RESEARCH ARTICLE



The Relationships Between Knowledge Hiding, Organizational Justice, Workplace Friendship and Job Interdependence

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Abstract

This study was designed to determine the effects of social groups and relationships, which are among the basic subjects of sociology, on management science. In this context, the relationship between knowledge hiding, organizational justice, workplace friendship and job interdependence was investigated. This research, using quantitative analysis techniques, was conducted in a public institution operating in the transportation sector. Data were collected with the help of survey forms and at this stage, a simple random sampling method was preferred without any restrictions. Data obtained from 274 employees working in TR1, TR2, TR5, TR7 and TRB regions were analyzed with traditional statistical methods and structural equation modeling (SEM). According to the findings, the tendency to hide knowledge increases in environments where organizational justice is low, the friendship bonds of employees with a high perception of organizational justice are stronger, and this reduces their knowledge hiding behaviors. The study also found that the perception of organizational justice is higher in individuals with higher work experience, organizational justice and knowledge hiding behaviors do not differ according to gender, and the tendency to hide information in blue-collar employees is much lower than in white and gray collar employees.

Keywords: Information hiding, organizational justice, workplace friendship, job interdependence, social exchange theory

Öz

Bu çalışma, sosyolojinin temel konularından olan sosyal gruplar ve ilişkilerin yönetim bilimi üzerindeki etkilerini tespit etmek amacıyla tasarlanmıştır. Bu kapsamda, bilgi saklama davranışının örgütsel adalet, arkadaşlık bağları ve görev bağımlılığıyla ilişkisi araştırılmıştır. Nicel analiz tekniklerinin kullanıldığı bu araştırma, ulaştırma sektöründe faaliyet gösteren bir kamu kuruluşunda yürütülmüştür. Veriler anket formları yardımıyla toplanmış ve bu aşamada herhangi bir kısıt gözetilmeksizin basit tesadüfi örnekleme yöntemi tercih edilmiştir. TR1, TR2, TR5, TR7 ve TRB bölgelerinde görev yapan 274 işgören üzerinden elde edilen veriler geleneksel istatistik yöntemleri ve yapısal eşitlik modellemesiyle (YEM) analiz edilmiştir. Elde edilen bulgulara göre örgütsel adaletin düşük olduğu ortamlarda bilgi saklama eğilimleri artmakta, yüksek örgütsel adalet algısına sahip işgörenlerin arkadaşlık bağları daha güçlü olmakta ve bu durum bilgi saklama davranışlarını azaltmaktadır. Çalışmada ayrıca, iş deneyimi yüksek olan bireylerde örgütsel adalet algısının daha yüksek olduğu, örgütsel adalet ve bilgi saklama davranışlarının cinsiyetlere göre farklılaşmadığı, mavi yakalı işgörenlerde bilgi saklama eğilimlerinin beyaz ve gri yakalılara kıyasla çok daha düşük olduğu tespit edilmiştir.

Anahtar Kelimeler: Bilgi saklama, örgütsel adalet, iş yeri arkadaşlığı, görev bağımlılığı, sosyal değişim teorisi

Introduction

Following the Third Industrial Revolution that occurred in the mid-20th century, the importance of information for organizations has steadily increased and has played critical roles in achieving strategic advantages. Unlike previous periods, accessing information in the 21st century has become extremely easy, paralleling advancements in communication technologies. However, this has also brought about certain challenges. Accordingly, it is essential to identify useful information among a vast amount of data (data mining) and to ensure the accuracy of that information and its ability to provide the desired benefits to the organization. After all this, it is necessary to process the information, develop it, and make the best use of it to achieve organizational goals. This can only be achieved by sharing the available information under appropriate conditions within the organization. Otherwise, the behavior of withholding information within the organization will increase, leading to various challenges for organizations.

According to a study conducted in America, 76% of employees have admitted to hiding knowledge at least once in their professional careers. In another study conducted in China, this rate was measured at 46% (Connelly et al., 2012). On the other hand, there is a cost associated with knowledge hiding behavior for organizations. A study on companies listed in the Fortune 500 found that such behavior leads to an annual loss of \$31.5 billion for these companies (Iqbal et al., 2022). Another study conducted by Panopto (2018) revealed that employees waste an average of 5.3 hours each week waiting for information from their colleagues. This wasted time slows down organizations' creativity and development capabilities, leads to missed opportunities, hinders intra-organizational collaboration, and results in non-compliance with work norms (Nguyen et al., 2016).

To reduce these negative effects and increase the efficiency of organizational activities, there are several important tasks that managers need to undertake. These include identifying the factors leading to knowledge hiding, generating solutions, and promoting beneficial information sharing. According to studies in the literature, the perception of organizational justice held by employees plays a significant role among the factors that lead to knowledge hiding behavior (Oubrich et al., 2021). Thus, employees' perception of justice is higher in organizations exhibiting inclusive leadership styles, resulting in increased efficiency and decreased knowledge hiding behavior (Eberlin & Tatum, 2008). In social exchange theory (SET), this situation is explained by the tendency of employees to maintain their current behaviors when they believe there is fairness between the benefits they provide to the organization and their own gains (Blau, 1964). Furthermore, the environment and conditions within the organization can play active roles in the dynamics of knowledge hiding behavior. Research in the literature indicates that employees' knowledge hiding behavior is influenced by variables such as friendship ties and job interdependence levels (Fong et al., 2018; Islam & Chaudhary, 2024).

This study will first address employees' knowledge hiding behavior, followed by an exploration of organizational justice that may lead to such behavior within the framework of SET, examining the roles of friendship ties and job interdependence through quantitative analysis methods and structural equation modeling (SEM). In the conclusion section, the findings will be compared with similar studies in literature, and suggestions for future research will be provided. Given that no research has been found that includes all four mentioned variables together, the study aims to contribute to the field.

Literature Review and Hypotheses Development Knowledge Hiding in Organizations

As important as it is for organizations to share valuable knowledge, the hiding of such information, and consequently the insufficient utilization of knowledge, is equally significant. The behavior referred to in the literature as "knowledge hiding" is defined by Serenko and Bontis (2016) as "an intentional concealment of any information or knowledge from any other individual who has requested it," and it is categorized into *intra-organizational knowledge hiding* and *mutual knowledge hiding*.

Additionally, it is worth noting that not all unshared information falls within this scope.

In the 21st century, where entrepreneurship is prominent, organizations can rapidly rise and surpass established companies due to their modern approaches to knowledge and business practices. This situation presents opportunities for newly established startups with limited capital, while posing a threat to established companies that struggle to adapt to change. Many of these organizations draw their power from digital possibilities and unique business ideas. Examples include Alphabet (Google), founded in 1998 by two PhD students, which has a company value of over \$3 trillion as of 2024; Meta Platforms (Facebook), initially designed as a social platform for Harvard students in 2004, which has quickly grown to over 2 billion users and a value of \$1.5 trillion; and Airbnb, founded in 2008 by two entrepreneurs, Brian Chesky and Joe Gebbia, who struggled to pay their rent and now operates in 191 countries with a valuation of \$85 billion. This list could go on, but their commonality lies in effectively combining innovative business ideas with technology and maximizing the benefits derived from their knowledge levels (Bandera et al., 2017).

While the ability to store vast amounts of information is a technical achievement, its true value emerges only when organizations can effectively analyze, apply, and transform this knowledge into actionable strategies and innovations. For instance, organizations like Google, Facebook, and Airbnb not only store extensive data but also utilize advanced analytics and creative approaches to convert this information into competitive advantages. This highlights the vital importance of effectively utilizing stored knowledge to achieve organizational goals, adapt to dynamic market conditions, and sustain growth. Knowledge hiding, however, can obstruct this process by limiting the flow of valuable information within the organization. Such behaviors may occur when requested information is unavailable, deemed low-value, or contains critical and confidential content. In some cases, knowledge hiding manifests as a "white lie," often to safeguard employees' feelings, thoughts, or security. To leverage knowledge effectively, it is necessary to distinguish between knowledge hiding behaviors that hinder organizational objectives and those aimed at protecting employee welfare (Connelly et al., 2012). Once this distinction is made, organizations must identify and address the root causes of harmful knowledge-hiding behaviors to ensure that critical information is not only stored but also effectively utilized for innovation and competitive advantage.

Organizational Justice and Knowledge Hiding

According to numerous studies in literature, organizational justice plays a significant role among workplace factors that lead to knowledge hiding (Ghani et al., 2020). Organizational justice, defined by Greenberg (1990) as "the concept of organizational justice refers to the organization members' perceptions of whether the organization that they are part of is treating them fairly" is examined within the framework of Social Exchange Theory (SET) across three dimensions: procedural justice, interactional justice, and distributive justice (Bies and Moag, 1986):

Distributive Justice: This dimension pertains to the perceived fairness of the outcomes or resources distributed within an organization. It focuses on whether employees believe they are receiving a fair share of rewards, such as salary, benefits, and promotions, based on their contributions or needs (Adams, 1965). The equity theory suggests that employees assess fairness by comparing their input (e.g., effort, skills) with the outputs (e.g., rewards, recognition) relative to others. When employees perceive equitable distributions, their job satisfaction and organizational commitment tend to be higher (Colquitt et al., 2001).

Procedural Justice: Procedural justice refers to the perceived fairness of the processes and procedures that lead to outcomes or decisions within an organization. It emphasizes the consistency, transparency, and impartiality of decision-making procedures (Thibaut & Walker, 1975). Employees are more likely to accept unfavorable outcomes if they believe that the decision-making processes were fair, unbiased, and applied consistently. Procedural justice plays a crucial role in fostering trust and organizational commitment (Greenberg, 1990).

Interactional Justice: This dimension focuses on the quality of interpersonal treatment employees receive during the implementation of procedures and outcomes. Interactional justice can be further divided into two subcategories: interpersonal justice and informational justice. Interpersonal justice refers to the respect and dignity of employees shown by authorities or decision-makers, while informational justice concerns the transparency and adequacy of the information provided during decision-making (Bies & Moag, 1986). Employees value being treated with respect and having clear, honest communication, as it fosters trust and positive relationships within the organization (Colquitt et al., 2001).

On the other hand, procedural justice refers to "fair behavior in organizational decision-making, resolution of payment disputes, and processes related to work, as well as fair distribution of resources". This dimension of justice is considered highly important and a priority for organizational management, as it directly affects employees' work methods and motivation levels. It is known that employees who believe they are treated fairly when their individual performances are assessed tend to trust their managers and organizations (Mahmood et al., 2023). Interactional justice means "treating individuals equally in organizational processes". This type of justice involves managers in decision-making positions being sensitive to employees and providing justifications when explaining their decisions. This, in turn, increases employees' perceptions of fairness toward their organizations and managers, reducing their tendencies to hide knowledge (Jahanzeb et al., 2020). Distributive justice evaluates employees' feelings of fairness regarding the allocation of rewards such as salaries, incentives, goods, and fringe benefits. When employees at the same level receive different salaries, perceptions of fairness toward the organization may be compromised, which can manifest in individual performance, teamwork, and the quality of work (Donglong et al., 2020). This situation is explained in SET as "employees continuously comparing their organizational inputs with the rewards they receive and attempting to maintain the status quo in scenarios where they believe they are treated fairly". Together, these three dimensions of organizational justice contribute to employees' overall perceptions of fairness and are essential in shaping organizational outcomes such as job satisfaction, commitment, and performance. If adequate attention is not paid to these three dimensions of organizational justice, a series of negative outcomes involving knowledge hiding behaviors within the organization will be inevitable (Ghani et al., 2020; Jahanzeb et al., 2020; Oubrich et al., 2021). Based on these studies, it is hypothesized:

Hypothesis 1: Organizational justice has a negative impact on knowledge hiding.

The Effect of Workplace Friendship

Organizations represent more than just a means for employees to earn money; most of the active hours of a 24-hour day are spent at the workplace. Therefore, organizations are environments with strong social aspects for employees. As a result, individuals who are happy at work are likely to perform their expected duties well, be more productive, and spread these gains to their surroundings.

The happiness of employees in organizations is not something they can achieve solely by themselves. Individuals can only be happy when they have strong friendship ties and will strive to maintain this happiness. SET posits that friendships among employees and between employees and leaders will develop over time, leading to increased mutual commitment, trust, and loyalty within the organization (Cropanzano & Mitchell, 2005). Hsu et al. (2019) suggest that for reciprocal trust to exist within an organization, organizational justice must be established, and that organizational justice and friendship ties positively influence each other. According to the literature, the second hypothesis is established:

Hypothesis 2: Organizational justice positively influences friendship ties.

Friendship ties represent a voluntary social phenomenon that arises among individuals in either horizontal or vertical hierarchical positions. These connections are characterized by mutual interactions both within and outside the organization, and they are grounded in shared elements such as trust, respect, commitment, and common values (Ozbek, 2018). Despite the frequent emphasis on the significance of knowledge sharing by organizational leaders, many organizations fail to act in alignment with this principle. Consequently, given the critical role of friendship ties for both individuals and organizations and the varying practical implications they present, this topic has recently garnered increasing attention from academics (He & Wei, 2022).

Researches in literature demonstrates that workplaces with high perceptions of organizational justice tend to foster stronger workplace friendships. These friendships, in turn, contribute positively to various organizational outcomes, including the development of an innovative organizational climate, increased productivity, enhanced job satisfaction, the achievement of organizational goals, improved performance, and more effective knowledge sharing (Song, 2006; Mao et al., 2012; Chen et al., 2013; Methot et al., 2016; Sias & Shin, 2019; He & Wei, 2022). Considering these findings, the third hypothesis of this research is proposed as follows:

Hypothesis 3: Friendship ties negatively impact knowledge hiding. Workplace Friendship as Mediator

Workplace friendship has the potential to affect and alter all dynamics that emerge within an organization. Studies have shown that behaviors such as sabotage, cynicism, or hiding important knowledge are closely related to dissatisfaction in organizations (Shahzad & Mahmood, 2012; He et al., 2021). According to researchers, the presence of workplace friendship in an organization not only brings numerous benefits and advantages but also serves as a protective structure for the organization and its employees. Considering that establishing a corporate image is very difficult but destroying it is quite easy, the importance of workplace friendships for organizations and the need to support them becomes clearer (Xing, 2022).

In this context, many decisions made by organizational management should be reviewed within the scope of procedural justice, interactional justice, and distributive justice (which are the dimensions of organizational justice) and it should not be overlooked that gaining employees' trust is critical to achieving organizational goals. As interactions develop, employees will experience stronger perceptions of organizational support and happiness, encouraging them to adopt a "positive reciprocity" attitude in rewarding the organization (He et al., 2022). The three hypotheses developed so far, considering similar studies in the literature (Islam & Chaudhary, 2024) and the finding in SET that "workplace friendship inhibits knowledge hiding" (He et al., 2022), lead to the following fourth hypothesis:

Hypothesis 4: Friendship ties mediate the effect of organizational justice on knowledge hiding.

Job Interdependence as Moderator

In organizations, tasks are often complex and involve mutual dependence among individuals. Accordingly, engaging in knowledge hiding while performing a task implies that information you may need in the future could also be withheld from you. This concept, referred to in the literature as job interdependence, has a significant impact on knowledge hiding (Fong et al., 2018). An employee who, under normal circumstances, does not want to share their knowledge may be inclined to share it out of fear of failure, knowing they might face the same situation tomorrow.

On the other hand, if there is competition within the same team and individual activities are prioritized, employees may be more inclined to hide knowledge (since there is no mutual job interdependence). Studies have shown that in scenarios where tasks are independent of other team members, the impact of knowledge hiding on innovative behaviors like team creativity is less significant (Stapless & Webster, 2008). In summary, job interdependence supports intra-organizational communication and collaboration, thus enabling mutual alignment among individuals (Bachrach et al., 2006). When considering the role of job interdependence in organizational processes and the proposition "SET posits that the benefits received

from others evoke a sense of obligation in employees, encouraging them to reciprocate these benefits either directly or indirectly" (Blau, 1964; Yang & Chae, 2021), the following two hypotheses are proposed:

Hypothesis 5: Job interdependence moderates the effect of organizational justice on knowledge hiding.

Hypothesis 6: Job interdependence moderates the effect of workplace friendship on knowledge hid-

reviewed by the highest-level managers in the relevant regions, the survey forms were sent down to the hierarchy to subordinate employees. Care was taken to ensure broad coverage in distributing the surveys, and forms were sent not only to a single region but to the TR1, TR2, TR5, TR7, and TRB regions, covering approximately 30 provinces.

Before starting field research, the sample size needed to represent the study population was calculated. For a population of N=10,000, assuming a

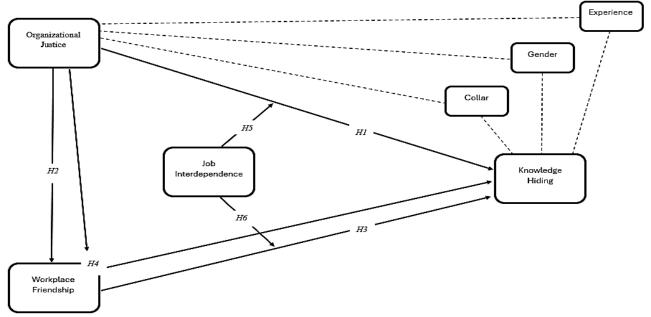


Figure 1. Conceptual Model

Method

Samples and Procedures

This study was conducted on the personnel of a public organization operating in the transportation sector across a vast geographic area. Data from employees was collected using survey forms. The surveys were sent via digital platforms, and the simple random sampling method was adopted without making any distinctions between different sample groups. At the beginning of the survey, a brief note explained the purpose of the study, how the data would be used, the confidentiality of personal information, and the contribution of carefully provided answers to the research. After being

population proportion value of 80%, with a 95% confidence interval and a 5% margin of error, the sample size (n) was calculated to be 240 (Julious, 2019). After reaching a reasonable level of this figure, data collection was stopped, and 274 usable data points were obtained after excluding a small number (9) of extreme and outlier values.

The study sample consisted of 247 men and 27 women. Of the employees, 42% were between the ages of 31-40, while only 6% were aged 61 and above. In terms of education, 59% were university graduates, and none were below high school level. The proportion of postgraduate degree holders was measured at 6%. Regarding work experience, the largest group, at 38%, had 8-15 years of experience. As for monthly total income, two values were almost equal: 44% earned between 21,000-40,000 TL (650-1,250 USD), while 42% earned between 41,000-60,000 TL (1,250-1,850 USD).

Although Turkey is the 18th largest economy globally as of 2024, it ranks among the countries with the highest inflation rates, which gives special significance to the income levels of employees (The World Bank, n.d.). The last demographic data concerned employee categories: 65% were civil servants, 32% were workers, and 3% were contract workers. Employees were classified by their job positions (e.g., regional and service managers as white-collar; supervisors as gray-collar; and train operations staff and workers as blue-collar). As a result, it was found that 49% of participants were blue-collar, 31% were gray-collar, and 20% were white-collar.

Data Analysis

SPSS v.21, Excel 2016, and Jamovi v.2.5.5 were used for data analysis in this study. After determining descriptive statistics, reliability values, and interitem correlations, confirmatory factor analysis (CFA) was used to examine the validity and internal consistency of each construct. Finally, the structural equation model (SEM) and p-values in mediation-moderation tests were used to test the hypotheses. Hayes' (2013) steps were used to test mediation effects.

Measures

All scales used in this study were prepared in a 5-point Likert type. In the surveys, 1 represented "Strongly Disagree," and 5 represented "Strongly Agree." Besides demographic information, four scales with seven dimensions were included in the survey forms.

The knowledge hiding (KH) scale consisted of two dimensions: intra-organizational knowledge hiding (IKH) and reciprocal knowledge hiding (RKH). The workplace friendship (WF) scale and the job interdependence (JI) scale were unidimensional. The last scale used in the study, organizational justice (OJ), was divided into three subscales: procedural justice (PJ), interactional justice (IJ), and distributive justice (DJ). In total, there were 23 items across the scales. All scale items consisted of either positive or negative statements, ensuring consistency, with one exception: item six of the WF scale ("I don't consider anyone I work with

to be a real friend"), which was reverse coded before analysis.

In studies where individuals evaluate themselves, common method bias (CMB) is a frequent issue. To ensure that each dimension reflected only its related values, the Harman Single Factor test was applied before data analysis. Based on the results, the Extraction Sums of Squared Loadings percentage of variance was measured at 28%, well below the 50% threshold, indicating no CMB problem in the study (Kline, 2005). Detailed information on the study dimensions is as follows:

- Organizational Justice: The first scale in the study is the organizational justice scale developed by Niehoff and Moorman (1993), consisting of three dimensions and eight items. The first dimension, procedural justice, has three items, one of which is, "Were you able to express your opinions and feelings when the rules in your organization were established?" The second dimension, interactional justice, also contains three items, including "Does your supervisor value your dignity and respect when communicating with you?" The third and final dimension, distributive justice, has two items, one of which is, "Do the opportunities (material, moral) you receive in your organization reflect the effort you put into work?" The reliability values of the organizational justice scale's dimensions were measured at ,839; ,844 and ,914 respectively.
- 2. *Knowledge Hiding*: The second scale is the knowledge hiding scale, developed by Serenko and Bontis (2016), consisting of two dimensions and six items. The intra-organizational knowledge hiding dimension includes three items, such as, "They generally provide me with only part of the information I need," while the reciprocal knowledge hiding dimension includes items like, "I generally provide only part of the information they need." The reliability results of the knowledge hiding dimensions were found to be ,874 and ,890 respectively.
- 3. Workplace Friendship: The third scale used in this study was from Nielsen et al. (2000) is a two-dimensional and 12-item Workplace Friendship scale. The scale consists of Friendship Opportunity and Friendship Prevelance dimensions, consisting of six questions each. In terms of compliance with the scope of the research, only the Friendship

Prevelance dimension was used in this study. An example item of the dimension is "I have the opportunity to get to know my co-workers." The reliability of the job interdependence scale was ,865.

- *Job Interdependence*: The third scale used in the study is the unidimensional job interdependence scale, developed by Campion et al. (1993), consisting of three items, such as, "I cannot perform my tasks without receiving information or materials from my colleagues." The reliability of the job interdependence scale was ,818.
- Control Variables: Based on previous studies in the literature (Podsakoff et al., 2009; Wu & Parker, 2017), the control variables in this study were divided into two categories. At the individual level, age, gender, and education were used; at the organizational level, work experience, status, and monthly total income were included.

Findings

Before proceeding with the analysis, the distribution of the data was examined. Parametric and non-parametric statistical methods differ depending on the type of data distribution. In the normality analysis, skewness and kurtosis values were first checked. According to Hair et al. (2010) and Byrne (2010), skewness values should be within ±2 and kurtosis values within ±7 to indicate normal distribution. Tabachnick and Fidell (2013) suggested narrower limits of ±1.5. Most skewness and kurtosis values in the study fell within normality boundaries. However, the Shapiro-Wilk normality test was also applied to ensure normal-

ity, and the p-value was found to be <,001.

Table 1. Descriptive, Reliability, Validity, Normality and Multicollinearity Analysis

		<u>Reliability</u>									
	Mean	SD	ω	CR	AVE	VIF					
IKH	2,197	1,159	,874	,874	,700	1,376					
RKH	1,222	,469	,890	,891	,734	1,103					
WF	3,303	,945	,865	,861	,565	1,354					
JI	3,184	1,007	,818,	,817	,601	1,054					
PJ	3,084	1,210	,839	,837	,646	1,764					
IJ	3,456	1,129	,844	,840	,649	1,652					
DJ	2,891	1,503	,914	,916	,846	1,356					

Note. IKH: Intraorganizational knowledge hiding, RKH: Reciprocal knowledge hiding, WF: Workplace friendship, JI: Job interdependence, PJ: Procedurel justice, IJ: Interactional justice, DJ: Disributive justice. SD: Standart deviation, ω: McDonald's omega, CR: Composite reliability, AVE: Average variance extracted, VIF: Variance inflation factor.

When the results are examined, it is observed that the lowest average is associated with the RKH scale (1.222), while the highest average is recorded for the IJ scale (3.456). Regarding the standard deviation (SD), which indicates the distance of the items constituting the dimensions from the dimension averages, the lowest value is found to be 0.469 for RKH, and the highest value is 1.503 for DJ. Instead of the commonly used Cronbach's Alpha (α) method for testing the reliability of the scales, the McDonald's Omega (ω) method is adopted. This preference is based on evidence suggesting that ω values are more sensitive and represent a more reliable index of internal consistency (Graham, 2006; Revelle & Zinbarg, 2009), with a lower likelihood of overestimating or underestimating reliability (Dunn et al., 2014). Accordingly, the ω reliability values in this study range between 0.818 and 0.914. Composite reliability (CR) values, another indicator of reliability, yield similar results, ranging between 0.817 and 0.916. To ensure CR values exceed the threshold of 0.50, the WF6 item, which exhibits the lowest factor loading, is excluded from the analysis. Following this adjustment, the average variance extracted (AVE) values range between 0.565 and 0.846, meeting the criterion for convergent validity as these values exceed the 0.50 threshold. For discriminant validity, the square roots of the AVE values are calculated and compared horizontally and vertically with the correlation values presented in the correlation table (Table 2).

According to the Fornell-Larcker criterion, it is desired that the square root AVE values on the diagonal are greater than ,70 and higher than the correlation values of other dimensions (Hair et al., 2014). Based on findings, this condition is met. Finally, to ensure there is no multicollinearity problem, the variance inflation factor (VIF) values are checked. A VIF less than 5 indicates a low correlation of that predictor with other predictors. A value between 5 and 10 indicates a moderate correlation, while VIF values larger than 10 are a sign for high, not tolerable correlation of model predictors (James et al.,

2013). Since all VIF values were below 5, there is no multicollinearity problem.

seen within the desired ranges. In the single-factor structure where all variables were assigned to one factor, these values (x²/df: 11,315; CFI: ,411; GFI: ,932; RMSEA: ,194; and SRMR: ,136) were found to be at lower limits. As can be understood from this, the four-factor structure had better goodness-of-fit values (Table 3), and this showed model met the structural discriminativeness criterion with very

Table 2. Correlation Between Constructs and Squared Root AVE (Fornell-Larcker Criterion)

	Gen.	Age	Edu.	Exp.	Status	Collar	Income	IKH	RKH	WF	JI	PJ	IJ	DJ
Gender	-													
Age	,179**	-												
Education	-,169**	-,136*	-											
Experience	,267**	,842**	-,101	-										
Status	-,242**	,258**	,181**	,239**	-									
Collar	,263**	-,212**	-,342**	-,189**	-,775**	-								
Income	-,043	,084	-,063	,082	-,032	,074	-							
IKH	,011	,059	-,071	,034	-,092	,132*	,036	(,837)						
RKH	,001	,078	,036	,047	,018	-,035	-,056	,318**	(,856)					
WF	,098	,122*	,033	,169**	,151*	-,130°	,042	-,460**	-,262**	(,752)				
JI	,101	,008	-,042	-,034	-,050	,099	-,058	,039	,011	,096	(,775)			
PJ	,026	,125*	-,032	,089	,285**	-,248**	-,059	-,291**	-,131*	,421**	,200**	(,804)		
IJ	-,043	,108	,075	,076	,346**	-,334**	-,044	-,394**	-,236**	,430**	,106	,563**	(,806)	
DJ	-,024	,310**	-,052	,246**	,382**	-,406**	,048	-,157**	-,147*	,283**	,006	,467**	,411**	(,920)

Note: *Correlation is significant at the ,05 level (2-tailed). **Correlation is significant at the ,01 level (2-tailed). The numbers in parentheses are the square root of each construct's extracted average variance (AVE). Discriminant validity conditions are met for all values in the diagonal.

low common method variance. Finally, it is seen R²

Table 3. Measurement Model's Goodness of Fit (GoF) Results

Variables	x^2/df	CFI	GFI	NFI	RMSEA	SRMR
	(≤2; ≤3)	(≥,95; ≥ ,90)	(≥,95; ≥ ,90)	(≥,95; ≥ ,90)	(≤ ,05; ≤ ,08)	(≤ ,05; ≤ ,10)
KH	2	,992	,995	,984	,060	,037
WF	2,205	,993	,998	,988	,066	,021
JI	0	1	1	1	0	0
OJ	2,457	,986	,994	,976	,073	,026
Four-factor model	1,755	,961	,984	,915	,052	,052
One-factor model	11,315	,411	,932	,392	,194	,136

Note. Good and acceptable GoF values are shown in parentheses in the first row. KH: knowledge hiding, WF: workplace friendship, JI: job interdependence, OJ: organizational justice. GFI: goodness of fit index, CFI: comparative fit index, NFI: normed fit index, RMSEA: root mean square error of approximation, SRMR: standardized root mean square residual, Gof: Goodness of fit.

Structural Equation Modeling Results

Before looking at the hypothesis results, the goodness-of-fit values of structural model are checked, which consists of four scales. In this context, each scale's x²/df (chi-square/degrees of freedom), CFI (comparative fit index), NFI (normed fit index), RMSEA (root mean square error of approximation), and SRMR (standardized root mean square residual) values are found and questioned whether they had acceptable or good goodness-of-fit values. According to results, all Goodness of Fit (GoF) values were at good or excellent levels (here, the main focus is the four-factor model and the calculated values for each scale). The goodness-of-fit values of the four-factor model (x²/df: 1,755; CFI: ,961; GFI: ,984; RMSEA: ,052; and SRMR: ,052) were

values, which show the sample's ability to represent the actual population, were ,458 for KH and ,306 for WF.

Hypothesis Testing

Regression, mediation, and moderation analyses were conducted to test the hypotheses, utilizing the bootstrapping method. This approach, which involves resampling a single dataset to generate multiple simulated samples, provided more robust and meaningful results.

The first hypothesis (H1), proposing that organizational justice negatively affects knowledge hiding, was supported (β : -0.333; SE: 0.099; p: 0.001). The second hypothesis (H2), which suggested a positive relationship between organizational justice and friendship ties, was also accepted (β : 0.553;

SE: 0.073; p < 0.001). The third hypothesis (H3), stating that friendship ties negatively affect knowledge hiding, was confirmed (β : -0.433; SE: 0.085; p < 0.001). The fourth hypothesis (H4), proposing that friendship ties mediate the relationship between organizational justice and knowledge hiding, was supported through mediation tests (β : -0.239; SE: 0.055; p < 0.001). The direct and indirect effects are presented in the Structural Equation Model (SEM) shown in Table 4.

Table 4. Direct and Indirect Effects

			Direct Ef	fects				
	<u>Path</u>		<u>β %95 confi-</u> <u>dence</u>					
Predictor	Dep	pendent	β	SE	Lower	Up- per	p	
OJ		KH	-,333	,099	-,539	-,128	,001	
OJ		WF	,553	,073	,449	,657	<,001	
WF		KH	-,433	,085	-,609	-,257	<0,00 1	
			Indirect E	ffects				
	Path β %95 confi- dence							
Predic- tor	Me- diator	De- pend- ent	β	SE	Lower	Up- per	p	
OI	WF	KH	239	.055	334	118	<.001	

However, the fifth hypothesis (H5), which posited that job dependence moderates the effect of organizational justice on knowledge hiding (β : -0.050; SE: 0.037; p: 0.395), and the sixth hypothesis (H6), suggesting that job interdependence moderates the effect of friendship ties on knowledge hiding (β : -0.214; SE: 0.041; p: 0.307), were both rejected due to non-significant p-values.

Additional analyses were conducted to account for control variables such as experience, gender, and collar categories. For discrete variables, comparison tests based on Z statistics (means) were used. For demographic variables with two categories, the Student's t-test was employed, while for variables with more than two categories, ANOVA (Analysis of Variance) was applied. The ANOVA test examining differences in organizational justice and knowledge hiding levels based on experience revealed significant values for organizational justice (p < 0.001) but non-significant results for knowledge hiding (p: 0.264–0.867). Employees with more experience demonstrated higher trust in their organization's justice across all dimensions.

The Student's t-test assessing the relationship between gender and the levels of organizational justice and knowledge hiding yielded non-significant p-values (p: 0.474–0.993), indicating no gender-based differences. The ANOVA test exploring differences in organizational justice and knowledge hiding levels by collar type showed significant results for organizational justice (p < 0.001) but non-significant values for knowledge hiding (p: 0.108–0.753). Group means revealed that blue-collar workers were less inclined to hide knowledge, while white- and gray-collar employees displayed similar tendencies in knowledge hiding.

Conclusion and Discussion

In the modern world, also referred to as the Information Age, the importance of knowledge has become greater than ever. Thanks to this, small enterprises have been able to grow rapidly and surpass their established competitors. Therefore, it has become a necessity for all businesses to access useful information and make the best use of it. However, businesses face some challenges in this regard. The main challenges include obtaining new knowledge that will shape the sector, data mining to select the correct and useful information from vast amounts of data, and making the best use of the knowledge already possessed. In this context, the issue that has increasingly attracted the attention of academics in literature is knowledge hiding behavior, which directly affects the efficiency of organizations. Many studies conducted in this field shed light on the psychological, social, and organizational reasons for knowledge hiding. In this study, the organizational and social factors leading to knowledge hiding were discussed.

Numerous studies on the organizational factors leading to knowledge hiding have shown that this behavior is closely related to perceived organizational justice (Oubrich et al., 2021). According to this, knowledge sharing increases in organizations that gain employees' appreciation in the dimensions of procedural, interactional, and distributive justice (Mahmood et al., 2023). As for the social aspect of knowledge hiding, studies in this field have examined knowledge hiding behavior within the framework of SET and found that individuals de-

cide whether to hide or share knowledge by considering their mutual gains and losses. According to this, an individual who suffers from hiding knowledge will not be inclined to continue this behavior. This situation becomes more prominent in work environments where there is mutual job interdependence. Another social component related to knowledge hiding that needs to be known is the structure of workplace friendship within the organization. Accordingly, in organizations where workplace friendship occurs, the tendency to hide knowledge decreases, and cooperation increases. This, in turn, undoubtedly increases the organization's productivity and efficiency.

In this study, six hypotheses were evaluated to examine the relationships between organizational justice, workplace friendships, and knowledge hiding behaviors. Control variables such as experience, gender, and collar type were also analyzed to gain deeper insights. The findings reveal that organizational justice significantly knowledge hiding, supporting Jahanzeb et al. (2020), who emphasized that decision-makers' sensitivity and transparency increase perceptions of justice and decrease knowledge hiding behaviors. The analysis further indicates that organizational justice positively influences workplace friendships. This aligns with SET, which suggests that friendships formed in horizontal and vertical hierarchical positions foster perceptions of justice (Cropanzano & Mitchell, 2005). Additionally, strong workplace friendships significantly reduce knowledge hiding, consistent with He et al. (2022), who found that such relationships enhance wellbeing and promote knowledge sharing. Notably, workplace friendship also moderates the relationorganizational ship between justice knowledge hiding. In environments characterized by strong workplace friendships, knowledge hiding behaviors driven by perceptions of justice are diminished. This finding echoes He et al. (2022), who described workplace friendships as inhibitors of knowledge hiding within the framework of SET.

Contrasting these significant results, the fifth hypothesis, which proposed that job interdependence moderates the effect of organizational justice on knowledge hiding, was not supported. Similarly, the sixth hypothesis, suggesting that task interdependence moderates the effect of workplace friendship on knowledge hiding, was also rejected. These findings indicate that interdependence in tasks does not influence knowledge-hiding behaviors related to organizational justice or workplace friendships. Notably, no reference studies in the literature were found to examine these non-significant interactions. Lastly, the study explored whether perceptions of organizational justice and knowledge hiding behaviors vary across the control variables of experience, gender, and collar type. Experience was found to significantly influence perceptions of justice, with more experienced employees demonstrating higher trust in organizational justice across all dimensions. In contrast, no significant differences were observed knowledge-hiding behaviors based on experience, nor did gender influence either variable. However, differences were evident when comparing employees by collar type. Blue collar workers were significantly more willing to share knowledge than white or gray collar workers, whose knowledge sharing tendencies were nearly identical. While these findings highlight unique behavioral patterns among collar types, no studies were identified in the literature examining the combined effects of these control variables on the dependent and independent variables.

This study is distinct from others as it addresses both workplace friendship and job interdependence in the effect of organizational justice on knowledge hiding behavior. A review of the literature revealed no similar research. Furthermore, while SET suggests that employee behaviors are conducted based on a cost-benefit analysis, it does not address how this behavior differs based on collar type. For these reasons, it is assumed this study contributes to both the literature and SET.

Limitations of this study include the analysis being based solely on data from those who were willing to complete the survey forms, meaning that not all employees' data was collected, allowing for some flexibility in the results. Additionally, since the surveys were not conducted face-to-face, the importance of the topic could not be thoroughly explained by the researchers.

Future studies could benefit from including different sectors, applying the same study to the same participants at regular intervals, and conducting statistical analyses that include all studies in this field using the meta-analysis technique. Additionally, comparisons between provinces can be made according to income levels, providing further insight into regional variations and their potential impact on the findings

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