaction between minority and non-minority groups. Allport's work focuses primarily on the relationship between intergroup contact and prejudice, and his interest was focused on improving social interaction between minority and

non-minority groups. These studies indicate that intergroup contact is a most effective procedure for improving social interaction (García, Castillo, & Umpiérrez, 1997). Allport's (1954) original concept specified certain conditions in order for intergroup contact to have this effect. But over the years other studies provided that for contact to have a positive effect on social interactions, the contact (rather than its conditions) is most important. One such study by Yarrow, Campbell, and Yarrow (1973) posits that the amount and longevity of contact achieves consolidation that produces changes in attitudes. This theory has been applied to many situations with much success and some failure. For instance, in the 1960s and 1970s, intergroup contact theory was applied in segregated schools, with little impact on interpersonal relationships (García, Castillo, & Umpiérrez, 1997). However, a substantial amount of literature documents that intergroup contact or social contact generates a psychological process that produces positive opinions and reduces intergroup bias (Brown & Hewstone, 2005; Pettigrew, 1998). Pettigrew, Thomas, and Tropp's (2006) meta-analysis test of more than 500 studies found that over time intergroup contact reduces intergroup bias regardless of the context, participants, or nature of the intergroup bias.

The benefits of intergroup contact may not be realized because the groups most in need of reducing intergroup bias contact each other the least. For example, the majority of whites in the United States live in predominately white neighborhoods and blacks in predominately black ones. This separation is also the case for groups of workers at media organizations. Groups rarely interact with each

other unless a need occurs. The idea that KM may mediate or facilitate intergroup contact may be an undiscovered benefit of KM. Although direct and extended contact is most effective, some studies suggest that the positive effects of intergroup contact can occur even if the contact is indirect. Crisp, Stathi, Rhianno, and Husnu (2008) found that imagining or the thought that contact with the out-group has taken place over time or is taking place produces similar results. Although this idea has not been tested thoroughly, intergroup contact and its ability to decrease intergroup bias is well documented.

Although the length and amount of contact are most import, the next section will analyze the connection KM infrastructure and process capabilities have with the original conditions for intergroup contact presented by Allport (1954): equal status between group members, common goals, no competition, and authority sanction for the contact.

KM Capabilities and Intergroup Contact Theory

The characteristics of the capabilities associated with KM reflect the characteristics of intergroup contact theory. The following section will explain further how KM infrastructure and process capabilities are associated with intergroup contact theory. Every dimension of the KM infrastructure and process capabilities reflects one or more of the four characteristics of intergroup contact theory. First we will look at the subdivisions that make up the infrastructure capabilities of KM: technology, structure, and culture.

Knowledge discovery, mapping, application, and generation technologies engage employees in a way that establishes a single goal of company success. This engagement reflects one of the four conditions of intergroup contact theory of establishing common goals. Linked as opposed to fragmented communication technologies will discourage the selfish individualistic motivations that can lead to the hoarding of knowledge.

The structural subdivision of a system that rewards knowledge creation and sharing reflects three of the four conditions of intergroup contact theory. First, equal status between group members is promoted in work settings when all workers can be rewarded for their ideas. Second, because the primary goal is the same for all -- creating and sharing knowledge -- this subdivision helps to establish common goals. Third, because rewards are given by management, employee contact is sanctioned by organization authorities.

The cultural subdivision involves formal and informal encouragement of employee interaction. This interaction aligns with authority-sanctioned contact and helps to eradicate competition, two of the four conditions of intergroup contact.

The next subdivisions to examine make up the process capabilities of KM: acquisition, conversion, application, and protection. Acquisition processes encourage employees to share personal experiences and to interact (Gold et al. 2001). This sharing reflects three of four conditions of intergroup contact theory: promote equal status between group members, eradicate competition, and provide for authority-sanctioned contact (Allport, 1954).

The conversion subdivision seeks to disseminate and integrate knowledge via the use of rules or directives, sequences, routines, group problem solving, and decision making (p. 191). These processes reflect all four conditions of intergroup contact theory: promote equal status between group members, establish common goals, eradicate competition, and provide for authority-sanctioned contact. An example would be developing a process whereby employees are directed to routinely go through a sequence at the start of their day. The sequence would involve reviewing new knowledge that has been posted and meeting in groups to decide how they might apply what they have learned. This type of work routine is aligned with the conditions of intergroup contact theory. The application subdivision involves storage and retrieval mechanisms to facilitate quick access to knowledge and knowledge preservation. Quick access to knowledge can affect the learning curves of workers and their status levels within the organization. The protection subdivision is perhaps the least linked to intergroup contact theory, although it does help establish the common goal of protecting the organization's brand.

The connection these infrastructure and process KM capabilities have with intergroup contact theory will be further explored by this study. In summary, as an organization's level of KM capabilities increases, its level of intergroup contact should be positively impacted. The more effective an organization's process capabilities, the better its employees will acquire, convert, apply, and protect knowledge. Consequently, the organization should exhibit high levels of intergroup contact. These dynamics relate to the first hypothesis of this study. Considering the

preceding review and synthesis of relevant literature, it is hypothesized that the development of KM capabilities will result in increased levels of intergroup contact. As stated, intergroup contact refers to interpersonal contact that reduces prejudice and discrimination between majority and minority group members. The premise of intergroup contact is that groups will find cohesion through the process of completing tasks together (Allport, 1954). KM capabilities provide for and promote this type of contact between groups of employees of an organization. This study will measure the level of intergroup contact in an organization, based on the literature reviewed that supports the assumption that contact associated with KM falls in the category of intergroup contact. The next section will explain the relationship between KM capabilities, intergroup contact, and intergroup bias. First, intergroup bias is explained.

Intergroup Bias

Hewstone, Rubin, and Willis (2002) describe intergroup bias as a systematic tendency to evaluate one's own membership group (the "in-group") or its members more favorably than a non-membership group. There are two primary approaches to intergroup bias research: the convergence of interests approach and the categorization approach. These two approaches are explained in the following paragraphs.

Intergroup Bias: The Convergence of Interests Approach

The convergence of interest approach suggests that bias arises when groups are forced to work together to achieve a goal and one group feels they can only achieve their goals to the detriment of the other group (Doise & Sinclair, 1973). In that regard, Sherif (1958) describes intergroup conflict as a conflict between two groups that strike a war of opinion between each other. Often slogans are formulated and effective measures are organized by members recognized as the most responsible in their respective groups. He adds that individuals ordinarily exhibit intense reactions within the reference scales of prejudice, hostility, or sacrifice established in their respective settings. Doise and Sinclair (1973) found that groups often seek to protect their own group's goals when forced to work with others.

Filak's (2004) study further suggests that the result of such bias often leads to intergroup conflict. Intergroup bias is even a more pervasive issue when companies merge. Studies have found that members who perceived themselves to be of low status in an organization perceived a merger to be implemented in a less fair manner and they adjust poorly over time. Those who perceived themselves to be of high status exhibited less intergroup bias and an increase of adjustment over time (Amiot, Terry, & Callan, 2007). Amiot, Terry, and Callan (2007) suggest the experience of a merger increases the sensitivities of the workers and that companies should consider to what extent these sensitivities can destroy the value in a merger. The convergence approach focuses on the relationship between group goals, which Doise and Sinclair (1973) posit is too restrictive (p. 147). In that regard, intergroup bias cannot be fully

explained by simply analyzing the relationships between groups. They present that the intensity of bias is also influenced by perceptions about the category to which a group belongs.

Intergroup Bias: The Categorization Approach

The categorization approach looks at how structural influences account for the intensity of intergroup bias. Doise and Sinclair (1973) posit that as groups come in contact with each other a categorization process takes place that can lead to intergroup bias. For example, a group of students from Harvard Law School may have pre-existing ideological representations of students who attend a less prestigious university. How the repercussions of ideological perceptions play out on a psychological level describes the categorization approach.

The Doise and Sinclair (1973) study found that when groups have a collective encounter, individuals within each group exhibit even greater levels of intergroup bias. One experiment found that the principal aim of a group is not overall performance but to out-perform members of an out-group (Tajfel, Flamen, Billing, & Bundy, 1971). Research indicates that intergroup bias is even a greater issue for employees whose company has undergone a merger or if their department makeup has been reshaped.

The implications of both the categorization approach and the convergence approaches for print news journalists can be explained in this way. The intergroup biases can emerge as a result of converging print journalists' duties with online or

broadcast journalists' duties and are intensified as a result of a perception of online and broadcast news as negative categories of the news business. Research indicates that the basis for intergroup bias for journalists is largely related to the categorical approach because many print journalists have held intergroup biases towards broadcast journalists for years (Breed, 1955). Because online news is perceived as a threat to the print news industry, it too may be viewed as a negative category of the news business. Based on the categorization approach, print journalists' perception of the online and broadcast category of news will be used to measure intergroup bias. These perceptions will be used to assess the perceived level of intergroup bias print news journalists have towards online or broadcast news journalists. Based on the categorization approach, if print journalists rate their news category more positively than online or broadcast news, they exhibit intergroup bias. Both approaches apply to this study; however, the categorization approach will be used to develop its measuring instrument. Research indicates that the categorization approach suggests that perceived intergroup bias can be measured by the level of preference a participant shows towards their category of work to another work category. Turner and Crisp (2010) posit that the more a participant indentifies with their category of workers the greater the discrepancy they will perceive to be between them and workers in the out-group.

Why KM Capabilities and Intergroup Contact Should Reduce Intergroup Bias

According to Sherif (1958), intergroup contact is the primary barrier that impedes the growth of intergroup bias. He states that intergroup contact increases positive feelings about out-group members. The development of KM capabilities provides a barrier to intergroup bias because it is essentially driven by face-to-face and virtual intergroup contact. One of Sherif's keys to decreasing intergroup bias involves the effectiveness of superordinate goals. "Superordinate goals" are defined as goals which are compelling and highly appealing to members of two or more groups which cannot be attained by the resources and energies of the groups separately. In effect, they are goals attained only when groups pull together (Sherif, 1958). Ortiz and Harwood (2007) found that positive intergroup contact was associated with positive intergroup attitudes. The study looked at gay and straight groups and black and white groups. The more a group's members were exposed to positive stimuli pertaining to the other group, the more the group members' attitudes were positive to the alternate group.

Although many studies have examined the impact of face-to-face contact on levels of intergroup bias, much of the contact associated with KM infrastructure and process capabilities might be computer contact (such as e-mail). In a pilot study, Mahoney (2006) found no statistically significant difference in the feeling of belonging between nursing students taking online courses and those in face-to-face courses. A student's ability to be an integral part of the academic environment in

either context was statistically the same. The Mahoney study provides focus for research analyzing intranet as a tool for knowledge sharing. This is significant because in many organizations the intranet is used by employees to facilitate KM. Ruppel and Harrington (2001) found that an ethical, developmental, and hierarchal culture encourages employees to use a company's intranet for knowledge sharing. The culture of an organization can influence the use of technology in a way that increases virtual contact; however, minimal research has focused on how virtual contact impacts levels of intergroup bias in an organization. What is known is that the use of the intranet increases contact between employees in an organization. This finding is especially relevant because, as noted, the company intranet may be a primary avenue for KM interchange. Identifying if face-to-face and intranet intergroup contact serves as a barrier to intergroup bias is critical in today's technological world. The next section will take a closer look at the relationship between the intergroup contact that results from KM and the level of intergroup bias among employees in an organization.

Intergroup Contact and Intergroup Bias

Pettigrew, Thomas, and Tropp's (2006) meta-analysis test of 713 independent samples from more than 500 studies found that intergroup contact reduces intergroup bias regardless of the context, participants in the sample, or the type of bias. Considering the scale of their investigation, the findings of the meta-analysis are generalizable regarding the effects of intergroup contact in reducing intergroup bias.

Furthermore, they found that no special conditions are necessary for intergroup contact to reduce intergroup bias -- the intergroup contact simply needs to take place (2006). Sherif (1958) posits that intergroup contact reduces intergroup bias towards any members and the group itself. For example, print journalists' contact with online journalists should make them view online journalism more positively. That positive view of online journalism indicates the general level of intergroup bias a print journalist has towards online journalists will be minimized (Doise and Sinclair, 1973).

The literature supports the assumption that the level of an organization's knowledge infrastructure and process capabilities will reflect its level of intergroup contact. Developing KM capabilities should result in increased levels of intergroup contact. Consequently, as an organization develops KM capabilities and the level of intergroup contact increases, the amount of intergroup bias reported by its employees is expected to decrease.

The population for this study works in the print news media industry that is being reconstructed by what is called "media convergence." The next section will explain media convergence, the connection media convergence has with KM, and the recent history media convergence has with Intergroup Bias.

Media Convergence

The emerging trend surrounding the converging of different news media platforms is redefining how news organizations operate. Since the breakdown of

regulatory and technological barriers, the media industry has seen a cross-industry structural transformation. Media convergence calls for the difficult task of renovating journalists' attitudes about working with groups in their organization. One prominent example is Canwest, a corporation that owns several newspapers, television stations, cable stations, magazines, and web portals (Edge, 2011). Other media conglomerates, such as Vivendi, AOL/Time Warner, Viacom/CBS, GE/NBC/(and now Comcast), are international examples of how the digital revolution and the process of deregulation have changed the fundamental structure of media and entertainment industries (Chan-Olmsted, 1998).

Local news companies have also been impacted by deregulation. In June of 2003, the Federal Communications Commission approved new media ownership rules (FCC, 2004). The new rules permitted broadcast networks to own television stations with a combined 45 percent national audience reach (up from 35 percent). Congress later lowered ownership limits to 39 percent (FCC, 2012) to represent the current reach of what were at the time the two largest media companies, Viacom's CBS and News Corp's Fox (Labaton, 2004). Consequently, media companies can own two television stations in most markets as long as they are not rated in the top four. Additionally, a company could own three stations in markets where there are at least 18 stations, such as Los Angeles (CNN, 2003). A significant aspect of these revised rules relates to cross-ownership. Under the new FCC rules, even greater consolidation of print and broadcast media ownership is possible.

In addition to regulatory changes, the Internet is changing the media industry by offering new ways for audiences to get news and information. More news organizations are being forced to amend their management environment to focus more on the instant nature of online content (Chan-Olmsted & Park, 2000). The web has become a must-have companion for inclusion into today's successful business models (Chan-Olmsted, 1998). Filak references the surge of Dot-Coms during the mid-1990s as an indication the Internet would soon become its own medium outright (2004). Time Warner, which owns and operates CNN (a 24-hour cable news network), took advantage of both the ease of regulations and the growth of the Internet by merging with a major Internet service provider, America Online (Underwood, 2001). This example of how intergroup bias can hinder the goals of media organizations is often cited.

As mentioned, Canwest cross-ownership mergers and acquisitions was one of the most widely adopted examples of media convergence. It is also a classic example of why convergence was a problematic concept and how intergroup bias can derail convergence efforts (Edge, 2011). The cost savings from sharing content across different platforms were never realized. Additionally, differences in corporate culture led to the failure of the company's convergence efforts (Edge, 2011).

The merger that convinced many media owners that cross-ownership was the foundation of media convergence was AOL/Time Warner (Edge, 2011). The AOL/Time Warner merger was an example of the news and information cross-platform evolution, and was considered by some analysts as an antidote for the

argument that platform crossing will be challenged by cultural factors (Surowiecki, 2003). After the merger, AOL struggled to gain its footing amid a 31% drop in revenue. In addition, the company's stock decreased 60% in years following the merger's close (Underwood, 2001). Analysts charge that the cultures of the respective companies had trouble working together and that this cultural clash contributed to lower profits (Surowiecki, 2003). The Underwood study is aligned with Amiot, Terry, and Callan's conclusion that intergroup bias is an even more pervasive issue when companies merge (2007).

Studies indicate that journalists have routinely rejected cultural change. Breed (1955) suggests that unwritten rules have pushed cultural change agents to conform to previous newsroom standards of writing, reporting, and other operations. Peter de Jager (2001) suggests that changing an organization's culture is difficult to accomplish because understanding the need for change is often not enough for employees to break old habits. Despite cultural hurdles, researchers suggest that, from an operational standpoint, the ability to effectively reconfigure a newsroom's culture is the most important element of effective platform integration (Filak, 2004). Further studies have indicated that some companies' convergence efforts have failed as a result of news platform culture clashes (Surowiecki, 2003). The Chan-Olmsted (1998) study indicates that newsroom managers and leaders looking to increase their share of the market will have to acquire and maximize the use of a diverse palette of resources. This phenomenon is the basis for the contemporary view of news media convergence (Baldwin, McVoy, & Steinfield, 1996). Convergence involves the

attrition-forced merging of media platforms brought on by technology, deregulation, and varying distribution channel diversity necessary to reach the contemporary and ever-moving consumer. It also represents the potential clashing of platform occupational culture (Filak, 2004). Moreover, it has led to a realigning of the cultural fabric of print and broadcast as they integrate personnel to facilitate new media platforms. This realignment has been hindered by issues of intergroup bias.

Singer (2004) found that many journalists perceive convergence as having a number of advantages, particularly in relationship to newspaper and broadcast competitiveness. Although interpersonal communication channels and the early adoption of convergence among news journalists generate more positive cultural outcomes in newsrooms, intergroup bias remains a major challenge for organizations undergoing media convergence initiatives. Over time, journalists tend to gain respect for those working in other parts of the newsroom and many are finding ways to make convergence workable and potentially rewarding (Singer, 2004b, p. 17). The Singer study did find many areas where convergence remains a challenge. Reconfiguring the social construction of a newsroom and employee buy-in in terms of convergence benefits, remain two major challenges. In another study analyzing the effects of convergence on four newspapers with television and online partnerships, Singer (2004) found that print journalists were ambivalent about the benefits of convergence as they relate to three major benchmarks of journalists: credibility, accuracy and quality. In this study most print journalists saw broadcast journalists as inferior, but re-socialization over time appeared probable, although no

statistical evidence supported this notion. Singer's study found that print journalists perceived cross-media information sharing as the sociological aspect of news work most likely to change intergroup bias inherent in media convergence.

Recently studies have emerged emphasizing online and social media's influence in media convergence. Studies have noted that news organizations are beginning to use the web to invade another medium's traditional turf instead of merging with other companies. Keith and Thornton (2008-2009) found that print journalists are beginning to see broadcast video as a part of their news product. More and more print newsrooms employ workers who have broadcast and online journalist skill sets. For example, in the Keith and Thornton study (2008-2009) 66 percent of newspaper respondents said that print photo journalists also shoot video. This assignment is common to broadcast photo journalists. Others employ categories of workers for the sole purpose of producing broadcast and online news contact. What is perhaps most interesting about the Kent and Thornton (2008-2009) study is that print workers viewed their broadcast and online duties as simply part of their company's Web. In other words, they were print journalists doing broadcast or online journalism for their organization's web site, but print journalists nonetheless. In fact, some researchers are suggesting that the phenomenon of media convergence should be renamed "webvergence," as more news companies focus on producing online, broadcast, and print content for the Web.

On the contrary, Gordon (2003) believes that a Web-centered view of convergence is too limited. He lays out six ways of looking at media convergence

that include: (a) Convergence of Technology -- denotes technology's role and influence in the creation, distribution and consumption of news content; (b) Convergence in News Organizations -- denotes new ways of managing media organizations that involve convergence ideas; (c) Convergence of Ownership -- describes an evolving and mixed landscape of media company ownership; (d) Convergence Tactics -- describes new and innovative tactics that include cross promotion, redefining jobs descriptions, and the overall structure of news organizations; (e) Convergence and Information Gathering -- describes new ways of reporting and researching stories using online tools; and (f) Convergence and Presentation -- denotes the changing ways stories are told and as well as their life cycle.

Doug Fisher, the executive editor of the *Convergence Newsletter*, believes that researchers and practitioners "are swimming in an age of innovation and struggle" and have only "scratched the surface of where convergence is today (2008-2009, np).

Media Convergence and Intergroup Bias

Media convergence in newsrooms means that the lines that delineated print, broadcast, online platforms, and the roles of those who work in these platforms have become far more fluid and narrow (Singer, 2008). Journalists are becoming a part of a network of communicators connected with a potpourri of producers and consumers unbridled by gatekeepers. Singer posits that the journalists' information conveyor

belt, where the journalist is the gatekeeper, has been replaced by an information network. A preference toward a particular group, TV, print, or online, can place journalists and their organization at a disseminating disadvantage.

As explained previously, intergroup bias is a systematic tendency to evaluate one's own membership group (the"in-group") or its members more favorably than a non-membership group (Hewstone, Rubin, & Willis, 2002). Studies indicate that employees of each platform of the news media already have high levels of competitive rivalry, which can lead to conditions that promote intergroup bias (Filak, 2004). Intergroup bias is even likely to be exhibited by employees planning the day's news coverage. Planning usually centers on the market ratings war and the desire to beat the competing stations' ratings. Research on converging news platforms indicates that when individual platform members are not involved in the creation of the convergence plan they are likely to reject the plan (Filak, 2004). The participants rated a convergence plan more positively when they perceived it to have been created by members of their in-group as opposed to their out-group. Additionally, journalists were more positive toward the group that created the plan if they perceived the group not to be comprised solely of out-group members. In an unpublished case study, Sanders (2004) measured the interaction of the converged Chicago Tribune Company employees during planning meetings and determined that intergroup bias existed. According to the results, the organization promoted a brand that encouraged cross-platform unity, but staff members viewed the newspaper platform more favorably. Moreover, attempts to create a barrier to intergroup bias

were not successful. The study notes that during coverage planning meetings, newspaper managing editors were more significantly involved in coverage planning meetings than members who worked for the online, radio, TV, and cable TV platforms (Sanders, 2004). The study also indicates that the scarcity of resources contributed to strained group dynamics. For example, one platform may be asked to hold a story to allow for another to cover it. Despite the creation of an electronic news team designated to ensure cross-platform coverage, tensions existed over which platform had exclusive rights to stories being covered. Intergroup bias also resulted from technology differences. For example, a video still-shot from broadcast story video could not be made into newspaper photos, and newspaper reporters were not comfortable being on TV. These technology differences in converged news organizations often contributed to intergroup bias (Filak, 2004).

Sherif (1958) describes intergroup conflict as a conflict between two groups that may involve a strike or a war-opinion within the groups. Often slogans are formulated and effective measures are organized by members recognized as the most responsible in their respective groups. He adds that individuals ordinarily exhibit their intense reactions within the reference scales of prejudice, hostility, or sacrifice established in their respective settings. Argyis (1974) provides an example of intergroup bias in newsrooms. The study discovered that journalists have a way of subverting change and toppling social renovation through passive aggression and rejection (p. 124). Argyris (1974) explains that print and broadcast journalism students reported strong negative descriptions of the out-group, while offering strong

positive ones regarding themselves and their group. These expectations were supported in a survey of broadcast and print students who worked for either a citywide newspaper or a television station in the Midwest (Tajfel & Turner, 1986). The study findings describe the onset of media bias beginning in journalism education programs. Other studies have found that this bias leads to intergroup bias in newsrooms that prohibit convergence efforts (Filak, 2004).

Convergence requires some level of news platform (print, online, or broadcast) integration (Filak, 2004). Newsrooms have always employed a potpourri of individual talent working together to offer a solid news product to consumers. Studies have highlighted these occupational subgroups in an effort to develop a model for studying convergence. Lowrey (2002) examines the normative differences and strategies for control overwork among newsroom employees. He explains that occupational norms may create conflict in newsrooms when subgroups struggle for legitimacy and control concerning work issues. Moreover, journalists commonly pursue objectivity and detachment in an effort to allow details and facts to drive the story (2002). However, an employee's perception of objectivity may vary from one platform to another. Thus a normative conflictive environment develops as occupational sub-groups struggle for performance recognition. Group members are often even more committed to their occupational subgroup than to the overall organization (Hewstone, Rubin, & Willis, 2002). The challenge for media managers is to strike a balance between cooperation and competition among the many subcultures of print, electronic, broadcast, and radio media, to create a single

occupational community. Van Maanen and Barley's (1984) concept of the "occupational community" further explains how groups and individuals, within organizations who consider themselves to be engaged in the same sort of work, identify with their work. They posit that as new areas of expertise are introduced to the workplace, any established organizational cohesiveness can be compromised.

The effort to cover the most stories in the best possible way involves incorporating learned behaviors, beliefs, and norms that have been passed on from one news generation to another (Breed, 1955). Breed (1955) offers a view of the social construct of a newsroom that suggests that the cultural laws, in terms of procedure, act as a signpost that silently forces even new employees to concede their fresh new ideas. The Breed (1955) study examined whether or not news writers adhered to an unwritten "policy" when choosing and writing stories, which perpetuated the newspaper publisher's vested interest. This "policy" is culture based, and reporters and editors usually assimilate unknowingly in an effort to succeed. The assimilation process happens rapidly, as most reporters accept the policy out of respect for star and veteran reporters' work. Shoemaker and Reese's (1991) study suggest that as newsroom employees gain experience, they are even more likely to adhere to unwritten policy.

Past research indicates that these cultural policies lead platform members to prefer their culture norms to other news media platform policies. Filak (2004) describes that newspaper employees typically see themselves as better than their television broadcast colleagues, whereas television journalists see themselves as

superior. The study findings include that print journalists believe that what is most important to broadcast journalists is looking good on-air. Furthermore, the study describes that in a work-related setting, bias against journalists of another medium is learned and inherent. Filak's (2004) survey of 189 print and broadcast journalists assesses whether journalists possess characteristics of groups in an intergroup bias dynamic.

Media Convergence and Knowledge Management

In an effort to become more technologically competitive and knowledge intensive, news organizations are experimenting with KM strategies. Additionally, news media organizations are currently dealing with high levels of intergroup bias while experimenting with the benefits of KM. Research indicates that individuals working in converged news media organizations are confronted with intergroup bias (Filak, 2004). News media convergence and knowledge management are connected by three common threads: they are driven by the vehicle of digital technology, they are knowledge-age institutions, and they require teamwork and collaboration (Latham & Sassen, 2005). Digital technology is reshaping news media convergence and KM in a similar fashion. For both news media convergence and KM, digital technology has increased the mobility of knowledge. It has rescaled the capacity to translocate information in digital form among various contexts (Latham & Sassen, 2005). The digital technologies associated with convergence have changed how members of the news media code, share, and integrate knowledge to and from a

variety of channels. Their knowledge is now stored and redistributed on databases around the world via the Internet. Converging media platform technologies have broadened the context of the media as a mobility device for translocating knowledge. In the same way, digital technologies have changed how news media companies manage their knowledge resources.

Convergence and KM both describe how new technologies influence the dynamics and structure of sharing information. The permeation of new technologies in innovative and converging media platforms is influencing the culture of sharing and integrating knowledge. The industrial-age technology provided a limited number of media and provided limited amounts of knowledge (Quinn, 2004). Because of digital technology, the number of media channels and the amount of knowledge has grown exponentially. But with so many publishers of content many feel the distinguishing marks of journalists are beginning to blur (Singer, Hayes, & Ceppos, 2007). Singer teaches an online journalism class at the University of Iowa. Her students still believe that a journalist is someone you trust to give you information (2007). This trust is being compromised as more channels present themselves as credible news outlets. Singer, Hayes, and Ceppos (2007) refer to this as the journalism of argument and assertion brought on by the need for 24-hour news channels to fill time. These arguments often are based in media hype more than credible journalism. The *Project for Excellence in Journalism* found that the public considered these news outlets as credible as broadcast news (Pew, 2005). What is more concerning about the Pew study is that the shift was not due to cable news

organizations' credibility gains, but rather viewers' loss of confidence in network news (2005).

Given the repercussions of news media convergence and the need to remain credible, news media organizations should benefit by introducing knowledge management processes and becoming knowledge-age institutions (Quinn, 2004, np). Producers, reporters, photographers, editors, engineers, graphics artists, and other staff members generate a wealth of intangible assets and this intellectual capital needs to be harnessed in order for news media organizations to stay competitive. Journalists gather and process data and information, but in order to change those data and bits of information into something useful, journalists need to sort the wheat from the chaff (Pew, 2005). The process of making information manageable is similar to the codification process, a fundamental piece of KM. Shenk (1997) argues that journalists need to develop and employ KM skills because of the Internet and the abundance of information. The changing of newsroom functions to align with new working methods demonstrates why KM is especially effective when combined with convergence. KM is being used as an advantage to capture resources that would otherwise go unnoticed.

Quinn provides this example: a newsroom needs to interview a politician who has arrived unannounced and only speaks Farsi. Does the newsroom have a list of all languages the news staff members speak? A newsroom that practices KM would have such a list (2004, np). News media convergence describes news platform integration and KM explains the technological processes that facilitate integration.

Journalists are beginning to think of themselves as working in news rather than a newspaper or television station. Regardless of the medium, the raw materials are bits of information.

News media convergence, similar to KM, requires a culture that encourages teamwork, collaboration, and a systematic approach to managing information. These features merit a major restructuring but the needed changes are being met with resistance. The resistance is primarily because the restructuring is contrary to the way journalists have operated in the past (Filak, 2004). Traditionally, the employee work areas were divided in newsrooms and that division inhibited creative thinking. Today many media organizations are making efforts to change where employees work. The *Media General* site, which houses the *Tampa Tribune*, *WFLA*, and *TBO.com*, is seen as an appropriately designed newsroom for convergence and KM. The employees for the print, online, and broadcast platforms all work in the same location, many on the same floor. The literature suggests that convergence encourages the development of KM capabilities, and this current study will examine the interactions of these phenomena.

Summary

According to sources cited in this literature review , the structure of KM involves developing infrastructure and process capabilities (Gold et al.) which when present in news organizations should stimulate and increase intergroup contact (Allport, 1954) between print and online journalists, and print and broadcast

journalists. A resulting decrease in levels of intergroup bias (Sherif, 1958) exhibited by print journalists towards online and broadcast journalists working in converged media organizations (Filak, 2004) is revealed as intergroup contact increases. The next chapter describes the methods of this study.

CHAPTER 3

METHODS

A correlational study was used to assess the relationships among the constructs. An instrument that measures each construct was used to gather data from print journalists about their level of experience with KM capabilities, amount of intergroup contact, and level of intergroup bias. The following section will discuss the sample of the study, the instrument, data analysis, and limitations of the study.

Sample

A convenience sample of print journalists was drawn from various markets throughout the United States. The vast majority of journalists are involved in some level of convergence because most news organizations produce at least a print and web version of their news product. The print journalists were recruited from an Internet list attained from an online search and from personal contacts with professionals working at print news companies. Electronic questionnaires were used and sent via email.

Instrument

For the purpose of this study the researcher constructed a questionnaire based on existing instruments to measure three constructs: KM capabilities, intergroup

contact, and intergroup bias, which are described later in this chapter. The first measure pertains to the employee's perception of their organization's knowledge infrastructure and their organization's capability for processing knowledge. Using a 5-point Likert-type scale, employees rated their organization based on this variable (see Appendix A). In addition to Zheng (2009) and Gold et al. (2001), other researchers have found acceptable reliability for scores resulting from this instrument. Kiessling, Richey, Meng, and Dabic (2009) applied this instrument in their study of different firms located in Croatia. They measured the organization's knowledge management capabilities as an indication of KM salience and effectiveness. Liao (2009) adapted the instrument from Gold et al. to explore organizational learning as a bridge between KM and organizational performance. The instrument was the primary measure of KM effectiveness.

The second part of the questionnaire measures the employee's level of intergroup contact. This scale contains 5-point Likert-type scaled items that identify the level of contact print journalists have with broadcast and online journalists (see Appendix B). Yamamoto, Randall, Takeda, and Leelamanit (1996) adapted intergroup contact theory to measure contact between medical students and patients with disabilities. Using the instrument to measure the contact, the authors compared first year medical students to fifth and sixth year medical students who were finished with the psychiatric curriculum. Results showed that increased contact over time led to more favorable attitudes toward disabled persons.

The third part of the questionnaire measures print journalists' bias towards online and broadcast news journalists (Doise & Sinclair, 1973) (see Appendix C). The questionnaire contains statements that identify print journalists' view of online and broadcast journalists ranging from intelligence to morality (Byrne, 1971). This portion of the instrument contains 5-point Likert-type response scaled items that allows print journalists to rate members in their group and journalists in online and broadcast journalism. A high score on this instrument indicates a low level of bias and vice versa.

After the research approval was granted by the Institutional Review Board, questionnaires were hand delivered during work site visits, and e-mailed to the print media employee's work e-mail address. Each participant received a greeting paragraph that included the following: contact information for IRB and the researcher, purpose of the study, explanation of voluntary participation, and explanation that they would not be penalized for not participating or rewarded for participating (see Appendix D). They also received a questionnaire consisting of three measures (KM capabilities, intergroup contact, and intergroup bias) as well as a set of demographic questions.

Measuring KM Capabilities

Items that pertained to the employee's perception of their organization's level of KM were drawn from the Gold et al. (2001) study that outlined organizational capabilities of KM. The dimensions associated with KM process and infrastructure

capabilities were modified for the population of this study. Gold et al. (2001) measured KM infrastructure capabilities with the subscale items of technology, structure, and culture (see Appendix A). The KM process capabilities portion of the measuring instrument is comprised of subscale items that enable employees to rate their organization's ability to acquire and convert knowledge. The instrument used to measure the KM capabilities of an organization for the Gold et al. study (2001) was used for this current study. The construct validity of the instrument was affirmed via a confirmatory factor analysis. Gold et al. set out to determine organizational effectiveness using informant responses to questions pertaining to their organization's KM processes. The study found that an organization's knowledge infrastructure and knowledge process capabilities contribute uniquely to the achievement of KM's impact on overall organizational effectiveness (2001).

The Gold et al. (2001) instrument was modified to measure the KM activities relevant to the sample of this study. In measuring the dimensions of their (respondents') organization's knowledge infrastructure capabilities, items associated with technology, structure, and culture were not modified for this study. However, drawing from Zheng et al.'s (2009) analysis for revising the instrument, selecting only the items that displayed construct validity with a factor loading above 0.75, the following items were used (see Appendix A). The measurement model for knowledge management infrastructure capabilities displayed adequate model fit (NNFI1 = .90, CFI2 = .91). As in the Zheng et al. (2009) study, because of the large number of items used in Gold et al. (2001), only items most applicable to this study

were selected. Similarly, items that measure knowledge acquisition, conversion, and application were selected to measure KM process capabilities. Eighteen items were incorporated into the scale (see Appendix A).

Measuring Intergroup Contact

This study used an employee's mean score from the set of Likert-type response scaled items to determine the amount of contact an employee experiences with other employees outside of his/her group. Yuker and Hurley's (1987) contact with persons with disabilities (CDP) instrument contained 20 items (see Appendix E), ten of which were used for this study. The scale to be used for these items indicated 1 for no contact, 3 for intermediate contact, and 5 indicated extensive contact. The scale was designed to provide a measure of the quantity and quality of contact with persons with disabilities. Only the portion designed to measure the quantity of contact (the first 10 items) was used for this study.

Because the instrument was devised to determine contact with persons with disabilities, items were altered for this study. For example, "I often have had long talks with a person who is physically disabled" was changed to "I often have had long talks with someone outside my department." The instrument was comprised of ten items that allowed employees to report how often they have had contact with others outside their department. These departments were identified in the demographic section of the questionnaire. For example, the questionnaire asked the employee to identify the following groups in their organization from a choice of print

employee, broadcast employee, and online employee (see Appendix B). These groups were devised from the research reviewed pertaining to the sample of this study.

Measuring Intergroup Bias

The items that assess the employee's level of intergroup bias were drawn from Byrne's (1971) study using his self-created Interpersonal Judgment Scale (IJS). The IJS measures attraction that one person has for another. It uses 6 items of which 4 are used to mask the instrument's purpose and 2 "liking" and "desirability" items used to measure attraction. Many studies have utilized this scale to assess attraction as a matter of one's overall judgment towards others (Allen, 2002). Norton, Pettegrew, and Land (1975) utilized the IJS and found that people who are perceived to be relaxed and animated are better liked and those people perceived to be relaxed are also judged as being more desirable coworkers. Sunnafrank (1984) utilized a modified version of the IJS in a study to argue that communication is a moderator that eliminates the effect that similarity of attitude has on interpersonal attraction.

The IJS is a reliable tool for measuring attraction in individuals who are acquaintances and not in developed relationships such as marriages (Allen, 2002). This study used the IJS to measure the perception that print journalists have of broadcast and/or online journalists. A modified version of the IJS was utilized. It assessed a total of 5 items including Intelligence, Knowledge, Working Together, Personality Traits, and Ethics to elucidate levels of intergroup bias (see Appendix C).

Using this modified IJS scale, each print journalist was asked to rate print journalists, broadcast journalists, and online journalists. This study used an employee's mean score from the set of Likert-type response scaled items to assess respondents' level of intergroup bias. Intergroup bias was determined by evaluating the differences in the mean score for the three groups. The instrument for this study contained 42 items that measure KM capabilities, intergroup bias, and intergroup contact.

Data Analysis

This study utilized a multiple linear regression analysis to examine the influence the independent variable "KM capabilities" has on the dependent variables "intergroup contact" and "intergroup bias." Data were analyzed using SPSS for Windows release 16.1. SPSS was used to analyze the "KM capabilities" mean score of workers in print news media organizations and the mean score based on the constructs of "intergroup contact" and "intergroup bias." Using scores from the instrument, an SPSS linear regression analysis was used to measure the strength of the relationship between KM capabilities, intergroup contact, and intergroup bias. Power analysis showed that with three predictors, $N = 100$, $\alpha = .05$, and a small ($R^2 = .15$) effect size, a power of .90 would be attained. With two predictors, a .95 power would be attained.

Delimitations

Several delimitations are posited in the present study. An initial concern is that the study does not account for the different dynamics from one news organization to another. For example, distinct differences between the responses of employee "A" and employee "B" may be closely associated with differences in their work environments. Differences in the work environment can include the number of employees, the number of news platforms, and the size of the news market that is being served. This study examines pre-specific constructs assessed by empirical instruments and does not take into account how other constructs might influence the results.

Variations in group sample sizes could have given some organizations' returns more influence than others. However, participants were selected from organizations that have similar characteristics in terms of their number of media platforms (print, broadcast, and online) evident on their company webpage. Additionally, intergroup contact and intergroup bias were based on an employee's view of the news platforms without detailed explanation of the nature of the contact or bias. Moreover, because the responses were subjective, unmeasured covariates or confounders could have influenced the reported levels of intergroup bias, intergroup contact, and KM capabilities that are unaccounted for in the results.

Summary

Print journalists from a broad range of markets responded to an electronic survey they received via e-mail. They were asked questions about their organization's KM capabilities, intergroup bias, and intergroup contact toward online and broadcast workers. This study is based on 101 questionnaires completed over a period of 1-2 months. The next chapter reports the findings regarding the relationship between the three variables; KM infrastructure capabilities, intergroup bias, and intergroup contact.

CHAPTER 4

RESULTS

The data for this study were collected through an electronic survey targeted to 685 print journalism professionals. Of the 685 survey instruments sent out, 101 were completed and all (100%) were web responses, constituting a response rate of 15.21%. Among the respondents, 100% were print journalism professionals currently working throughout the United States in newsrooms that were identified by the latest Poynter Institute (2003) and a review of their newspaper website as having a print, online and broadcast product of some type either via collaboration with another organization or completely within their organization. Most of the newspaper web pages included a broadcast news product. Surveys were emailed to addresses found on a newspaper's webpage to a broad range of journalists working in the following cities; New York, NY; Los Angeles, CA; Dallas, TX; Miami, FL; Portland, OR; Sacramento, CA; San Diego, CA; Kansas City, MO; Atlanta, GA; Chicago, IL; Aurora, IL; Rockford, IL; Charlotte, NC; Richmond, VA; Rocklin, MA; Tampa, FL; Detroit, MI; and Fresno, CA. Additionally, email requests to take part in the survey were sent to members of the Northern Illinois Newspaper Association. The email included a greeting and a link to the survey which was housed on freesurveysonline.com. Because of the sensitive nature of the questions,

respondents were provided with anonymity and only asked to reveal their sex, years of experience working in the print news industry, and job title.

Missing values were replaced using hot deck imputation procedures. Of the 101 respondents 61 were male and 40 were female. The ratio of male to female respondents is consistent with other research that identifies the percentage of women and men working in the print news industry today. The Media Report to Women (2011) found that women working full-time in daily newspapers total about 15,200 or 36.62 percent, a number that has risen slowly since the 1970s. Recently the American Society of News Editors (2011) reported that women made up 39.92 percent of the work force at American newspapers. Table 1 presents the experience of the survey respondents by gender.

Table 1

Experience in Years of Study Participants, by Gender

	Experience			
Sex	*M*	*N*	*SD*	*SE*
Male	23.98	61	11.40	1.46
Female	16.20	40	9.87	1.56

Of the responses analyzed, the overall mean number of years of professional experience for both men and women ($M = 21.09$) differed significantly between men ($M = 23.98$) and women ($M = 16.2$, $SD = 11.43$), with $t(99) = 3.53$, $p = .001$. This

variance can be explained by studies that report female journalists increasingly being hired in the print journalism industry.

Ninety-two of the 101 respondents indicated their job title (see Appendix F). Figure 2 provides the distribution of job titles given by each respondent. Based on these responses, 37.90% of the respondents indicated their job title as some type of reporter; 29.30% gave their title as editor, copy editor, news editor, etc.; 14.10% listed their job title as a news writer, writer, or staff writer; 8.60% listed their title as photographer or photo editor; 5.40% listed their job title as a manager or managing editor; and 5.40% listed their job title as something not represented by any other respondent.

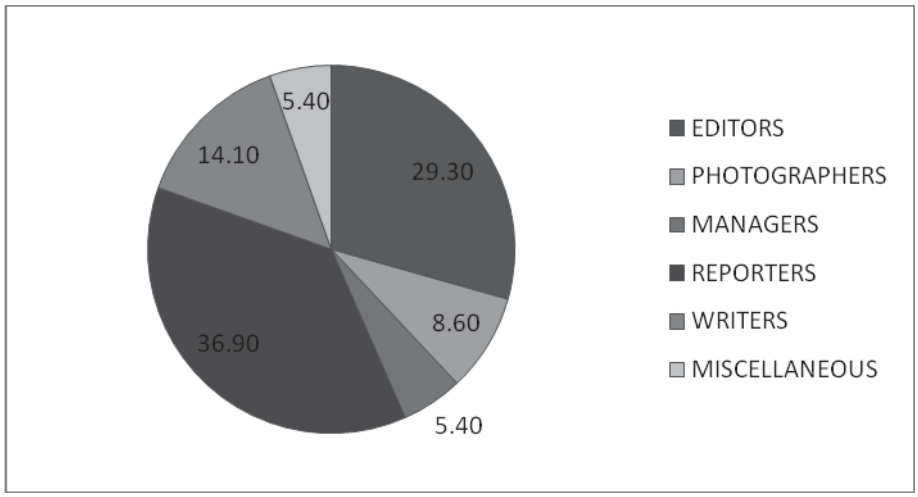

Figure 2. Distribution (percent) of study participant job titles.

When compared to data presented by the American Society of News Editors (2012), consistencies with the data for this study can be seen in the percentages of

self-reported job titles. In their 2012 number and percentages of men and women by job category report, 44.59% indicated their job title as reporter/writer compared to 51.00% in this study; 21.85 indicated their job title as editor compared to 29.30% in this study; 8.73% indicated their job title as photographer compared to 8.60 in this study. However, ASNE data were not aligned with this study in the number of self-reported managers and the number of supervisors.

Because the survey items were adapted from instruments used in previous studies, it was important to assess the reliability and validity of the scores obtained from the instruments. Cronbach's coefficient alpha (α) was used to assess the reliability of scores from each of the constructs: KM infrastructure capabilities (technology, structure, and culture), KM process capabilities (acquisition, conversion, and application), Intergroup Contact (with print, online, and broadcast journalists) and Intergroup Bias (towards, print, online and broadcast journalists).

The first instrument measured a respondent's perceived level of his/her organization's KM infrastructure and process capabilities. In terms of reliability of scores from the KM instrument, Cronbach's alpha for all items on the two subscales combined was $\alpha = .94$. Cronbach's alpha for scores on the KM infrastructure capabilities subscale was $\alpha = .89$; technology was $\alpha = .84$; structure was $\alpha = .75$; and culture was $\alpha = .84$, all indicating that the measures provide reliable scores. Cronbach's alpha for scores from the KM process capabilities subscale was $\alpha = .92$; acquisition was $\alpha = .81$; conversion was $\alpha = .90$; and application was $\alpha = .89$, all indicating that the measures are reliable (see Figure 3).

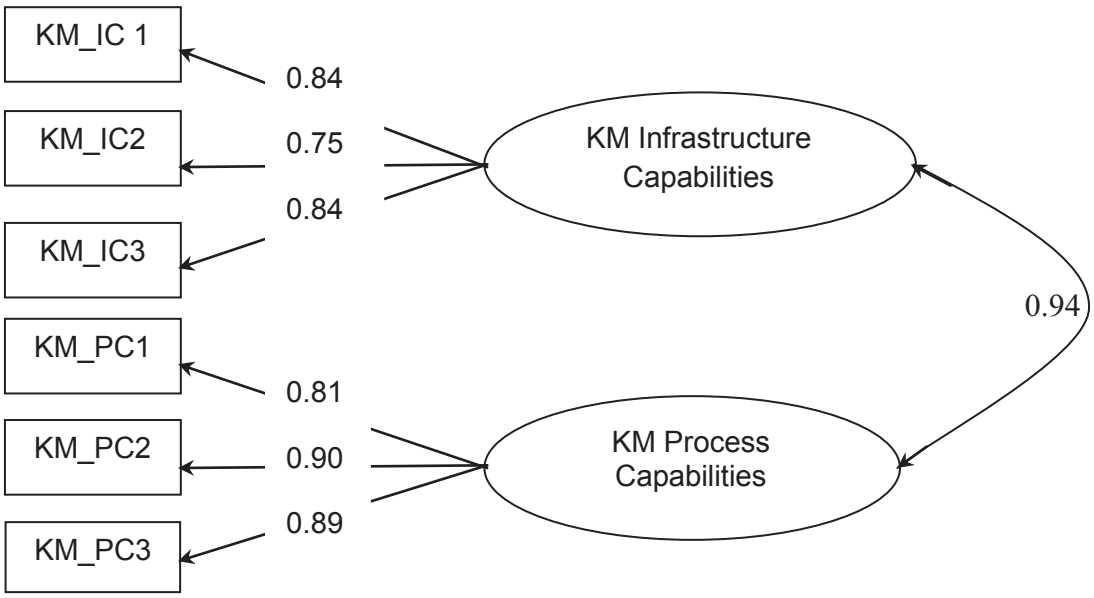

Figure 3. Reliability of the subscales associated with Knowledge Management instrument.

The second instrument measured a respondent's perceived level of intergroup contact with print, online, and broadcast journalists connected with the respondent's organization. In terms of reliability for the KM instrument, Cronbach's alpha for scores from all items on the three subscales was $\alpha = .88$. Cronbach's alpha for intergroup contact with print journalists was $\alpha = .85$; intergroup contact with online journalists was $\alpha = .89$; and intergroup contact with broadcast journalists was $\alpha = .94$, all indicating that the measures are reliable (See Figure 4).

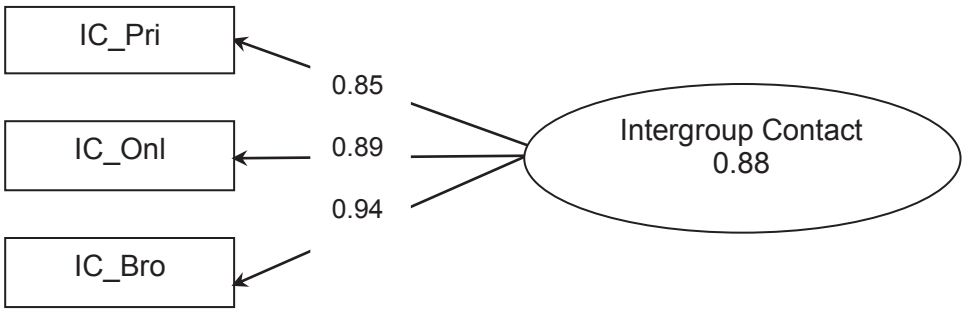

Figure 4. Reliability of the subscales associated with Intergroup Contact instrument.

The third instrument measured a respondent's perceived level of intergroup bias towards print, online, and broadcast journalists connected with the respondent's organization. High scores on this instrument reflected low levels of intergroup bias and vice versa. In terms of reliability for scores from the KM instrument, Cronbach's alpha for scores from the entire instrument was $\alpha = .88$. Cronbach's alpha for intergroup bias towards print journalists subscale was $\alpha = .68$, indicating a moderate to high level of reliability; reliability for the intergroup bias towards online journalists subscale was $\alpha = .88$; and reliability for the intergroup bias towards broadcast journalists subscale was $\alpha = .84$, all indicating that the measures are reliable (see Figure 5).

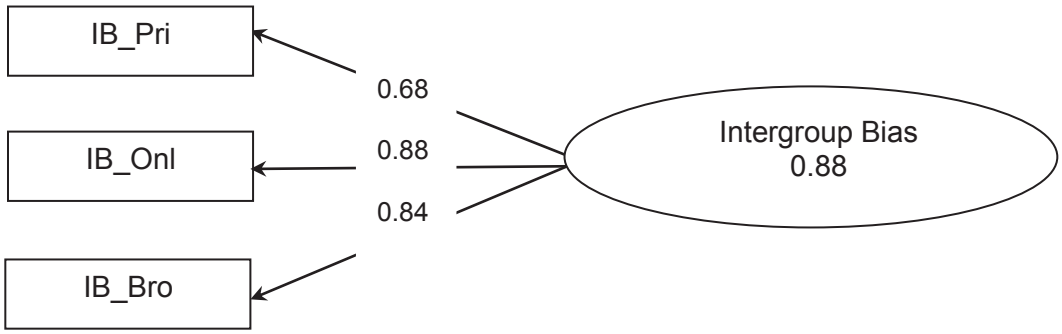

Figure 5. Reliability of the subscales associated with Intergroup Bias instrument.

Of the responses (N =101) for KM infrastructure capabilities, the overall mean score was M = 3.35, SD =.84. Of the responses N = 101 for KM process capabilities the mean score was M = 3.06, SD = 0.88. An examination of the histograms for both subscales associated with the KM showed a negative skewness (see Figures 6 and 7).

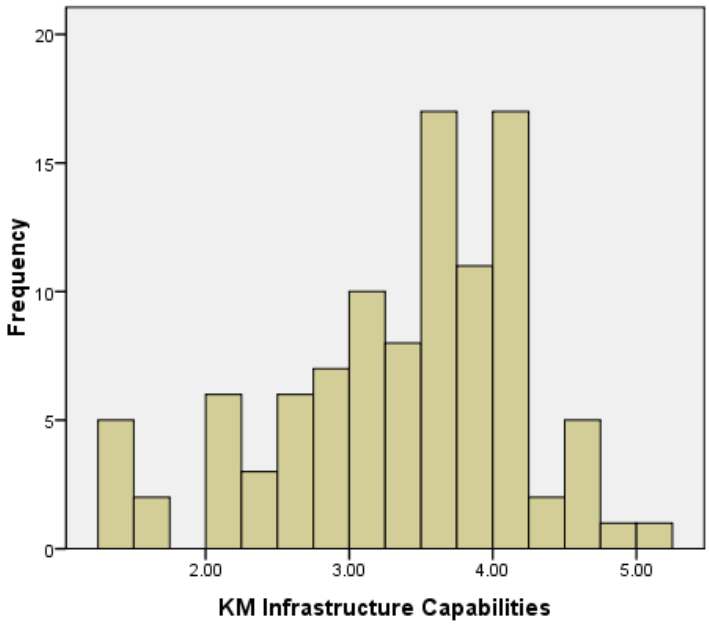

Figure 6. Histogram for KM infrastructure capabilities subscale scores.

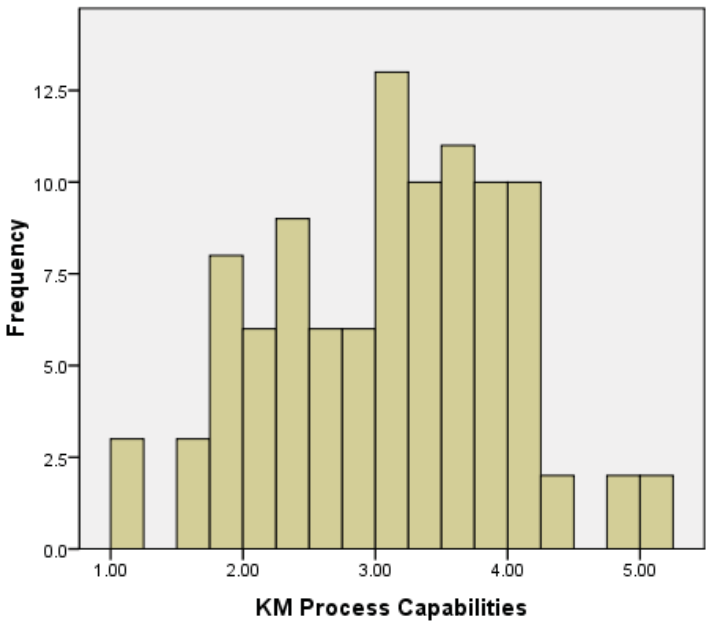

Figure 7. Histogram for the KM process capabilities subscale scores.

For the responses (N =101) on the intergroup contact with print journalists subscale, the overall mean score was M = 3.9, SD =1.06. For the responses (N =101) on the intergroup contact with online journalists subscale, the overall mean score was M = 3.54, SD =1.25. For the responses (N = 101) on the intergroup contact with broadcast journalists subscale the mean score was M = 1.56, SD = 1.00. An examination of the histograms for all three subscales associated with intergroup contact showed negative skewness for intergroup contact with print and online journalists, and a positive skew for intergroup contact with broadcast journalists (see Figures 8, 9, and 10).

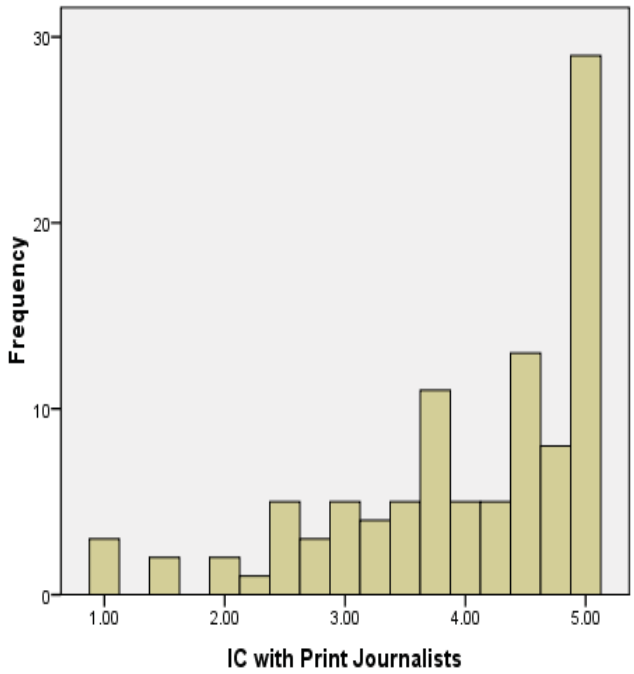

Figure 8. Histogram of intergroup contact with print journalists subscale score.

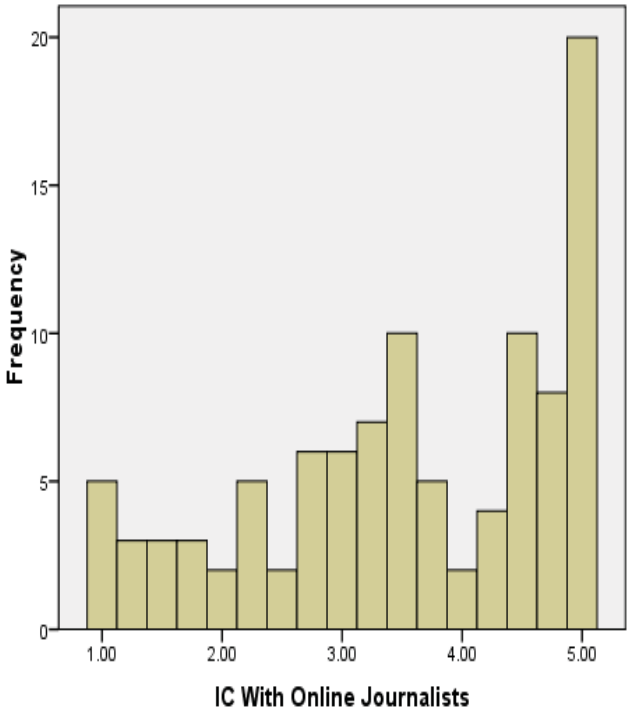

Figure 9. Histogram of intergroup contact with online journalists subscale score.

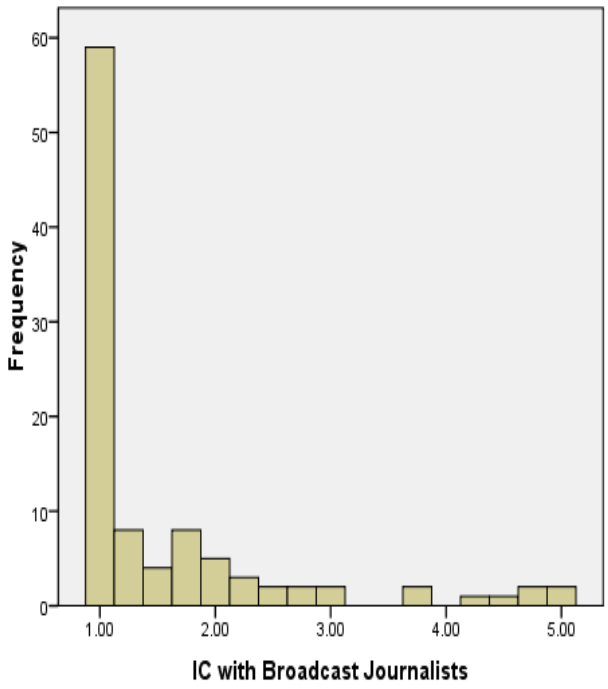

Figure 10. Histogram of intergroup contact with broadcast journalists subscale score.

Of the responses (N =101) for the intergroup bias towards print journalists subscale, the overall mean score was M = 5.10, SD =.59. For responses (N =101) on the intergroup bias towards online journalists subscale, the overall mean score was M = 4.07, SD = 1.07. For responses (N = 101) on the intergroup bias towards broadcast journalists subscale the mean score was M = 3.26, SD = 1.09. An examination of the histograms for all three subscales associated with intergroup bias showed negative skewness for bias toward print and online journalists and a positive skew for bias towards broadcast journalists (see Figures 11, 12, and 13).

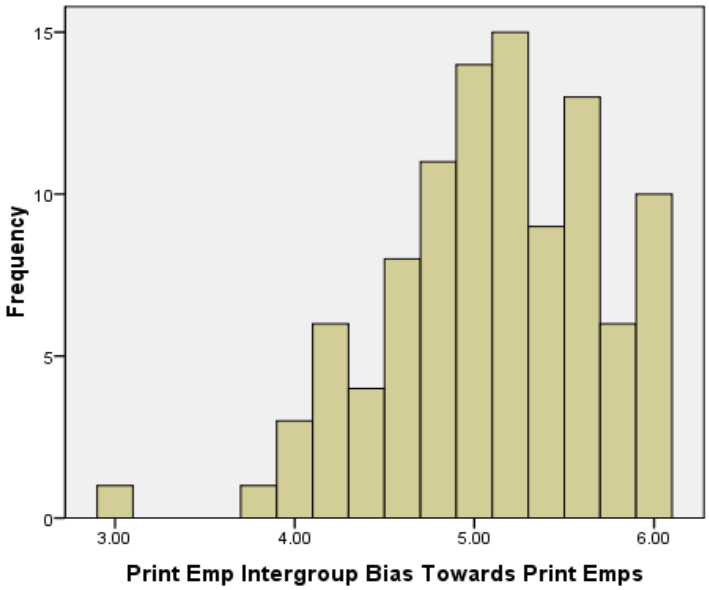

Figure 11. Negative skewness of the intergroup bias towards print journalist subscale scores.

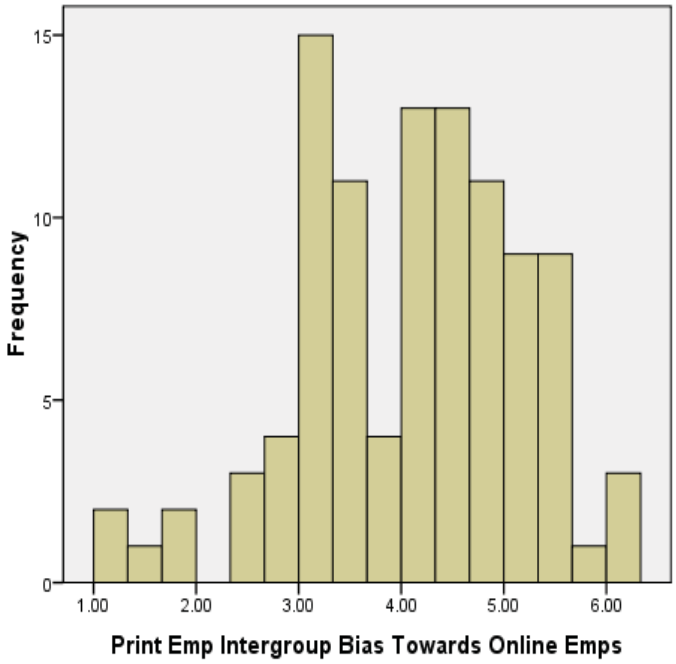

Figure 12. Negative skewness of the intergroup bias towards online journalist subscale scores.

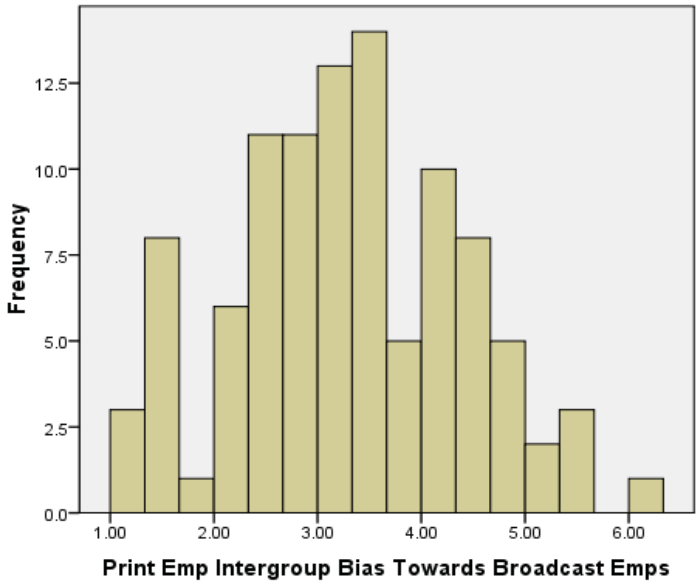

Figure 13. Positive skewness of the intergroup bias towards broadcast journalist subscale scores.

Intergroup Contact with All Journalists

Multiple regression analysis was used to address research question 1, which examined the relationship between print journalists' perception of their organization's KM capabilities and their perceived level of intergroup contact with online and broadcast news journalists. The KM capabilities variable served as the predictors, and consisted of two constructs: Infrastructure Capabilities and Process Capabilities. Perceived level of intergroup contact served as the outcome (dependent) variable. Regression assumptions of homoscedasticity (see Figure 14) and normality of residuals were assessed and met (see Figure 15). Lack of multicollinearity was evident, with VIF values less than 10. As indicated by the

regression analysis (see Table 2), print journalists' perception of their organization's KM infrastructure capabilities significantly and positively predicted the overall level of intergroup contact with all other journalists ($\beta = 0.50$, $p < .01$).

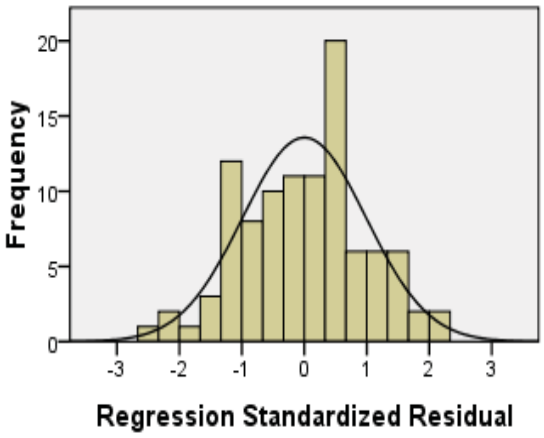

Figure 14. Scatterplot of regression residuals and standardized predicted value of intergroup contact (all journalists). Mean = 3.00E-16; Std. Dev. = 0.99; N = 101

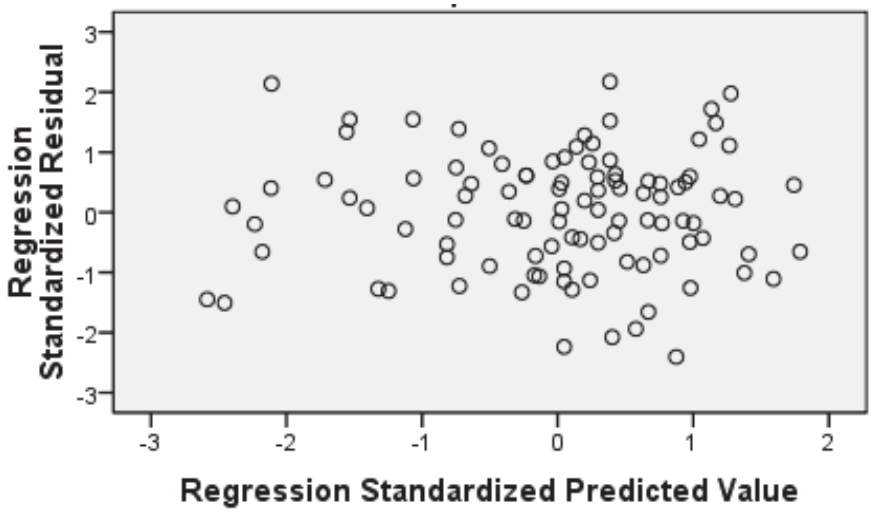

Figure 15. Histogram of regression residuals and standardized predicted value of intergroup contact (all journalists).

Table 2

Results for Regression of KM Infrastructure and Process Capabilities on Print Journalists' Intergroup Contact with All Journalists

Variable	B	SE (B)	β	*t*	*P*
KM Infrastructure Capabilities	0.49	0.13		3.59	0.00
KM Process Capabilities	-0.10	0.13	-0.10	-0.77	0.44

a. Dependent variable: print journalists intergroup contract with all journalists.
R^2 = .181

Moreover, the results indicate that although the variable KM infrastructure capabilities was a significant predictor of intergroup contact between print journalists and all other journalists, KM process capabilities did not significantly predict this outcome (β = -0.10, p = .44). The regression coefficients suggest that the variable KM Infrastructure Capabilities is associated with an increase in the amount of intergroup contact between print journalists and print, online, and broadcast journalists connected with their organization. Eighteen percent of the variability in Intergroup contact was explained by the predictors.

Intergroup Contact with Print Journalists

Multiple regression analysis was also used to examine the relationship between print journalists' perception of their organization's KM capabilities and their perceived level of intergroup contact with other print journalists. Again, the KM capabilities variable served as the predictor, and consisted of two constructs:

Infrastructure Capabilities and Process Capabilities. Regression assumptions of homoscedasticity (see Figure 16) and normality of residuals (see Figure 17) were assessed and were not met. Lack of multicollinearity was not evident, with VIF values less than 10.

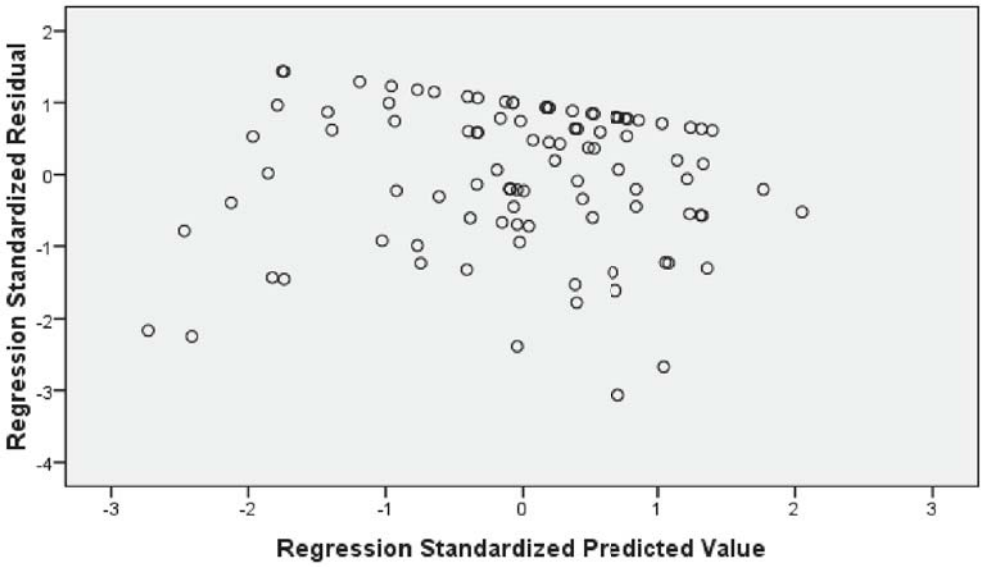

Figure 16. Scatterplot of regression residuals and standardized predicted value of intergroup contact (print journalists).

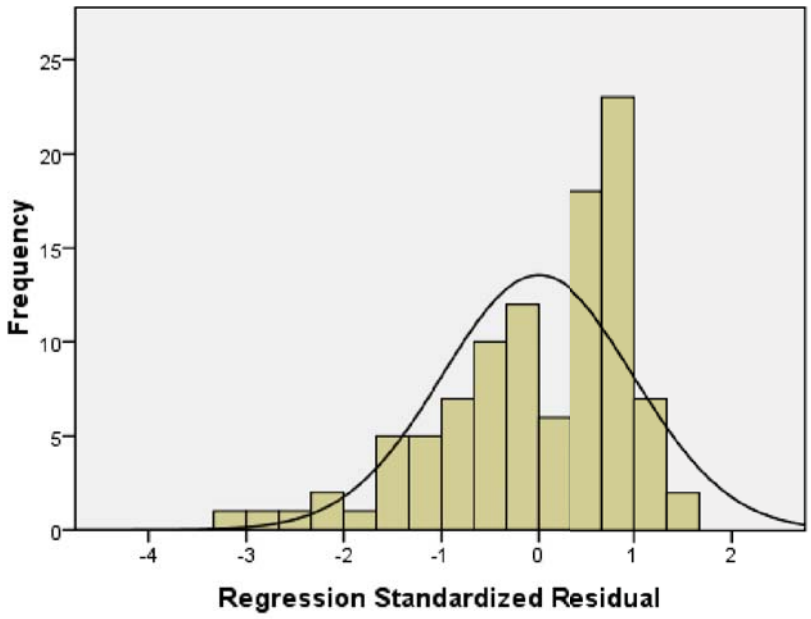

Figure 17. Histogram of regression residuals and standardized predicted value of intergroup contact with print journalists. Mean = 1.14E-16; Std. Dev. – 0.99; N = 101

As indicated by the regression analysis (see Table 3), print journalists' perception of their organization's KM infrastructure capabilities significantly and positively predicted the level of intergroup contact with other print journalists (β = 0.36, $p < .01$). Moreover, the results indicate that although KM infrastructure capability was a significant predictor of intergroup contact between print journalists and other print journalists in an organization, KM process capabilities did not significantly predict this outcome (β =- 0.16, p = .28). Sixty-five percent of the variability in intergroup contact with print journalists was predicted by these variables.

Table 3

Results for Regression of KM Infrastructure and Process Capabilities on Print Journalists' Intergroup Contact with Print Journalists

Variable	B	SE (B)	β	*t*	*P*
Constant	3.08	0.43		7.14	0.00
KM Infrastructure Capabilities	0.45	0.19	0.36	2.38	0.02
KM Process Capabilities	-0.19	0.18	-0.16	-1.08	0.28

a. Dependent variable: print journalists' intergroup contact with print journalists.
$R^2 = 0.65$

In that the regression assumptions of homoscedasticity (see Figure 18) and normality of residuals (see Figure 19) were not met, *IC with print journalists* (outcome variable) was transformed using a logarithmic transformation. After the transformation the regression assumption of homoscedasticity (see Figure 19) was met and the residuals were less strongly skewed (see Figure 20).

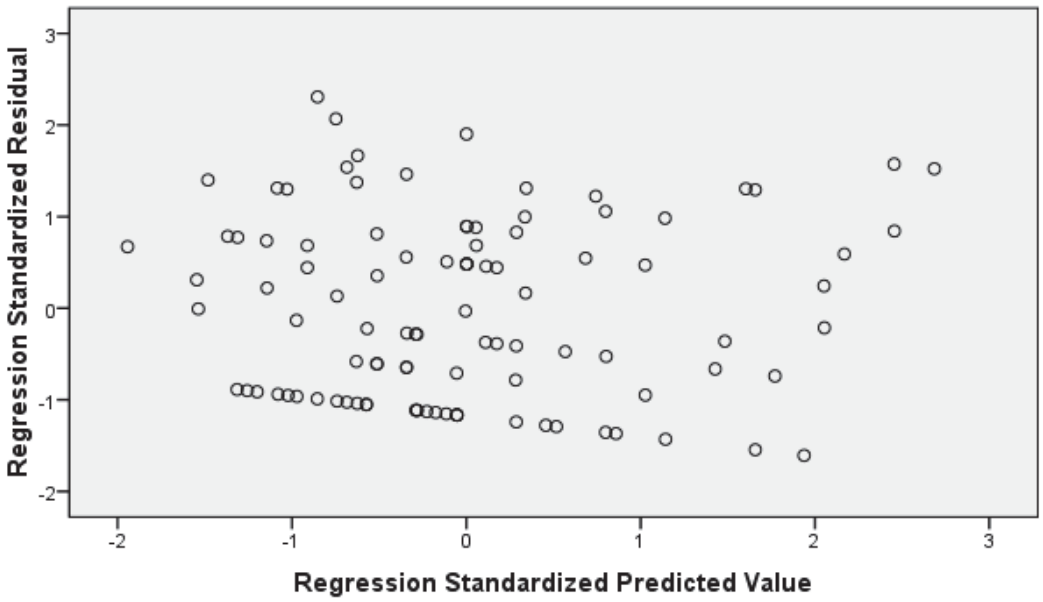

Figure 18. Scatterplot of regression residuals and standardized predicted value of intergroup contact (print journalists).

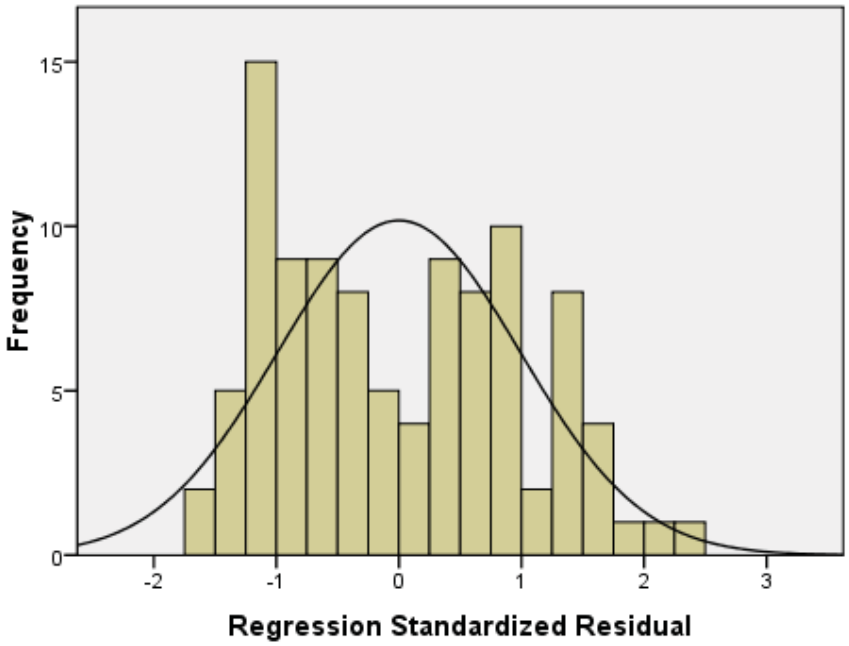

Figure 19. Histogram of regression residuals and standardized predicted value of intergroup contact (print journalists). Mean = 9.37E-17; Std. Dev. = 0.99; N = 101

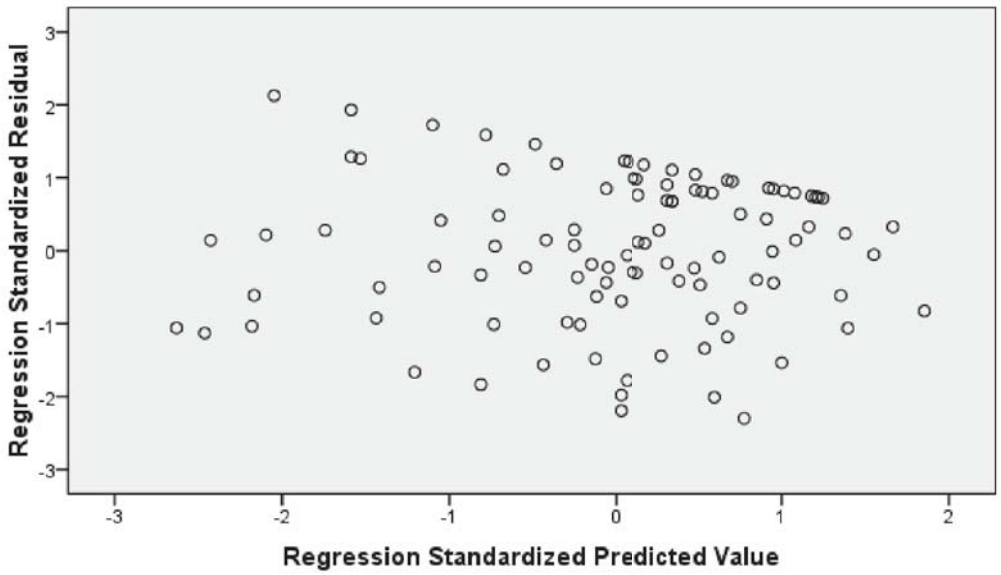

Figure 20. Scatterplot of regression residuals and standardized predicted value of intergroup contact (online journalists).

As indicated by the regression analysis (see Table 4), print journalists' perception of their organization's KM infrastructure capabilities significantly predicted the level of intergroup contact with other print journalists (β = -0.28, p = .006). Moreover, the results indicate that KM process capabilities did not significantly predict this outcome (β =- -0.10, p = .51).

Table 4

Results for Regression of KM Infrastructure and Process Capabilities on Print Journalists' Intergroup Contact with Print Journalists (Transformed)

Variable	B	SE (B)	B	*t*	*p*
Constant	0.42	0.09		4.75	0.00
KM Infrastructure Capabilities	-0.07	0.04	-0.28	-1.88	.006
KM Process Capabilities	0.02	0.04	-0.10	0.67	0.51

a. Dependent variable: intergroup contract with print journalists (transformed).
R^2 = .048

Intergroup Contact with Online Journalists

Similarly, multiple regression analysis was also used to examine the relationship between print journalists' perception of their organization's KM capabilities and their perceived level of intergroup contact with online journalists. Regression assumptions of homoscedasticity (see Figure 20) and normality of residuals (see Figure 21) were assessed and met. Lack of multicollinearity was evident, with VIF values less than 10.

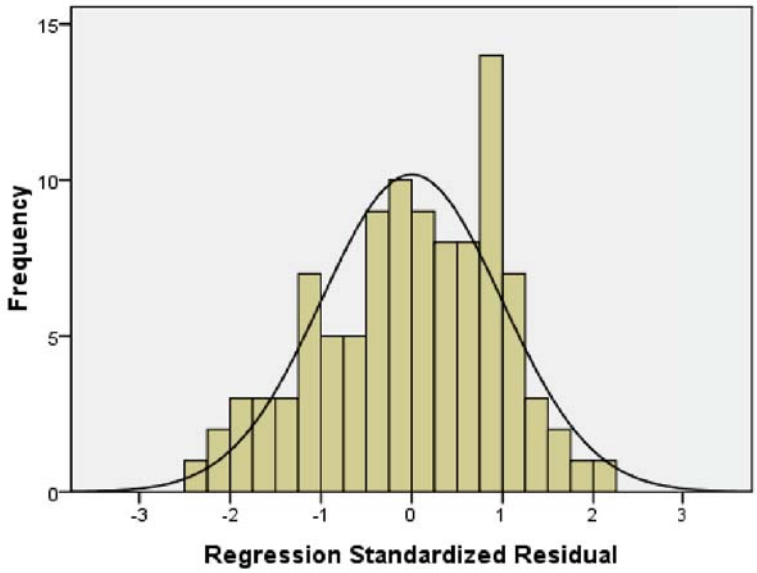

Figure 21. Histogram of regression residuals and standardized predicted value of intergroup contact (online journalists). Mean = -5.07E-16; Std. Dev. = 0.99; N – 101.

The regression analysis (see Table 5) indicates that print journalists' perception of their organization's KM infrastructure capabilities significantly predicted the level of intergroup contact with online journalists (β = 0.49, p < .01). Moreover, while the results indicate that although KM infrastructure capabilities was a significant and positive predictor of intergroup contact between print journalists and online journalists in an organization, KM process capabilities did not significantly predict this outcome (β = -0.13, p = .35). Nearly sixteen percent of the variability in the outcome variable was explained by these predictors.

Table 5

Results for Regression of KM Infrastructure and Process Capabilities on Print Journalists' Intergroup Contact with Online Journalists

Variable	B	SE (B)	B	*t*	*p*
Constant	1.68	0.48		3.48	0.00
KM Infrastructure Capabilities	0.73	0.21	0.49	3.43	0.001
KM Process Capabilities	-0.19	0.20	-0.13	-0.94	0.35

a. Dependent variable: print journalists' intergroup contract with online journalists.
R^2 = .157

Intergroup Contact with Broadcast Journalists

Multiple regression analysis was also used to examine the relationship between print journalists' perception of their organization's KM capabilities and their perceived level of intergroup contact with broadcast journalists. Regression assumptions of homoscedasticity (see Figure 22) and normality of residuals were assessed and not met (see Figure 23). Lack of multicollinearity was evident, with VIF values less than 10. A log transformation of the intergroup contact with broadcast journalists (dependent variable) did not appreciably normalize the residuals. Failure to meet the assumptions of homoscedasticity and normality remains a limitation to the interpretability of this model.

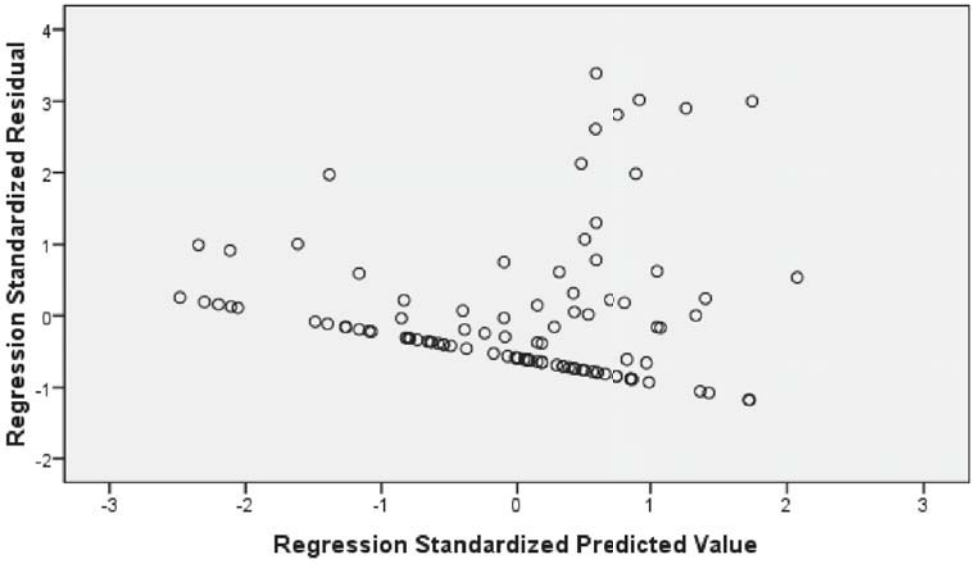

Figure 22. Scatterplot of regression residuals and standardized predicted value of intergroup contact (broadcast journalists).

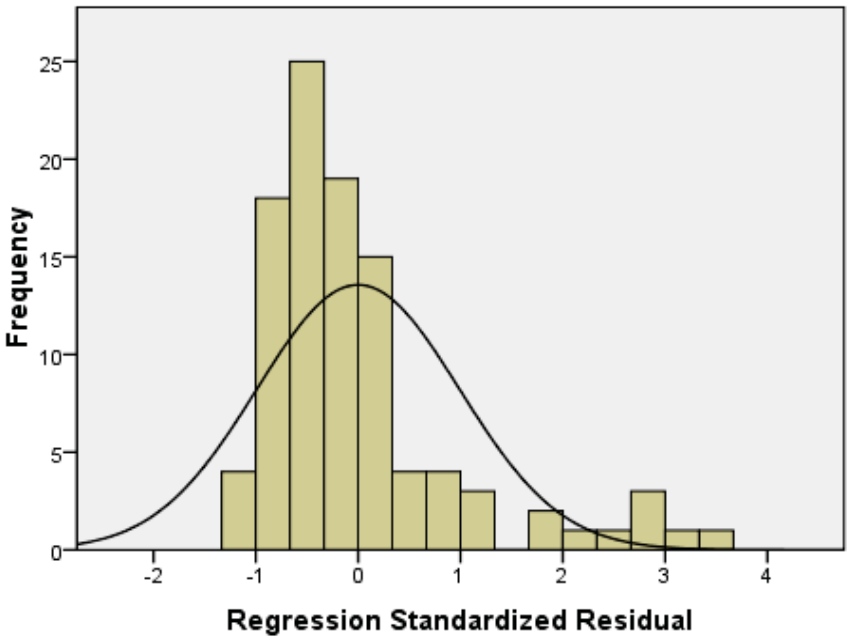

Figure 23. Histogram of regression residuals and standardized predicted value of intergroup contact (broadcast journalists). Mean = 4.46E-16; Std. Dev. = 0.99; N = 101

The regression analysis indicates (see Table 6) that print journalists' perception of their organization's KM infrastructure capabilities did not significantly predict their level of intergroup contact with broadcast journalists ($\beta = 0.27$, $p = .07$). Moreover, the results also indicate that KM process capabilities did not significantly predict this outcome ($\beta = 0.07$, $p = .65$). Ten percent of the variability in the outcome was explained by the predictors.

Table 6

Results for Regression of KM Infrastructure and Process Capabilities on Print Journalists' Intergroup Contact with Broadcast Journalists

Variable	B	SE (B)	β	*t*	*p*
Constant	0.25	0.40		0.64	0.53
KM Infrastructure Capabilities	0.32	0.17	0.27	1.85	0.07
KM Process Capabilities	0.08	0.16	0.07	0.46	0.65

a. Dependent variable: print journalists' intergroup contract with broadcast journalists. $R^2 = .106$

Research question 2 asked, "What was the relationship between print journalists' perception of their organization's KM capabilities and their perceived level of bias towards online and broadcast news journalists?" To address this question, multiple regression analysis was first used to examine the relationship between print journalists' perception of their organization's KM capabilities and their perceived level of bias towards all journalists in their news organization. The

KM capabilities served as the predictor variables, and consisted of two constructs: Infrastructure Capabilities and Process Capabilities. Regression assumptions of homoscedasticity (see Figure 24) and normality of residuals were assessed and met (see Figure 25). Lack of multicollinearity was evident, with VIF values less than 10. As indicated by the regression analysis (see Table 7), print journalists' perception of their organization's KM infrastructure capabilities significantly predicted the level of intergroup bias towards all other journalists ($\beta = 0.33$, $p < .05$). Moreover, the results indicate that although KM infrastructure capabilities was a significant predictor of the amount of intergroup bias print journalists' exhibited towards all other journalists, KM process capabilities did not significantly predict this outcome ($\beta = 0.11$, $p = .41$). Eighteen percent of the variability in the outcome was explained by the predictors.

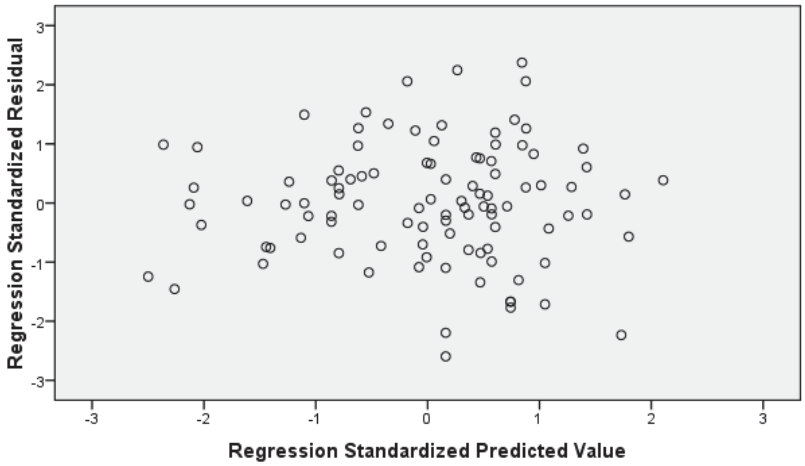

Figure 24. Scatterplot of regression residuals on standardized predicted intergroup bias (all journalists).

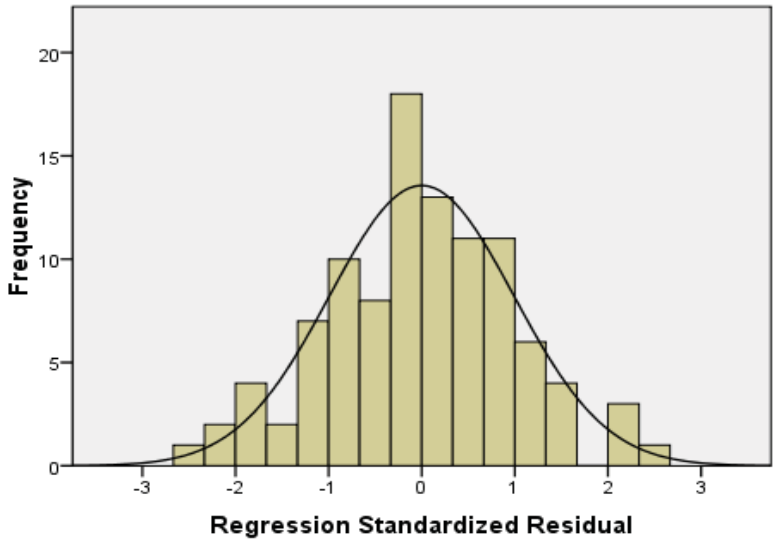

Figure 25. Histogram of regression residuals on standardized predicted intergroup bias (all journalists). Mean = 1.17E-15; Std. Dev. = 0.99; N = 101

Table 7

Results for Regression of KM Infrastructure and Process Capabilities on Print Journalists Level of Intergroup Bias with All Journalists

Variable	B	SE (B)	β	*t*	*p*
Constant	2.88	0.28		10.39	0.00
KM Infrastructure Capabilities	0.29	0.12	0.33	2.39	0.01
KM Process Capabilities	0.09	0.11	0.11	0.82	0.41

a. Dependent variable: print journalists' intergroup bias towards all journalists.
R^2 = .184

The regression coefficients suggest that KM Infrastructure Capabilities had a positive relationship (indicating a reduced level due to the reversed scale; see Appendix C) with the level of intergroup bias print journalists exhibited towards all journalists employed by their organization.

Intergroup Bias Toward Online Journalists

Multiple regression analysis was also used to examine the relationship between print journalists' perception of their organization's KM capabilities and their level of intergroup bias towards online journalists. Again, the KM capabilities served as the predictor variables, and consisted of two constructs: Infrastructure Capabilities and Process Capabilities. Regression assumptions of homoscedasticity (see Figure 26) and normality of residuals (see Figure 27) were assessed and met. Lack of multicollinearity was evident, with VIF values equal to 2.35.

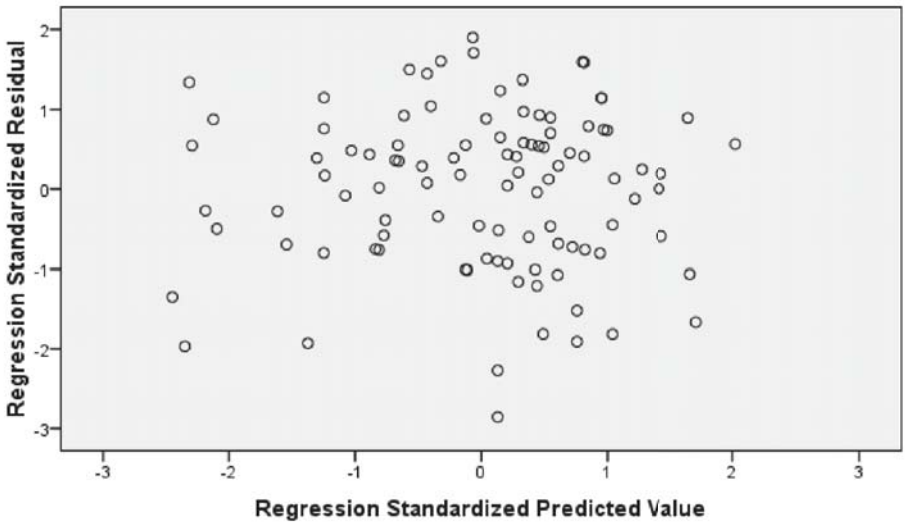

Figure 26. Scatterplot of regression residuals on standardized predicted intergroup bias (Online journalists).

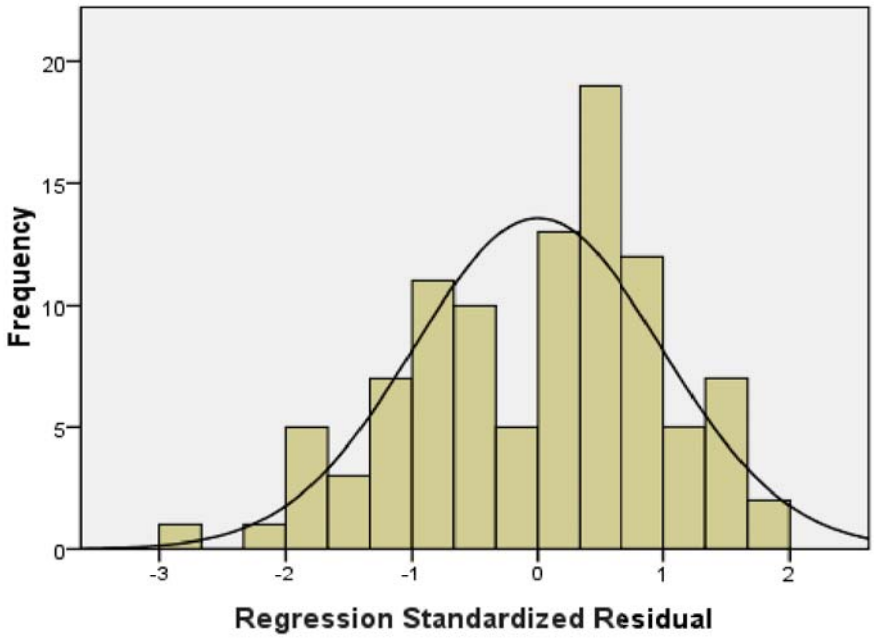

Figure 27. Histogram of regression residuals on standardized predicted intergroup bias (online journalists). Mean = 7.56E-16; Std. Dev. = 0.99; N = 101

As indicated by the regression analysis (see Table 8) there was a statistically significant positive relationship (indicating a reduced level) between print journalists' perceptions of their organization's KM infrastructure capabilities and a reduced level of intergroup bias towards online journalists ($\beta = 0.31$, $p < .05$). Moreover, although the results indicate that the variable KM infrastructure capabilities was a significant predictor of intergroup bias between print journalists and online journalists in an organization, KM process capabilities did not significantly predict this outcome ($\beta = 0.04$, $p = .79$). Nearly twelve percent of the variability in the outcome was explained by the predictors.

Table 8

Results for Regression of KM Infrastructure and Process Capabilities on Print Journalists' Level of Intergroup Bias Towards Online Journalists

Variable	B	SE (B)	β	*t*	*p*
Constant	2.61	0.43		6.12	0.00
KM Infrastructure Capabilities	0.40	0.19	0.31	2.13	0.04
KM Process Capabilities	0.05	0.18	0.04	0.27	0.79

a. Dependent variable: print journalists' intergroup bias towards online journalists.
$R^2 = 0.115$

Intergroup Bias Toward Broadcast Journalists

Multiple regression analysis was also used to examine the relationship between print journalists' perception of their organization's KM capabilities and their level of intergroup bias towards broadcast journalists. Again, the KM capabilities variable consisted of two constructs: Infrastructure Capabilities and Process Capabilities. Regression assumptions of homoscedasticity (see Figure 28) and normality of residuals (see Figure 29) were assessed and met. Lack of multicollinearity was evident, with VIF values less than 10. As indicated by the regression analysis (see Table 9), there was a statistically significant positive relationship (showing a reduced level) between print journalists' perceptions of their organization's KM infrastructure capabilities and a reduced level of intergroup bias towards broadcast journalists ($\beta = 0.30$, $p < .05$). The results indicate that although

KM infrastructure capabilities significantly predicted a reduced level of intergroup bias between print journalists and broadcast journalists in an organization, KM process capabilities did not significantly predict this outcome ($\beta = 0.09$, $p = .63$). High levels of KM infrastructure capabilities were associated with low levels of intergroup bias and vice versa. Fourteen percent of the variability in the outcome was explained by the predictors.

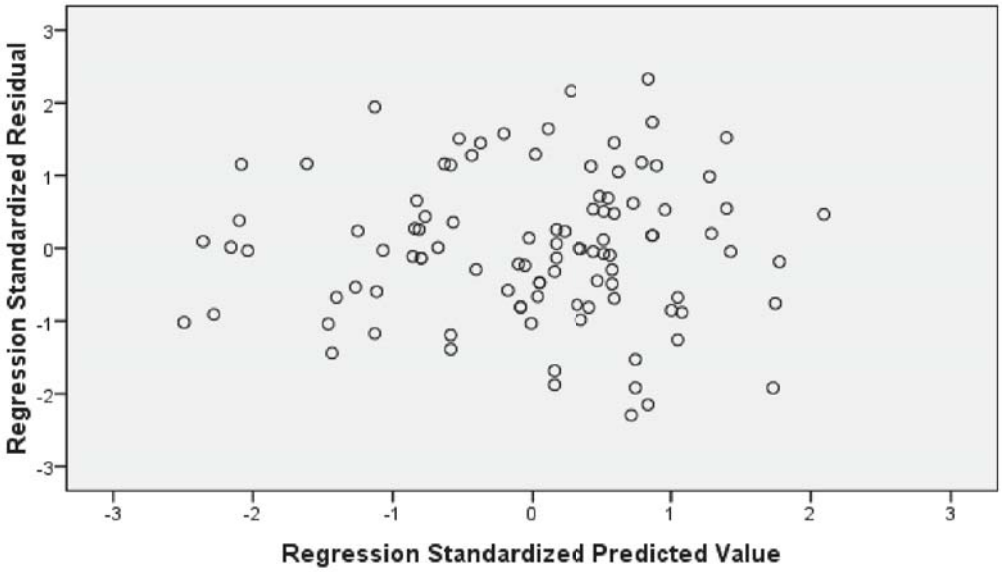

Figure 28. Scatterplot of regression residuals on standardized predicted intergroup bias (broadcast journalists).

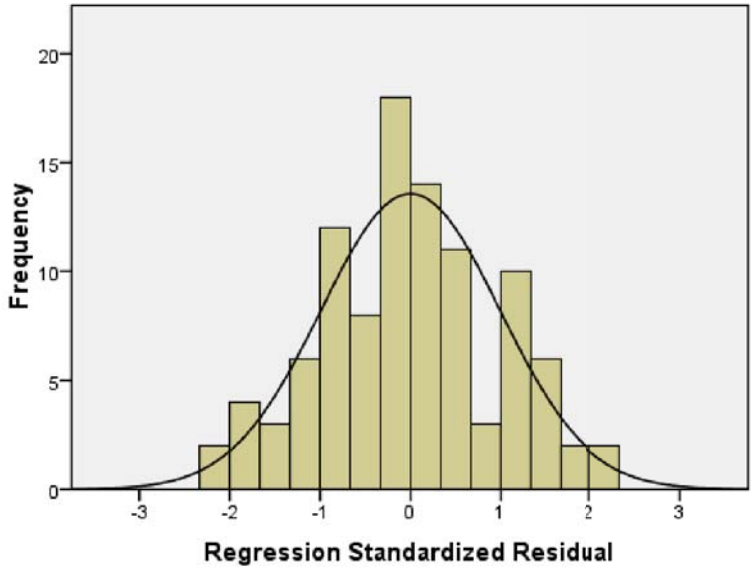

Figure 29. Histogram of regression residuals on standardized predicted intergroup bias (broadcast journalists). Mean = 1.44E-15; Std. Dev. = 0.99; N = 101

Table 9

Results for Regression of KM Infrastructure and Process Capabilities on Print Journalists' Level of Intergroup Bias Toward Broadcast Journalists

Variable	B	SE (B)	β	*t*	*p*
Constant	1.62	0.43		3.79	0.00
KM Infrastructure Capabilities	0.39	0.19	0.30	2.09	0.04
KM Process Capabilities	0.11	0.18	0.09	0.63	0.53

a. Dependent variable: print journalists' intergroup bias towards broadcast journalists.
$R^2 = 0.139$

Research question 3 asked, "What is the relationship between print journalists' perceived level of intergroup contact and perceived level of intergroup bias towards online or broadcast news journalists?" To address this question, simple regression analysis was first used to examine the relationship between print journalists' perceived level of intergroup contact and perceived level of intergroup bias towards all journalists. Regression assumptions of homoscedasticity (see Figure 30) and normality of residuals (see Figure 31) were assessed and met. As indicated by the regression analysis (see Table 10), print journalists' level of contact statistically significantly predicted their level of intergroup bias towards all other journalists ($\beta = 0.38$, $p < .01$). The regression coefficients suggest that intergroup contact had a positive relationship with the level of intergroup bias print journalists exhibited towards all journalists connected with their organization. Because high levels of intergroup bias were indicated by low scores on the instrument, this meant that low levels of intergroup contact were associated with high levels of intergroup bias, and vice versa. Nearly fifteen percent of the variability in the outcome was explained by the predictor.

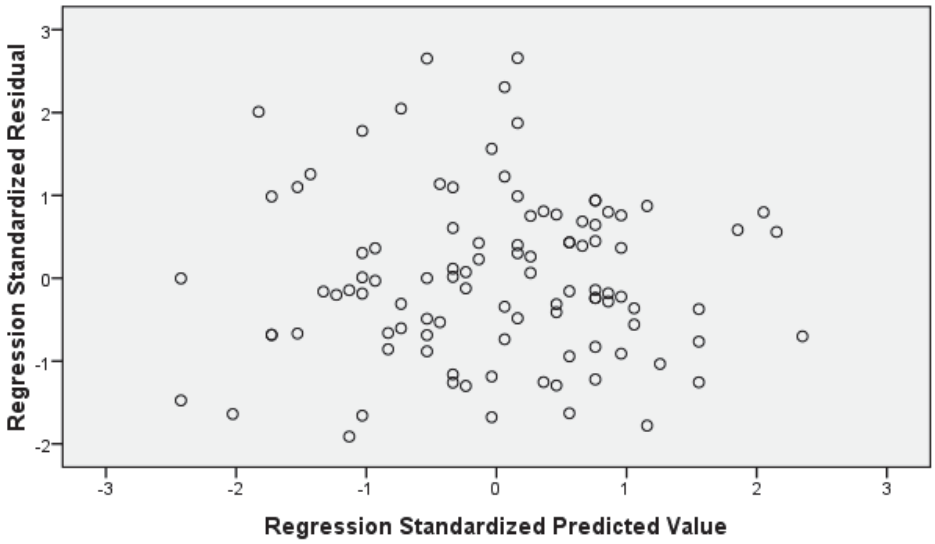

Figure 30. Scatterplot of regression residuals on standardized predicted intergroup bias (all journalists).

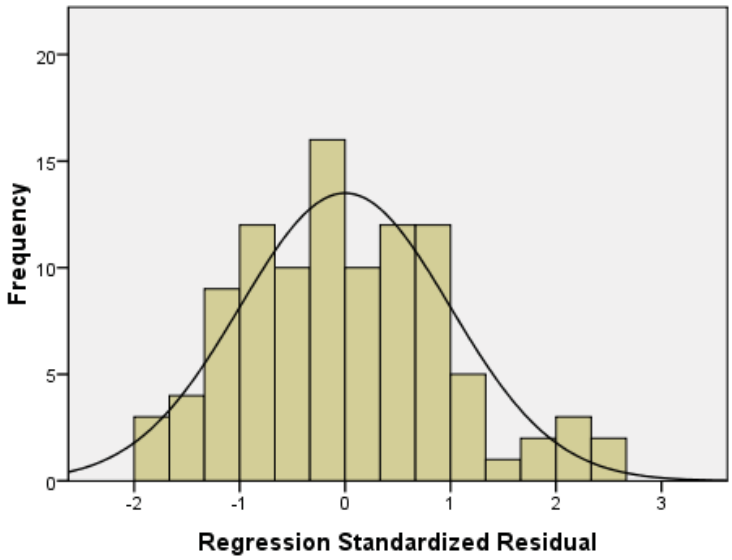

Figure 31. Histogram of regression residuals on standardized predicted intergroup bias (all journalists). Mean = 8.52E-16; Std. Dev. = 0.995; N = 101

Table 10

Results for Regression of Intergroup Contact on Intergroup Bias, All Journalists

Variable	B	SE (B)	β	*t*	*p*
Constant	3.13	0.25		12.29	0.00
Print Journalist Intergroup Contact with all Emp	0.33	0.08	0.38	4.13	0.001

a. Dependent variable: print journalists' intergroup bias towards all journalists.
$R^2 = 0.147$

Intergroup Contact and Intergroup Bias Toward Online Journalists

Simple regression analysis was also used to examine the relationship between print journalists' amount of intergroup contact with online journalists and their level of intergroup bias towards online journalists. Regression assumptions of homoscedasticity (see Figure 32) and normality of residuals (see Figure 33) were assessed and met. As indicated by the regression analysis (see Table 11), there was a statistically significant positive relationship (predicting a reduced level) between the amount of intergroup contact of print journalists and online journalists and the predicted the level of intergroup bias towards online journalists ($\beta = 0.48$, $p < .01$). Nearly twenty-three percent of the variability in the outcome was explained by the predictor.

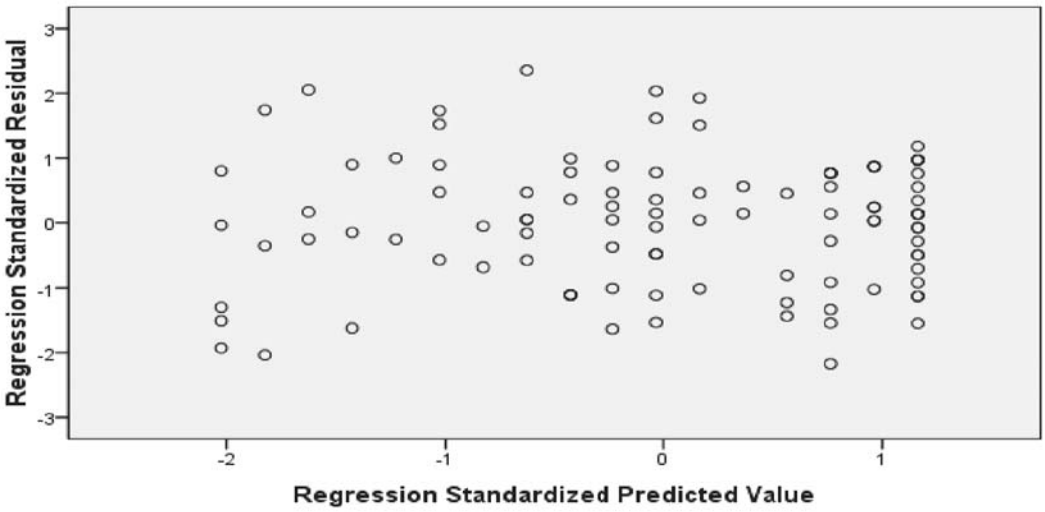

Figure 32. Scatterplot of regression residuals on standardized predicted intergroup bias (online journalists).

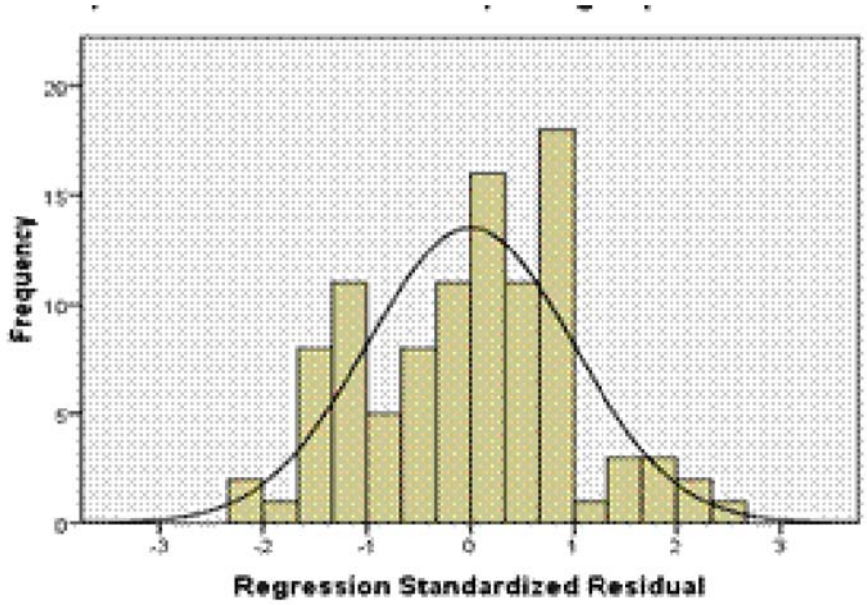

Figure 33. Histogram of regression residuals on standardized predicted intergroup bias (online journalists). Mean = 1.53E-16; Std. Dev. = 0.095; N =101

Table 11

Results for Regression of Intergroup Contact on Intergroup Bias, Online Journalists

Variable	B	SE (B)	β	*t*	*p*
Constant	2.63	0.29		9.22	0.00
Print Journalist Intergroup Contact with Online Journalists	0.41	0.08	0.48	5.39	0.001

a. Dependent variable: print journalists' intergroup bias towards online journalists.
$R^2 = 0.227$

Intergroup Contact and Intergroup Bias Toward Broadcast Journalists

Simple regression analysis was also used to examine the relationship between print journalists' amount of intergroup contact with broadcast journalists and their level of intergroup bias towards broadcast journalists. Regression assumptions of homoscedasticity (see Figure 34) and normality of residuals (see Figure 35) were assessed and met. As indicated by the regression analysis (see Table 12), although at the sample level there was a positive relationship (indicating a reduced level) between print journalists' intergroup contact with broadcast journalists and their predicted level of intergroup bias towards broadcast journalists (i.e., low levels of contact associated with high levels of bias), it was statistically significant ($\beta = 0.27$, $p < .01$). Nearly eight percent of the variability in the outcome was explained by the predictor.

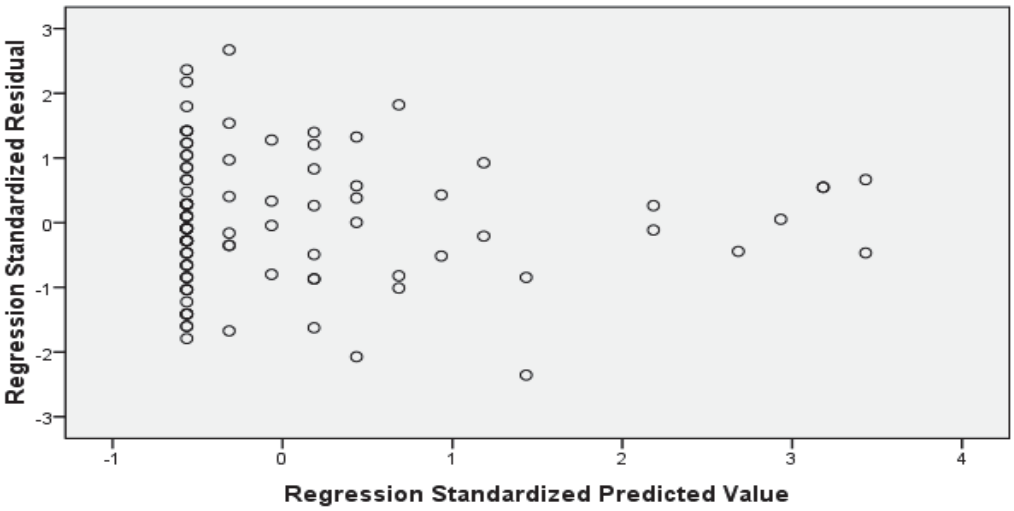

Figure 34. Scatterplot of regression residuals on standardized predicted intergroup bias (broadcast journalists).

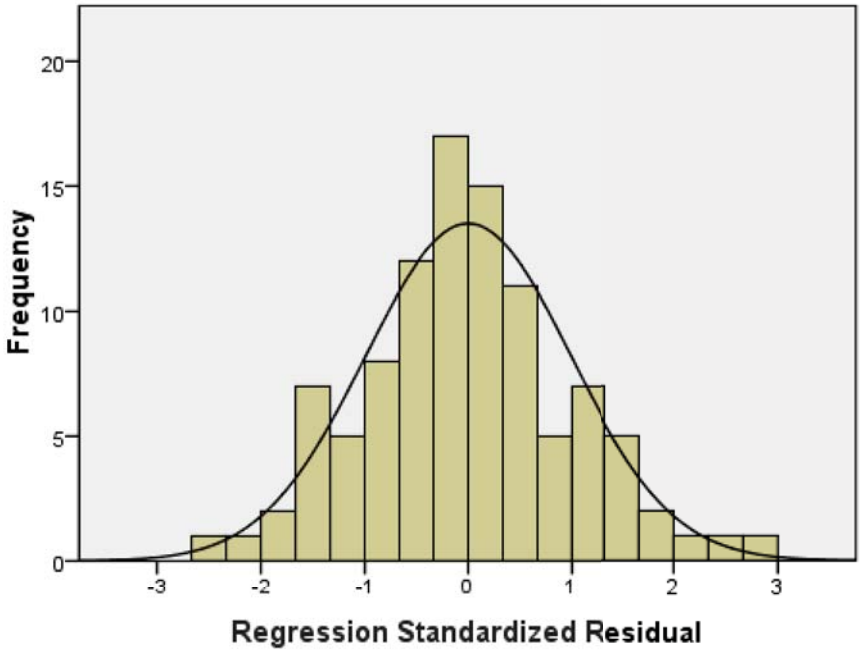

Figure 35. Histogram of regression residuals on standardized predicted intergroup bias (broadcast journalists). Mean = 1.30E-15; Std. Dev. = 0.996; N = 101

Table 12

Results for Regression of Intergroup Contact on Intergroup Bias, Broadcast Journalists

Variable	B	SE (B)	β	*t*	*p*
Constant	2.80	0.20		14.25	0.00
Print Journalist Intergroup Contact with Broadcast Journalists	0.30	0.11	0.27	2.83	0.006

a. Dependent variable: print journalists' intergroup bias towards broadcast journalists.
$R^2 = 0.075$

Baron and Kenny's (1986) procedure for testing mediation was used to address research question number 4, which examined whether the effect of KM capabilities on print journalists' level of intergroup bias towards other journalists was mediated by their intergroup contact. The interactive calculator, based on Sobel's (1982) test that measures the amount of mediation, was used to provide three test statistics for the indirect effect of KM capabilities on the level of intergroup bias. The indirect effect can be explained as the reduction of the effect of KM infrastructure capabilities as mediated by intergroup contact. It is a measure of the amount of mediation. These test statistics are based on Sobel (1982), Goodman (1960), and MacKinnon, Warsi, and Dwyer's (1995) critical ratios for testing an indirect effect. Because KM process capabilities did not emerge as a statistically significant predictor of either (1) intergroup contact or (2) intergroup bias, it was not used as a predictor in these analyses.

As earlier indicated by the regression analysis (see Table 7), print journalists' perception of their organization's KM Infrastructure Capabilities significantly predicted the level of intergroup bias towards all other journalists ($\beta = 0.33$, $p < .05$). The results indicate that the variable KM infrastructure capabilities was a significant predictor of the amount of intergroup bias print journalists exhibited towards all other journalists. Eighteen percent of the variability in the outcome was explained by the predictors. Simple regression of KM infrastructure capabilities on intergroup contact with all other journalists indicated a significant predictive effect with $\beta = 42$, $p < .01$ (see Table 13). Nearly seventeen percent of the variability in the outcome was explained by the predictor.

Table 13

Results for Regression of KM Infrastructure Capabilities as a Predictor of Intergroup Contact

Variable	B	SE (B)	β	*t*	*p*
Constant	1.63	0.31		5.21	0.00
KM Infrastructure Capabilities	0.42	0.09	0.42	4.60	0.002

a. Dependent variable: print journalists' intergroup contact with all journalists.
$R^2 = 0.167$

Additionally, when Intergroup Contact and KM infrastructure capabilities are both used as predictors, they each statistically significantly predicted print journalists' level of intergroup bias towards all other journalists, with $\beta = 0.25$, $p < .05$ for intergroup contact, and $\beta = 0.32$, $p < .01$ for KM infrastructure capabilities

(see Table 14). This finding suggests that intergroup contact partially mediated the relationship between KM Infrastructure Capabilities and print journalists' intergroup bias towards all journalists. Twenty-three percent of the variability in the outcome was explained by the predictor.

Table 14

Results for Regression of both KM Infrastructure Capabilities and Intergroup Contact as Predictors of Intergroup Bias

Variable	B	SE (B)	β	*t*	*p*
Constant	2.56	0.30		8.53	0.00
Print Journalist Intergroup Contact with all Emp	0.22	0.09	0.25	2.57	0.01
KM Infrastructure Capabilities	0.27	0.08	0.32	3.24	0.00

a. Dependent variable: print journalists' intergroup bias towards all journalists.
$R^2 = 0.230$

Formal tests of the indirect effect of KM Infrastructure Capabilities, using Preacher's (2010) interactive calculator, showed a statistically significant indirect effect of KM Infrastructure Capabilities on print journalists' level of intergroup bias towards all other journalists. Figure 36 provides the results of this analysis.

	Input:		Test statistic:	Std. Error:	*p*-value:
a	.417	Sobel test:	2.24582729	0.04066341	0.02471507
b	.219	Aroian test:	2.20626653	0.04139255	0.02736534
s_a	.091	Goodman test:	2.28759544	0.03992096	0.02216109
s_b	.085	Reset all	Calculate		

Figure 36. Mediation effect of intergroup contact on print journalists' level of intergroup bias towards all other journalists.

The mediating effect of print journalists' intergroup contact with online journalists on the relationship between KM infrastructure capabilities and intergroup bias was assessed. As indicated earlier by the regression analysis (see Table 8) there was a statistically significant predictive relationship (showing a reduced level) between print journalists' perceptions of their organization's KM infrastructure capabilities and their intergroup bias towards online journalists ($\beta = 0.31$, $p < .05$). Nearly twelve percent of the variability in the outcome was explained by the predictors. Simple regression of KM infrastructure capabilities on intergroup contact with online journalists also indicated a significant predictive effect with $\beta = 0.39$, $p < .01$ (see Table 15).

Table 15

Results for Regression of KM Infrastructure Capabilities as a Predictor of Intergroup Contact with Online Journalists

Variable	B	SE (B)	β	*t*	*p*
Constant	1.61	0.48		3.37	0.00
KM Infrastructure Capabilities	0.58	0.14	0.39	4.17	0.001

a. Dependent variable: print journalists' intergroup contact with online journalists. $R^2 = 0.150$

When Intergroup Contact and KM infrastructure capabilities were both used as predictors, only intergroup contact statistically significantly predicted print journalists' level of intergroup bias towards other online journalists, with $\beta = 0.41$, $p < .01$ (see Table 16). The effect of KM infrastructure capabilities, however, was marginally significant, with a non-zero $\beta = 0.18$ regression coefficient, suggesting that partial mediation was evident.

Table 16

Results for Regression of both KM Infrastructure Capabilities and Intergroup Contact as Predictors of Intergroup Bias Toward Online Journalists

Variable	B	SE (B)	β	*t*	*p*
Constant	2.06	0.41		5.07	0.00
KM Infrastructure Capabilities	0.23	0.12	0.18	1.92	0.05
Intergroup Contact with Online Journalists	0.35	0.08	0.41	4.30	0.00

a. Dependent variable: intergroup bias toward online journalists. $R^2 = 0.225$

Formal tests of mediation using Preacher's (2010) interactive calculator showed a statistically significant indirect effect of KM Infrastructure Capabilities on print journalists' level of intergroup bias towards other online journalists. Figure 37 provides the results of the mediation analysis.

Input:			Test statistic:	Std. Error:	*p*-value:
a	.576	Sobel test:	3.20744586	0.07291035	0.00133919
b	.406	Aroian test:	3.170403	0.07376223	0.00152228
s_a	.138	Goodman test:	3.24581825	0.0720484	0.00117114
s_b	.081	Reset all	Calculate		

Figure 37. Mediation results for intergroup contact on online journalists.

Because print employees' rating of their organization's KM infrastructure capabilities did not emerge as a statistically significant predictor of the mediating variable, intergroup contact with broadcast employees ($\beta = 0.27$, $p = .07$), mediation analysis was not carried out for these relationships.

Summary

The increased presence of KM capabilities in print news organizations reduced the level of intergroup bias print journalists exhibited toward online and broadcast workers and increased their contact with online journalists. Amount of contact between print and online workers partially mediated the relationship between KM

and intergroup bias. The next section will review these findings with consideration for the hypotheses and research questions of the study.

CHAPTER 5

DISCUSSION AND CONCLUSIONS

Hypotheses 1 and 2 were partially supported. The results indicate a positive relationship in that KM Infrastructure Capabilities are associated with an increase in the amount of intergroup contact between print journalists and online journalists but not between print journalists and broadcast journalists connected with their organization. KM Infrastructure capabilities accounted for 15.7 % of the variance in the amount of contact between print journalists and online journalists. The variable KM Process Capabilities was not a significant predictor of intergroup contact between print journalists and print, online, or broadcast journalists.

Hypotheses 3 and 4 were completely supported. High levels of print journalists' perception of their organization's KM infrastructure capabilities predicted lower levels of intergroup bias towards both online and broadcast journalists. KM infrastructure capabilities accounted for 11.5 % of the variance in the amount of bias print journalists exhibited toward online journalists. Additionally, KM Infrastructure capabilities accounted for 13.9 % of the variance in the amount of bias print journalists exhibited toward broadcast journalists. KM process capabilities did not have a statistically significant impact on the amount of bias of print journalists towards other journalists.

In the same way, hypotheses 5 and 6 were also completely supported. High levels of print journalists' perceived level of intergroup contact predicted lower levels of perceived intergroup bias towards both online and broadcast journalists. Intergroup contact between print and online journalists accounted for 22.7 % of the variance in the amount of intergroup bias print journalists exhibited towards online journalists. Additionally, intergroup contact between print and broadcast journalists accounted for 7.5 % of the variance in the amount of intergroup bias print journalists exhibited towards broadcast journalists.

Some support was observed for Hypothesis 7. The results indicate that the negative relationship between print employees' perceived KM capabilities and perceived intergroup bias toward all employees was partially mediated by their intergroup contact with all employees. These indirect effects were statistically significant. Additionally, the results indicate that the negative relationship between print employees' perceived KM capabilities and perceived intergroup bias toward online employees was partially mediated by their intergroup contact with online employees. These indirect effects were statistically significant. While the model indicates intergroup contact partially mediated the negative relationship KM capabilities had on intergroup bias between print and online employees, there was no statistical support for this relationship between print and broadcast employees.

This study examined KM's capabilities' relationship with intergroup bias and intergroup contact through the lens of print newsroom journalists. The findings imply that:

- RQ1: Higher levels of KM capabilities in print news organizations predicted higher levels of interaction among print journalists and online journalists. But the presence of KM capabilities in the organization did not have this effect on print newsroom employees' interaction with broadcast employees.
- RQ2: Higher levels of KM capabilities predicted that print journalists exhibited lower levels of bias toward online and broadcast journalists.
- RQ3: Higher levels of print journalists' contact with online and broadcast journalists predicted lower levels of bias toward online and broadcast journalists.
- RQ4: Print journalists' contact with online journalists had a partial mediating effect in KM capabilities' predictive relationship in lowering the level of bias they exhibited toward online journalists.

In this study, the KM Capabilities variable was composed of two components: infrastructure capabilities and process capabilities. For infrastructure capabilities, the hypothesized relationship was completely supported when analyzing the combined results of print, broadcast, and online journalists. KM's infrastructure capabilities emerged as a statistically significant element that reduced intergroup bias, increased intergroup contact, and the indirect effect of these results led to a greater reduction of intergroup bias. These findings imply that KM provides another tool for reducing intergroup bias among employee groups in organizations. These findings suggest that when acquisitions or mergers occur and disparate groups of

employees must learn to work together, the strategic development of knowledge management capabilities might reduce the intergroup bias that will inevitably arise.

As stated earlier, the hypothesized relationship between print and online journalists was supported, but not for broadcast journalists. This finding could possibly be explained by the technological attributes shared by online journalism and KM's infrastructure capabilities. The daily interaction of print and online journalists is closely associated with the characteristics of KM's infrastructure capabilities, which some may argue is not the case for broadcast journalism.

Another significant finding was that although both the infrastructure and process categories of KM's capabilities were reportedly present, the study participants only reported infrastructure capabilities as a statistically positive predictor of increased intergroup contact between print and online journalists and decreased intergroup bias between print and both online and broadcast journalists. The presence of KM infrastructure capabilities implies that technologies in the print news organizations linked print journalists with the other group members, the structure provided a sense of reward, and a culture of formal and informal employee interaction was present (Gold, Malhotra, & Segars, 2001). Conversely, the level of promotion from management associated with KM's process capabilities had little impact on employee interaction. One could hypothesize that infrastructure capability is the dominant component of knowledge management in that it provides significant impact even without incorporating process capabilities. This notion can be explained further by acknowledging the ease of sharing information and

knowledge electronically and the benefits of such interactions because of employees' familiarity with these interactions. Journalists engage in these behaviors socially on a regular basis. Use of social media and other technologies are commonplace in these work contexts.

Process capabilities as a construct can be viewed as an enhancer of knowledge management by providing the pathway to potentially generate and track benefits; however, if it is not combined with infrastructure capabilities it does not appear to provide significant results. Process capabilities are activities specifically designed to collect knowledge to redesign practices and procedures; however, implementing a pathway that provides results may be difficult. Consequently, KM process capabilities may act more as an ancillary component that is beneficial but cannot act singularly to enhance knowledge management initiatives.

Knowledge management as an organizational strategy typically includes many objectives; however, increasing contact and lowering intergroup bias is usually not one of them. This study identifies the importance of both capabilities associated with KM, but the notion of infrastructure capabilities provides a benefit that has gone unnoticed, in that most KM objectives have been confined to providing organizations with economic and strategic advantages. This study shows that advantages such as increased intergroup contact and decreased intergroup bias should be considered.

Limitations

Although survey instruments were sent to a diverse number of cities in terms of market sizes, one major limitation of an anonymous survey is that the exact

location of the survey respondents cannot be identified. Additionally, intergroup bias and intergroup contact refer to a respondent's perception of members outside their group. In the survey, print journalists were asked to provide their perceptions of journalists within or outside their organization working in print, online, and broadcast news. The responses from print journalists specifically about perceptions of other print journalists could be defined as intragroup contact or intragroup bias if the respondents chose to answer them based on perceptions of print journalists within their own organization. Unfortunately, because of the wording and focus of the survey, distinguishing between and analyzing intragroup and intergroup data was not possible. Moreover, the evolving structure and job descriptions of journalists working in print news create a struggle for researchers and respondents in reconciling in-group and out-group boundaries.

Implications for KM Research

Some benefits of KM that previous studies suggests include retaining knowledge, allowing it to grow exponentially, and protecting knowledge assets. Despite some studies that suggest that an organization's culture is one of the biggest barriers to KM initiatives, KM emerged in this study as a cultural asset for news organizations. In terms of organization socialization, more research into KM is needed, particularly as the capabilities associated with KM become even more evident across a variety of organizations. For example, this study focused on the cultural barriers associated with a particular phenomenon, media convergence.

Aspects of the dynamics and relationships associated with media convergence are consistent with other companies undergoing mergers or acquisitions. That said, many companies may see benefit in understanding how or if developing KM capabilities might be beneficial. Many companies see KM as a tool that enables them to become more knowledge intensive, but if, as many believe, a company's ROI has to do with cultural synergy, KM may make a company both more economically and culturally friendly.

The theory and analytical basis for this study was KM Capabilities' (Gold, Malhotra, & Segars, 2001) role in increasing intergroup contact (Allport, 1954) and intergroup contact's role in decreasing intergroup bias (Pettigrew, Thomas, & Troop, 2006). In alliance with Pettigrew, Thomas, and Troop's (2006) meta-analysis findings that intergroup contact reduces intergroup bias, this study builds on a large body of research by introducing KM as a facilitator of intergroup contact. In that the instrument that measured intergroup bias pertained to general members of a specific news platform group, the results also align with Sherif's (1958) findings that intergroup contact reduces intergroup bias towards members of a group and the group itself. It could be interpreted that participants in this study indicated that the overall organization was of greater concern to them than a greater commitment to their occupational subgroups (Hewstone, Rubin, & Willis, 2002). Ample research supports intergroup contact as a barrier to intergroup bias. Further research is needed to explore how the capabilities associated with KM (Gold, Malhotra, & Segars, 2001) can be used to generate intergroup contact that strategically builds a cohesive

work environment. Many studies associated with KM fail to go beyond its impact on overall performance and profitability (Gold, Malhotra, & Segars, 2001). This study supports the notion that the capabilities associated with KM have organizational benefits that have not commonly been recognized.

Implications for Media Convergence Research

This study is perhaps one of the few that supports the presence of KM in journalism. Little research has been done to support Latham and Sassen's notion that news media convergence and knowledge management are connected. Both KM's infrastructure and process capabilities were reportedly present in these print news organizations, which Gold et al. (2001) posit is evidence that KM exists. This finding provides fertile ground for research in media convergence and KM. Many converged media companies have seen a push by employees to maintain category distinctions during contact, even in media companies that have been converged for some time.

This study indicates that the hyper-contact produced by KM may reconfigure the typification schemes and beats (Singer, 2004) in converged newsrooms, but further investigation is needed. For example, more can be gleaned about the internal schema, emotional framing and mental patterns of news journalists through KM, since the focus of KM is on the individual and not the information they provide. While knowledge is housed in the brain of individual journalists, as they gather and work with other journalists to fit -in they develop a collaborative consensus. It is like

a collective individual knowledge in order to make group decisions. KM research should lead to a better understanding of the cognitive science attached to how groups operate in converged newsroom settings.

Furthermore, sharing knowledge in news organizations is a fairly recent phenomenon. Research is needed to support findings that a greater presence of KM capabilities in organizations should lead to big gains in the amount and accuracy of knowledge sharing and communication.

Implications for Practice of KM

There are implications here for two major areas of practice: knowledge management and print journalism. For KM management practitioners, KM initiatives have focused on extracting economic value from knowledge assets. Whereas recognizing knowledge assets that previously went unacknowledged may increase profitability, this study provides a specific cultural consideration that allows for the development of better KM strategic plans. It is difficult to identify why KM infrastructure capabilities impacted the cultural cohesion more directly than KM process capabilities in print news organizations. This population developed the infrastructure capabilities associated with KM possibly because of the technology intensive nature of news gathering and distribution and without much effort or awareness of newsroom management. Considering Burk's (1999) position that only about 20 percent of KM is databases and networks and nearly 80 percent involves creating an environment for sharing and exchange, this study suggests that more

effort is needed to develop the process capabilities of KM and supports Gold et al's position that KM process capability is a construct of KM that must be a known part of an organization's strategic plan (2001). Despite this weakness, this study supports Gupta's (2010) finding that KM leads to peer-to-peer collaboration. The impact of KM in increasing contact and lowering bias between print and online journalists supports Pettigrew and Troop's meta-analysis of intergroup contact as a reducer intergroup bias (2006).

In that KM as a predictor of intergroup contact was generally supported, this study implies that close attention should be paid to the infrastructure elements of a KM initiative. The same need for scrutiny applies to KM as a tool for eliminating intergroup bias.

Implications for the Practice of Media Convergence

Bierbauer (2005) notes that the journalism industry is evolving and this study supports Burk's (1999) idea that KM created a more cohesive work environment, which can assist during the process of an organization makeover. KM infrastructure capabilities had the most impact in this study; however, future research examining the mediating impact of process capabilities is still needed. For the print journalists in this study and all groups combined (print, online, and broadcast), intergroup contact acted as a mediator lowering intergroup bias (Allport, 1954) when created by and combined with KM infrastructure capabilities. The benefit of increased intergroup contact (Pettigrew & Tropp, 2006) was a by-product of

developing KM infrastructure capabilities. Additionally, when juxtaposed with KM, intergroup contact had the novel impact, for print news organizations, of lowering the level of intergroup bias even more than the effect that increased intergroup contact had on lowering intergroup bias alone.

These results provide insights for print journalists trying to strike a balance between cooperation and competition (Dailey, 2005) among the many subcultures of print, online, and broadcast media. The implications are especially useful to those searching for the benefits of developing KM initiatives beyond those directly connected to performance and competitive edge. Based on the characteristics identified by Gold et al. (2001), this initiative would expand the use of technology, culture, and structure to improve the social environment of the workplace regardless of whether these benefits are seen tangibly. For example, such a KM initiative might involve developing work processes that include expanding databases beyond simply entering basic information about story coverage, production techniques, and expert and lay sources into a more extensive database. The initiative could involve creating an employee-only social media database, company blog, or *Facebook* page. Such a technological structure must be rewarded and publicly recognized in such a way as to create a culture where employees feel safe to discuss everything from how they broke a story to mistakes, errors, and other KM-rich information (Gold, Maholtra, & Segars, 2001).

The results of this study support research that claims intergroup bias is more pervasive between print and broadcast workers (Filak, 2004). Particularly, the

respondents reported higher levels of intergroup bias toward broadcast journalists and less contact with broadcast journalists. Although the relationship KM and intergroup contact had in reducing intergroup bias between print and broadcast workers was positive, KM did not emerge as predictor of intergroup contact between the two groups. This is particularly surprising given that Singer (2004) found that most journalists perceived decreasing competitiveness between these two groups as one of the advantages of convergence. Perhaps this finding can be one of the key areas of focus when developing KM initiatives in journalism. KM process capabilities, which focus on the activities of KM, should be tailored to the characteristics of broadcast journalism to maximize benefits. Because print and online journalists are more closely aligned, more attention should be paid to connecting KM activities to the specific activities of broadcast and print journalism. The results indicated that KM was effective in lowering intergroup bias between print and broadcast workers; therefore, KM emerged as a tool for the practice of journalism. The predictive power of KM's infrastructure capabilities in the reduction of intergroup bias was increased when combined with intergroup contact. Therefore, if the main KM goal is to reduce intergroup contact, then a strategic focus on the specific elements of such capabilities would prove even more useful.

In summary, this study supports the use of KM in creating a single occupational community (Van Maanen & Barley, 1984) where newsrooms with KM infrastructure capabilities operate with more of a shared set of perspectives regarding

work. The implications of creating a shared focus at work can translate into a stronger, more effective newsroom staff.

Future Research

The perspective that this research offers is one that allows it to serve as a basis on which future studies can build, thus allowing similar relationships within other populations to manifest. Comparison of new research using the same criteria and methods but different populations may prove beneficial in providing support for these results. Additionally, the results showed significance for KM infrastructure capabilities but not for KM process capabilities in reducing intergroup bias and increasing intergroup contact. Future research might focus on two areas: the relationship between specific characteristics of KM infrastructure capabilities on intergroup bias and contact, and the importance of KM process capabilities.

The respondents were asked general questions that focused on the dimensions of KM infrastructure capabilities: technology, structure and culture. Future research might focus more on the relationship specifically indentified KM infrastructure capabilities have with intergroup contact and intergroup bias. Such a study may provide a deeper examination of specific technology used, organizational structure, and cultural dynamics associated with knowledge codification, sharing, and integration. Although Gold, Malhotra, and Segars took great care in operationalizing key dimensions through multiple rounds of item purification (2001, p. 207), there is no way to ensure that the items reflect the context of every workplace. It is

important, however, to note that the items did exhibit scores with high reliability and validity.

The variable, KM process capabilities, did not emerge as a significant predictor of either intergroup contact or intergroup bias; however, it was present in the organizations according to the respondents of this study. Future research into its role as an ancillary variable of KM initiatives designed to reduce intergroup bias and increase intergroup contact would be beneficial.

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APPENDIX A

ITEMS TO MEASURE KM CAPABILITIES

For the following section, please use the scale to rate your organization's knowledge managing capabilities.

KM Capabilities
Please place a number to the left of each statement indicating your answer to each question. Use a number from **1** to **5** to indicate the following; **1**=Disagree; **2**=Mildly Disagree; **3**=Neutral; **4**=Agree; **5**=Strongly Agree

Knowledge infrastructure Capability
Technology
My organization uses technology that allows…
_____Employees to collaborate with other persons inside the organization
_____People in multiple locations to learn as a group
_____Employees to generate new opportunities in conjunction with workers in different departments
Structure
My organization's…
_____Structure promotes collective rather than individualistic behavior
_____Leadership bases our performance on knowledge creation
_____Structure facilitates the transfer of new knowledge across different newsroom areas
Culture
In my organization…
_____Employees are valued for their individual expertise
_____Employees are encouraged to ask others for assistance when needed
_____Employees are encouraged to interact with others.

Knowledge Process Capability
Knowledge Acquisition
My organization…
_____Uses feedback from projects to improve subsequent projects
_____Has a process for exchanging knowledge
_____Has teams devoted to identifying best practice
Knowledge Conversion
My organization…
_____Has a process for transferring organizational knowledge to individuals
_____Has a process for distributing knowledge throughout the organization
_____Has a process for replacing outdated knowledge
Knowledge Application
My organization…
_____Matches sources of knowledge with problems and challenges
_____Uses knowledge to improve efficiency
_____Is able to locate and apply knowledge to changing and competitive conditions

APPENDIX B

ITEMS TO MEASURE INTERGROUP CONTACT

For the following section, please use the scale to rate the amount of weekly contact you have with members of the other two groups.

Amount of Intergroup Contact
Please place a number to the left of each statement indicating your answer to each question about contact you have with online or broadcast journalists in or outside your organization. Use a number from **1** to **5** to indicate the following; **1**=never; **2**=once or twice a *month*; **3**=at least once or twice a week; **4**=at least three or four times a week ; **5**= greater than four times a week

_____ I have brief talks (less than 10 minutes) with someone who helps to develop print news content.
_____ I have brief talks (less than 10 minutes) with someone who helps to develop online news content .
_____ I have brief talks (less than 10 minutes) with someone who helps to develop broadcast news content .
_____ I have long talks (greater than 10 minutes) with someone who helps to develop print news.
_____ I have long talks (greater than 10 minutes) with someone who helps to develop online news content.
_____ I have long talks (greater than 10 minutes) with someone who helps to develop broadcast news content.
_____ I work with someone who helps to develop print news content.
_____ I work with someone who helps to develop online news content.
_____ I work with someone who helps to develop broadcast news content.
_____ I receive help or help someone to complete a task associated with print news.
_____ I receive help or help someone to complete a task associated with online news.
_____ I receive help or help someone to complete a task associated with broadcast news.

APPENDIX C

ITEMS TO MEASURE INTERGROUP BIAS

Compare the following prompts to your opinion of an average journalist. Please select the response that best represents your opinion using the following response scale: **1** = very much below average; **2** =below average; **3**= slightly below average; **4**= slightly above average; **5**=above average; **6**=very much above average

1. Working Together
My preference for working with…
a print journalist _____
a broadcast journalist _____
an online journalist _____

2. *Knowledge*
Knowledge about journalism of…
print journalists _____
online journalists _____
broadcast journalists _____

3. *Intelligence*
The level of intelligence of…
print journalists _____
online journalists _____
broadcast journalists _____

4. *Ethics*
Regarding their level of ethics, I would say…
print journalists are_____
online journalists are_____
broadcast journalists are_____

5. *Personal Traits*
In regard to being well adjusted people, I would say…
print journalists are_____
online journalists are_____
broadcast journalists are_____

Demographic Information

Job Title _____
Sex

○ Female

○ Male

Years working in the news media

○ 1-99 years

APPENDIX D

INVITATION TO PARTICIPATE

Greetings

Dear research participant,

My name is Floyd Sanders and I am a doctoral student at Northern Illinois University who worked for several years in the broadcast news media. The purpose of this study is to examine the influence of knowledge management on the amount of contact between individuals working in the news media and the level of intergroup bias. The following questionnaire asks your perceptions of your organization's knowledge management capabilities, your level of contact with workers outside your group, and your level of bias towards workers in other groups.

Your participation is voluntary and you will not be penalized for not participating. Your participation is completely anonymous and you will not be asked to provide you name at any point in this study. Please do not take part in this survey if you are not at least 18 years old.

After reading this greeting, by beginning to answer questions, you are consenting to participate in this survey.

Thank you

For more information please contact the NIU Institutional Review Board at Phone: (815) 753-8588 FAX: (815) 753-1631, E-mail: researchcompliance@niu.edu or Floyd Sanders at 815-753-4732, E-mail fsanders@niu.edu.

APPENDIX E

ITEMS FROM THE YUKER AND HURLEY (1987) CDP SCALE USED FOR THIS STUDY

Items from the Yuker and Hurley (1987) CDP Scale used for This Study

_____ How often have you had a long talk with a person who is physically disabled?

_____ How often have you had a brief talk with a person who is physically disabled?

_____ How often have you discussed your life problems with a physically disabled person?

_____ How often have you visited disabled friends in their home?

_____ How often have disabled friends visited your home?

_____ How often has a disabled helped you with a problem?

_____ How often have you helped a disabled friend with a problem?

APPENDIX F

JOB TITLES GIVEN BY RESPONDENTS

Job Titles Given by Respondents

EDITORS

Assigning editor
section editor
Sports editor
CITY EDITOR
Community editor
Copy editor
copy editor
copy editor
copy editor/designer
Copy editor/page designer
newspaper copy editor/page designer
news editor
News Editor
news editor
news editor
News editor
editor
editor
editor
Editor
editor
Editor
Editor and Director of Communications
editorial page editor
editorial writer/op-eds letter/fill-in letters editor
Features editor
Local News Editor

MANAGERS

manager
Managing Editor
Managing editor
managing editor
Managing Editor

REPORTERS

Investigative reporter
journalist
metro desk reporter
metro reporter
newspaper business reporter
backpack journalist
Business Reporter
political reporter, print/online/broadcast
print and online journalist
reporter
reporter
reporter
Reporter
reporter
Reporter
reporter
Reporter
Reporter
reporter
Reporter
Reporter
reporter
reporter
reporter
Reporter
Reporter
Reporter
reporter
Reporter, online and print
reporter/anchor
Features reporter
Newspaper Reporter
Newspaper reporter whose work appears in print and online

WRITERS

sports writer
Sports writer
staff writer
staff writer
Staff writer
Staff Writer
staff writer
Staff writer
staff writer
Starr Writer
transportation writer
Writer
columnist/blogger

PHOTOGRAPHERS

Staff Photographer
Photographer
Photojournalist
graphic artist
graphics designer/columnist
Newspaper Photo Editor
photo editor
Photo editor

MISCELLANEOUS

Product Development, Interactive
Instructor
Owner- hyper local on-line
Director of Content
News Applications Developer