



Examining Knowledge Sharing Behavior on SNS from an Impression Management Perspective

Junwan Seo 1 and Sang Yup Lee 2,*

- ¹ Yonsei University; Doctoral student; jjun222e@naver.com
- ² Yonsei University; Associate Professor; sangyuplee@yonsei.ac.kr
- * Correspondence

https://doi.org/10.5392/IJoC.2022.18.4.010

Manuscript Received 12 October 2022; Received 20 December 2022; Accepted 21 December 2022

Abstract: We examined how knowledge sharing behavior on social network sites is associated with impression management motivations as knowledge sharing can be regarded as a self-representation behavior that people perform to impress others. We collected data through an online survey in which 705 respondents participated. To answer the research questions and test hypotheses, a set of hierarchical regression models were employed. We found that both motivation for impression management and the explanatory variables of self-determination theory played important roles in explaining knowledge sharing behavior on Facebook. However, the explanatory variables of self-determination theory were positively associated with the dependent variable, whereas motivations for impression management were negatively associated. We further found that the exact relationship between the motivation to impress others and knowledge sharing varied according to the topic of the knowledge that people shared on Facebook. That is, impression management motivation played a more negative role for topics that require more expertise, such as "politics," "economics," and "health" topics, than for more casual topics. This suggests that people might have greater fear of negative evaluation when they are considering posts related to "politics," "economics," and "health" topics.

Keywords: Knowledge Sharing; Impression Management Motivations; Facebook; Self-Determination Theory

1. Introduction

Knowledge sharing can be defined as "the communication of knowledge from a source in such a way that it is learned and applied by the recipient" [1]. Knowledge sharing is vital because it can be beneficial to those who are exposed to or consume this shared knowledge. It plays a critical role in many areas. For example, prior studies have found that knowledge sharing leads to innovations in an organization and help firms do better in the market 2, and knowledge sharing among students helps them learn new things and perform better in school [3].

The Internet is an important communication channel that people use to share knowledge. Recently, due to their popularity and social features, social networking sites (SNS), such as Facebook and Twitter, are used as primary platforms where people post knowledge about various topics [4-7]. Furthermore, knowledge posted on SNS can be spread easily because these platforms allow users to share others' posts in an efficient way. In turn, through these shared posts, this knowledge is also consumed by a wider audience [8].

To stimulate knowledge sharing on SNS, it is important to correctly understand what motivates (or discourages) users to post knowledge on SNS. However, prior studies of motivations for SNS knowledge sharing have focused on limited aspects of these motivations and have frequently ignored the main characteristics of SNS—their social aspects [9]. Primary factors examined in prior studies were those related to intrinsic and extrinsic motivations, which were suggested by self-determination theory [10]. Intrinsic motivations considered in previous studies include altruism and enjoyment [11], whereas extrinsic motivations include reciprocity and reputation [12, 13].

To better understand knowledge sharing behavior on SNS, however, it is necessary to consider the social aspects of SNS as the main purpose of using SNS is to interact or communicate with others [14]. It is known

that an individual tends to selectively express themselves on SNS to impress others so that others perceive them more competent or knowledgeable, which is known as self-presentation [15]. This indicates that impression management motivations should be taken into account when studying motivations for sharing or posting knowledge on SNS as such behavior can be a means of self-presentation or impressing others. As an attempt to close the gap in the literature, the present study examined the roles of impression management motivations in knowledge sharing on SNS. Further, because the degree to which impression management motivation influences knowledge sharing behavior on SNS can vary according to the topic of knowledge shared, this study also examines how the roles of these explanatory variables vary according to topic. The topics considered in this study include "politics," "economy," "health," "fashion," and "food."

2. Theoretical background

2.1 Knowledge sharing and its motivations

There is no unanimously agreed upon definition of knowledge. In general, knowledge is regarded as useful information regarding a certain topic or task. For example, [2] define knowledge as "information processed by individuals, including ideas, facts, expertise, and judgments relevant for individual, team, and organizational performance." Other researchers have also argued that knowledge can be regarded as information that can be used to accomplish a certain task [16, 17].

Knowledge sharing refers to a process or activity of exchanging knowledge between individuals, groups, or organizations to help and collaborate with others [16, 18]. Knowledge sharing is important in many areas; particularly, it has been recognized as a factor that significantly influences the success of an organization. Knowledge sharing between employees is found to help organizations share and utilize knowledge-based resources (e.g., work know-how that individuals have obtained personally) [19]. This can lead to new ideas and innovations, which help firms and organizations have advantages over their competitors and accomplish better performances [2]. Prior studies also found that knowledge sharing plays an important role in reducing production costs, which can place the firm in a more advantageous position considering price competition [16]. Thus, an organization or firm in which employees freely and frequently engage in knowledge sharing is more likely to generate greater sales and revenues [16, 20, 21].

Knowledge sharing is also critical for facilitating student's learning and education [3]. Prior studies have found that knowledge sharing can help students perform better in school and possess more diverse perspectives about various topics [22-24]. In addition to the knowledge itself shared, students can learn new things by contemplating the knowledge being shared or having discussions with others about the knowledge [25]. These processes are known to help students strengthen their understanding of a topic and have more diverse perspectives.

Knowledge sharing is a social phenomenon such that it occurs through communication between individuals [26]. This implies that individuals are important actors in spreading knowledge [27]. As sharing knowledge is a type of human behavior and individuals should be motivated to perform behaviors [28-30], it is important to correctly understand what motivates (or discourages) an individual to share knowledge with others.

Many previous studies of motivations for knowledge sharing [31-33] relied on self-determination theory [34, 35]. The theory posits that individual motivations are categorized into intrinsic and extrinsic motivations [35]. According to [35], extrinsic motivation refers to "doing something because it leads to a separable outcome," whereas intrinsic motivation refers to "doing something because it is inherently interesting or enjoyable."

One of the most commonly considered and critical intrinsic motivations for sharing knowledge is altruism [11, 36]. Altruism refers to willingness or behavior to help others with desire to benefit others than oneself [34, 35]. For altruistic behavior, people do not expect any compensation or reward for their behaviors [11]. When sharing knowledge with others is considered an altruistic behavior, people do the behavior mainly due to their desire to help others.

Prior studies of motivations for knowledge sharing have highlighted reputation, reciprocity, and financial rewards as extrinsic motivations [12, 13]. Reputation refers to the overall quality or character of an individual [13]. According to prior research, knowledge sharers want to improve their reputation by sharing knowledge related to a certain topic, which signals that they are knowledgeable in that area [37]. Thus, individuals tend to share knowledge more frequently if they feel that it can increase their reputation [37, 38].

The reciprocity motivation refers to when an individual performs a particular behavior mainly because others have performed the same or similar behavior before to the person [39]. For example, a person might want to help their friend because this friend had already helped them. In the case of knowledge sharing, a person might want to share knowledge about a topic because the person has consumed or helped by knowledge that was shared by others [40].

Financial rewards are also commonly examined in relation to knowledge sharing within companies or organizations, where knowledge sharing behavior can lead to financial rewards or compensation [19, 41, 42]. However, because knowledge sharing on SNS is unlikely to lead to financial rewards, this motivation is not expected to play an important role on SNS. Thus, financial rewards are not considered in this study.

2.2 Knowledge sharing on SNS

SNS has become a popular place for sharing knowledge [1, 43]. People use SNS for posting knowledge or consuming knowledge shared by others, as well as for connecting with new people and maintaining existing relationships [4, 44]. Individuals can easily post knowledge on SNS, and once knowledge has been posted on SNS, it can be shared by many people connected to the original user who uploaded the post, consequently making SNS an important place for knowledge sharing [45]. Due to SNS's effectiveness for knowledge sharing, many communities and organizations have adopted SNS as a tool for supporting knowledge sharing activities within a community or organization [45].

Much research regarding knowledge sharing on SNS has been conducted in several contexts. A majority of these prior studies have focused on how an organization or firm can utilize SNS to stimulate its employees share knowledge [46-49]. These studies commonly found that SNS can be a useful tool for organizational knowledge sharing, which leads to better performance or success of an organization. In addition, due to the popularity of SNS among young people, numerous studies have examined SNS for knowledge sharing in educational contexts and found that SNS play important roles in facilitating students' learning [50-52].

As mentioned previously, correctly understanding individuals' motivations behind knowledge sharing is important for expediting the process, which is why many studies have examined motivations behind sharing knowledge on SNS. However, most of these studies were based on intrinsic and extrinsic motivations [1, 53-55]. To more correctly understand knowledge sharing behavior on SNS, social aspects should be considered, since the main purpose of SNS is to facilitate social interactions [14]. The frequent social interactions on SNS indicate that SNS users are often engaged in impression management behavior because these two behaviors are inherently linked [56, 57]. Thus, we need to consider impression management when examining knowledge sharing behavior on SNS.

2.3 Impression management on SNS

As mentioned above, SNS possess different characteristics from previously examined knowledge sharing platforms. One of the main purposes of using SNS is to interact with others [14], and in social situations where these interpersonal interactions occur, people engage in impression management behavior [56]. This is mainly because social interactions affect what others think of (or how other evaluate) an individual, and people want to be perceived or evaluated positively by others [56, 57]. Impression management behaviors include presenting more positive aspects of the self (i.e., self-presentation) while concealing their negative aspects to develop a positive impression and gain acceptance of others [15]. As individuals frequently interact with others on SNS, they also engage in impression management behaviors on SNS [58-60]. Individuals try to present themselves in socially desirable and positive ways on SNS, such as by appearing fairly knowledgeable, talented, and agreeable.

How much an individual wants to impress others is determined by their motivations for impression management [61]. An individual who has a strong motivation to impress others is likely to try to impress others more strongly and engage in impression management behavior more frequently. An individual's motivation for impression management on SNS is known to be influenced by either their psychological characteristics (e.g., public self-consciousness, self-esteem, etc.) or contextual factors (e.g., number of friends on SNS and perceived importance of others on an SNS) [62].

Motivations for impression management are linked to social anxiety [63]. According to prior studies of social anxiety, an individual's motivation for impression management is positively associated with their social anxiety level [61, 63]. These studies suggest that regardless of their behavior, a person more strongly motivated

to impress others would be likely to feel more socially anxious. People who are not motivated to impress others would not feel socially anxious mainly because they do not care others' reactions to their behavior, regardless of their behavior [61]. Furthermore, it might be challenging for an individual with a stronger impression management motivation to effectively impress others mainly due to their high standards. Thus, a person more strongly motivated to impress others is more likely to concern about the results of their behaviors and how others would respond to their behaviors, consequently leading to social anxiety [63].

Social anxiety is defined as "anxiety resulting from the prospect or presence of personal evaluation in real or imagined social situations" [63, p. 642]. Prior studies have found that people with social anxiety tend to spend more time on the Internet, especially on SNS [64, 65], mainly because they prefer asynchronous online communication channels to real-time face-to-face communication. Although several studies claim that socially anxious individuals may feel more comfortable on SNS than in offline settings, they are also likely to feel socially anxious on SNS. This is because people are likely to feel socially anxious when they interact with others and can observe how others react to their behaviors [66], and SNS are places where people continuously interact with others and can directly or indirectly see how others respond to their behaviors. This indicates that even though people with social anxiety tend to spend much time on SNS, such as Facebook, they are likely to avoid situations where their behaviors can be evaluated by other SNS users. Prior studies found that active use, such as posting or sharing something on SNS can be regarded as a behavior that may be evaluated by others, and the user can observe how others respond to their post, which indicates that users with social anxiety are likely to use SNS passively (i.e., only monitoring what others do on SNS without engaging in direct communication) [67, 68].

In addition, one of the core characteristics of social anxiety is fear of negative evaluations from others [63]. Fear of negative evaluation is defined as "apprehension about others' evaluations, distress over negative evaluations, avoidance of evaluative situations, and the expectation that others would evaluate oneself negatively" [69]. Individuals who fear negative evaluations from others are likely to focus more on negative information about themselves than positive information when they interact with others [70], in turn they regard or evaluate themselves negatively based on such distorted information [70].

Individuals with fear of negative evaluations tend to seek social approval from others [69]. In addition, they tend to avoid evaluative situations, seek out situations with little possibility of being judged or evaluated by others, and perceive social situations as more evaluative and risky than individuals without fear of negative evaluation [69].

Individuals with fear of negative evaluation tend to prefer computer-mediated communication or online social networking sites to face-to-face communication, mainly because these online communication channels allow them to control how they are presented to others, that is, they can selectively present only positive aspects of themselves, [71] and provide nonsynchronous communication, which gives them more time for preparation [72]. Although SNS provide more control of self-presentation and asynchronous communication compared to face-to-face communication, individuals with fear of negative evaluation may still be less likely to post on SNS to avoid possible negative evaluations from others. This is because they can perceive posting on SNS as socially risky (i.e., something that can be evaluated by others) [73]. In addition, given that individuals with a greater fear of negative evaluation tend to perceive non-evaluative situations as evaluative and expect negative outcomes, they are likely to expect others to respond negatively to their posts [73]. This indicates that individuals who fear negative evaluation are less likely to post or share knowledge on SNS.

In summary, we expect individuals with stronger motivations for impression management on SNS to be less likely to post knowledge on SNS. Thus, we propose the following hypothesis:

H1: An individual's motivation for impression management on SNS is negatively associated with their knowledge sharing behavior on SNS.

2.4 Moderating effects of the topics of knowledge posted on SNS

Prior studies reviewed in the preceding subsections suggest that the effects of the factors considered in the present study (i.e., intrinsic and extrinsic motivations and motivations for impression management) on posting knowledge behavior can vary according to the topic of the post. The topics of knowledge examined in this study include "politics," "economics," "health," "fashion," and "food." For example, knowledge about health can be regarded as knowledge intended to help others, thus, intrinsic motivations such as altruism could play a more important role. Alternatively, when posting knowledge to impress others (e.g., fashion), impression

management motivation is likely to play a more important role. Thus, we also examine how the effects of different motivations on posting knowledge behavior vary according to the topic of knowledge.

3. Materials and Methods

3.1 Sample

Data were collected through an online survey conducted by a Korean research company (http://www.hrc.co.kr/eng/) that has more than 300,000 panel members. In total, 705 respondents participated in the survey. For their participation, they received a small financial reward. Of the 705 respondents, 353 were women (50.1%), 199 were in their 20s (28.2%), 197 were in their 30s (27.9%), 155 were in their 40s (22.0%), and 154 were over 50 years old (21.8%).

3.2 Measures

3.2.1 Perceived frequency of knowledge sharing on Facebook

The frequency of sharing knowledge refers to the perceived frequency by which a user posts or shares knowledge on Facebook. Two questions were used: "I often share (or post) knowledge about the areas I am interested in on Facebook," and "I often share (or post) the latest knowledge about the topics I am interested in on Facebook." The answer options varied from 1 (strongly disagree) to 7 (strongly agree).

3.2.2 Altruism

To measure altruism motivations, we used the scale developed by [74] and modified it for our study. The scale is composed of four items with answers ranging from 1 (strongly disagree) to 7 (strongly agree). Items included "I share knowledge on Facebook because I think the knowledge I share can be helpful to others," "I hope the knowledge I share on Facebook will be helpful to others," "I feel happy when the knowledge I share on Facebook helps others," and "I like to provide knowledge to others by sharing knowledge on Facebook."

3.2.3 Reputation

The scale developed by [37] was adopted and modified to suit the purpose of this study. The scale is composed of five items with answers ranging from 1 (strongly disagree) to 7 (strongly agree). Items included "If I share knowledge on Facebook, others will look at me positively," "If I share knowledge on Facebook, my awareness in the field will increase," "If I share knowledge on Facebook, my reputation in the field will increase," "If I share knowledge on Facebook, others will consider me important."

3.2.4 Reciprocity

To measure the motivation of reciprocity, we used the scale developed by [13], which comprises three items: "I share knowledge on Facebook because I have been helped by knowledge posted by others," "If I share knowledge on Facebook, others will also share knowledge," and "If I share knowledge on Facebook, I will also be able to get help from knowledge posted by others." The answers ranged from 1 (strongly disagree) to 7 (strongly agree).

3.2.5 Motivations to impress others on Facebook

To measure the degree to which a person is motivated to impress others on Facebook, we adopted six items from [75]. These items included: "I want other users on Facebook to perceive me as likable," "I want other users on Facebook to perceive me as friendly," and "I want other users on Facebook to perceive me as competent." The answer options varied from 1 (strongly disagree) to 7 (strongly agree).

3.2.6 Facebook use intensity

To assess the intensity of a person's Facebook use, the scale developed by [14]was adopted. The scale consists of six items, including "Facebook is part of my everyday routine" and "I am proud to tell people I am on Facebook." The answer options varied from 1 (strongly disagree) to 7 (strongly agree).

3.2.7 Topics of knowledge

Participants were asked about the topics of knowledge they usually post on SNS. The topics considered in this study were "politics," "economics," "health," "fashion," "food," and "others."

3.3 Statistical models

To test the hypothesis and answer the research question, we employed the following regression model.

 $KSF_{j} = b0 + b1 \cdot ALT_{j} + b2 \cdot RPT_{j} + b3 \cdot RCP_{j} + b4 \cdot MIO_{j} + b5 \cdot FUI_{j} + b6 \cdot Age_{j} + b7 \cdot Gender_{j} + e_{j}$ (1)

Where,

KSF_j: Perceived knowledge sharing frequency on Facebook of person j

 ALT_j : Altruism motivation of person j

RPT $_j$: Reputation motivation of person j

 RCP_j : Reciprocity motivation of person j

 MIO_j : Motivations to impress others of person j

 FUI_j : Perceived Facebook use intensity of person j

Equation (1) was estimated using the OLS method.

4. Results

4.1 Correlation coefficients

The correlation coefficients of the main variables and corresponding Cronbach's alpha values are reported in Table 1.

Table 1. Correlation coefficients and Cronbach's alpha

Variable	1	2	3	4	5	6
1. Perceived knowledge						
sharing frequency	-					
2. Altruism	.707**	-				
3. Reputation	.594**	.698**				
4. Reciprocity	.705**	.901**	.698**			
5. Motivation to impress others	.402**	.580**	.622**	.548**	-	
6. Facebook use intensity	.723**	.613**	.585**	.597**	.463**	-
Mean	3.71	4.21	3.54	4.31	4.03	3.14
SD	1.58	1.49	1.35	1.49	1.36	1.36
Cronbach's α	.94	.94	.97	.95	.97	.92

Note: N=705, * p < 0.05, ** p < 0.01

The results in Table 1 show that the dependent variable of this study (i.e., perceived knowledge sharing frequency) was positively and significantly correlated with the explanatory variables examined in this study. The dependent variable had greater correlations with altruism, reciprocity, and Facebook use intensity. In addition, the main explanatory variable of this study, which is motivation to impress others was also statistically significantly correlated with the other explanatory variables.

4.2 Regression estimation results

4.2.1 Estimation results of Equation (1)

The estimation results of Equation (1) are reported in Table 2. To see the separate explanatory power of the motivation variables from self-determination theory (i.e., altruism, reputation, and reciprocity) and the explanatory variable of impression management motivation on SNS, we conducted hierarchical regressions. The coefficients for Model 1 in Table 2 were obtained by regressing the dependent variable on the control variables, that is, Facebook use intensity, gender, and age. Afterwards, we estimated another regression model (Model 2) containing the variables from self-determination theory in addition to the control variables considered in Model 1. Finally, in Model 3, we incorporated impression management motivation.

Table 2. Estimation results of hierarchical regression models

Variable	Model 1 Model 2		Model 3	
variable		B (SE)		
Constant	0.320 (0.209)	-0.206 (0.186)	-0.104 (0.249)	
Facebook Use Intensity	0.837 (0.030)**	0.508 (0.035)**	0.517 (0.034)**	
Gender	0.331 (0.081)**	0.195 (0.072)**	0.205 (0.071)**	
Age	0.007 (0.005)	-0.002 (0.003)	-0.003 (0.003)	
Altruism		0.212 (0.057)**	0.248 (0.057)**	
Reputation		0.052 (0.040)	0.121(0.042)**	
Reciprocity		0.242 (0.057)**	0.238 (0.057)**	
Motivation to Impress Others			-0.143 (0.034)**	
R^2	0.54	0.65	0.66	
F	$F(3,701) = 269.17^{**}$	$F(6,698) = 216.20^{**}$	$F(7, 697) = 192.26^{**}$	
-				

Note: *N*= 705, * *p* < 0.05, ** *p* < 0.01

The results of Model 3 show that the motivation variables of self-determination theory were positively and statistically significantly associated with the dependent variable. Among the variables, the altruism variable had the largest coefficient, which suggests that it might play a more important role in explaining knowledge sharing behavior on Facebook than the other motivation variables of self-determination theory. Conversely, the impression management motivation variable had a negative association with the dependent variable, which indicates that an individual who is more strongly motivated to impress others is less likely to post (or share) knowledge on Facebook. Accordingly, HI was supported.

4.2.2 Moderating effects of topics of knowledge

To examine how the effects of the predictors on the dependent variable vary according to the topic of a Facebook post, we ran a separate regression analysis for each topic. The topics of knowledge considered in this study include "politics," "economy," "health," "fashion," and "food." The results of the regression analyses are reported in Table 3.

Table 3. Regression estimation results for different topics of knowledge

	Topics					
Variable	Politics	Economy	Health	Fashion	Food	
			B (SE)			
Constant	0.052(0.300)	-0.153(0.271)	132(.265)	.189(.394)	026(.255)	
Facebook Use	0.534(0.055)**	0.539(0.048)**	.565(.045)**	.539(.060)	.512(.043)**	
Intensity	0.554(0.055)	0.339(0.048)	.505(.045)	**	.512(.045)	
Gender	0.194(0.115)	0.263(0.097)**	.242(.098)*	.070(.152)	.163(.093)	
Age	-0.001(0.005)	-0.003(0.004)	.001(.004)	.001(.006)	002(.004)	

Altruism	0.339(0.092)**	0.318(0.081)**	.224(.079)**	.043(109)	.132(.073)
Reputation	0.091(0.064)	0.105(0.058)	.104(.058)	.161(.076)*	.064(.051)
Reciprocity	0.135((0.089)	$0.162(0.082)^*$.189(.079)*	.331(.109)**	.352(.072)**
Motivation to	-	-	112(049)*	102(065)	080(042)
Impress Others	0.139(0.050)**	$0.122(0.047)^*$	113(.048)*	103(.065)	080(.042)
R^2	0.68	0.71	0.64	0.57	0.64
F	F(7, 274) =	F(7, 321) =	F(7, 385) =	F(7, 244) =	F(7, 450) =
	83.90**	111.11**	96.66**	46.65**	113.84**

Note: * *p* < 0.05, ** *p* < 0.01

Table 3 shows the roles of explanatory variables in explaining knowledge sharing behavior on Facebook varied with the topics of knowledge shared on Facebook. First, the variable of impression management motivation had negative and statistically significant associations with the dependent variable for the "politics," "economy," and "health" topics, whereas it had statistically insignificant associations with the dependent variable for the "fashion" and "food" topics. These results indicate that the effects of impression management motivation on knowledge sharing behavior varied with the topic of the knowledge people share on Facebook. In particular, it tends to play a more negative role when uploading posts of topics that require more expertise such as 'politics,' 'economy,' and 'health' than the other topics. Second, like the variable of impression management motivation, the "altruism" motivation played a more important role in explaining the dependent variable for the "politics," "economy," and "health" topics, while the "reciprocity" motivation played a more important role in explaining the dependent variable for the "fashion" and "food" topics. Finally, the "reputation" motivation variable had statistically insignificant associations with the dependent variable for most of the topics.

5. Discussion

In this study, we examined knowledge sharing behavior on Facebook from the perspectives of self-determination theory and impression management. Prior studies of motivations for knowledge sharing on SNS were primarily based on self-determination theory, which distinguishes intrinsic and extrinsic motivations. As SNS provides an important platform for individuals to share knowledge, this study attempted to deepen the understanding regarding this behavior. In addition to the motivation variables from self-determination theory, we also considered the social aspects of SNS by incorporating the motivation of impression management. This is because as SNS is becoming common for impression management or self-presentation, knowledge sharing on SNS can be considered an action conducted with the intent to impress others.

Similar to prior studies of the motivations behind knowledge sharing, the intrinsic (i.e., altruism) and extrinsic motivations (i.e., reputation and reciprocity) from self-determination theory had positive associations with knowledge sharing behavior on Facebook. Alternatively, as expected in the hypothesis, the impression management motivation variable had a negative association with knowledge sharing behavior on Facebook. As discussed in Section 2, this might be because motivations for impression management are positively related to social anxiety, of which fear of negative evaluations from others is intrinsic, since knowledge sharing is a behavior that can be evaluated by others. Individuals with social anxiety tend to fear negative evaluations; thus, they are likely to avoid evaluative situations, seek out situations with little likelihood of being evaluated by others, and are likely to perceive social situations as more evaluative [69].

In addition, we also examined how the effects of the main predictors of knowledge sharing behavior on Facebook varied according to the topics that people share. The results revealed that the effects of the predictors varied by topic of knowledge. First, the impression management motivation variable played a more important role in explaining knowledge sharing behavior on Facebook for topics including "politics," "economy," and "health" than the other topics of "fashion" and "food." Specifically, for the topics of "politics," "economy," and "health," individuals with stronger impression management motivation are likely to post (or share) knowledge less on Facebook. If we regard "politics," "economy," and "health" as topics that require more expertise than the "fashion" and "food" topics, then the results imply that individuals consider sharing knowledge about "politics," "economy," and "health" more evaluative and expect more negative responses from others than sharing knowledge about "fashion" and "food."

Similar to the impression management motivation variable, the altruism motivation variable also played a more important role for the "politics," "economy," and "health" topics than the "fashion" and "food" topics, but its associations with knowledge sharing on Facebook were positive. This might be because people think knowledge about "politics," "economy," and "health" can be more beneficial to others or society than knowledge about "fashion" and "food." Conversely, the "reciprocity" motivation played a more important role for the "fashion" and "food" topics than for the other topics. This indicates that individuals tend to post knowledge about "fashion" and "food" topics partly because they have been helped by related knowledge shared by others, or they expect others will also share this knowledge.

This study has some limitations. First, we used data from South Korea, which may not be easily generalized to other countries, especially those countries in which impression management plays a different or less important role regarding Facebook. Second, the context of this study was Facebook, which has different features from other SNS platforms, such as Twitter. Thus, motivations for knowledge sharing on Facebook may be different from those on other SNS platforms.

In conclusion, to better understand knowledge sharing behavior on SNS, this study considered the social aspects of SNS, or the impression management motivation. This was based on the findings of prior studies [56, 57] that impression management is important and pervasive in situations where social interactions occur, that knowledge sharing behavior may be evaluated by others, and that the user can observe how others respond to their post. We found that motivations to impress others had a negative association with knowledge sharing behavior on Facebook in general. However, the exact relationship between the motivation to impress others and knowledge sharing varied according to the topic of the knowledge that people shared. That is, impression management motivation played a more important role for topics that require more expertise, such as "politics," "economics," and "health" topics, than for more casual topics.

Acknowledgments: This research was supported by the Yonsei Signature Research Cluster Program (2021-22-0007).

Conflicts of Interest: The authors declare no conflict of interest.

References

- [1] W. W. Ma and A. Chan, "Knowledge sharing and social media: Altruism, perceived online attachment motivation, and perceived online relationship commitment," Computers in human behavior, vol. 39, pp. 51-58, 2014, doi.org/10.1016/j.chb.2014.06.015
- [2] S. Wang and R. A. Noe, "Knowledge sharing: A review and directions for future research," *Human resource management review*, vol. 20, no. 2, pp. 115-131, 2010, doi.org/10.1016/j.hrmr.2009.10.001
- [3] M. I. Eid and I. M. Al-Jabri, "Social networking, knowledge sharing, and student learning: The case of university students," Computers & Education, vol. 99, pp. 14-27, 2016, doi.org/10.1016/j.compedu.2016.04.007
- [4] S. Y. Lee, "Effects of relational characteristics of an answerer on perceived credibility of informational posts on social networking sites: the case of Facebook," Information Research: An International Electronic Journal, vol. 23, no. 3, p. n3, 2018
- [5] A. Mansour and H. Francke, "Credibility assessments of everyday life information on Facebook: a sociocultural investigation of a group of mothers," Information Research, vol. 22, no. 2, 2017.
- [6] F. McGrath. "Top 10 Reasons for Using Social Media." http://blog.globalwebindex.net/chart-of-the-day/social-media/ (accessed June 1, 2017).
- [7] S. Rodriguez. "Mark Zuckerberg shifted Facebook's focus to groups after the 2016 election, and it's changed how people use the site." CNBC. https://www.cnbc.com/2020/02/16/zuckerbergs-focus-on-facebook-groups-increases-facebook-engagement.html (accessed September 21, 2021).
- [8] P. B. Brandtzæg, M. Lüders, and J. H. Skjetne, "Too many Facebook "friends"? Content sharing and sociability versus the need for privacy in social network sites," Intl. Journal of Human–Computer Interaction, vol. 26, no. 11-12, pp. 1006-1030, 2010, doi.org/10.1080/10447318.2010.516719
- [9] I. Cho, H. Park, and J. K. Kim, "The relationship between motivation and information sharing about products and services on Facebook," Behaviour & Information Technology, vol. 34, no. 9, pp. 858-868, 2015, doi.org/10.1080/0144929X.2014.988177
- [10] E. L. Deci and R. M. Ryan, *Intrinsic motivation and self-determination in human behavior*, Springer Science & Business Media, 2013.

- [11] E. Fehr and S. Gächter, "Fairness and retaliation: The economics of reciprocity," Journal of economic perspectives, vol. 14, no. 3, pp. 159-181, 2000, DOI: 10.1257/jep.14.3.159
- [12] Y. S. Hau, B. Kim, H. Lee, and Y.-G. Kim, "The effects of individual motivations and social capital on employees' tacit and explicit knowledge sharing intentions," International Journal of Information Management, vol. 33, no. 2, pp. 356-366, 2013, doi.org/10.1016/j.ijinfomgt.2012.10.009
- [13] S.-Y. Hung, A. Durcikova, H.-M. Lai, and W.-M. Lin, "The influence of intrinsic and extrinsic motivation on individuals' knowledge sharing behavior," International Journal of Human-Computer Studies, vol. 69, no. 6, pp. 415-427, 2011, doi.org/10.1016/j.ijhcs.2011.02.004
- [14] N. B. Ellison, C. Steinfield, and C. Lampe, "The benefits of Facebook "friends:" Social capital and college students' use of online social network sites," Journal of computer-mediated communication, vol. 12, no. 4, pp. 1143-1168, 2007, doi.org/10.1111/j.1083-6101.2007.00367.x
- [15] J. Rosenberg and N. Egbert, "Online impression management: Personality traits and concerns for secondary goals as predictors of self-presentation tactics on Facebook," Journal of Computer-Mediated Communication, vol. 17, no. 1, pp. 1-18, 2011, doi.org/10.1111/j.1083-6101.2011.01560.x
- [16] J. N. Cummings, "Work groups, structural diversity, and knowledge sharing in a global organization," Management science, vol. 50, no. 3, pp. 352-364, 2004, doi.org/10.1287/mnsc.1030.0134
- [17] D. W. Dorsey, "Hiring for knowledge-based competition," in *Managing knowledge for sustained competitive advantage: Designing strategies for effective human resource management*, S. E. Jackson, A. DeNisi, and M. A. Hitt Eds.: John Wiley & Sons, 2003.
- [18] S.-W. Hung and M.-J. Cheng, "Are you ready for knowledge sharing? An empirical study of virtual communities," *Computers & Education*, vol. 62, pp. 8-17, 2013, doi.org/10.1016/j.compedu.2012.09.017
- [19] E. F. Cabrera and A. Cabrera, "Fostering knowledge sharing through people management practices," *The* international journal of human resource management, vol. 16, no. 5, pp. 720-735, 2005, doi.org/10.1080/09585190500083020
- [20] J. B. Arthur and C. L. Huntley, "Ramping up the organizational learning curve: Assessing the impact of deliberate learning on organizational performance under gainsharing," Academy of Management Journal, vol. 48, no. 6, pp. 1159-1170, 2005, doi.org/10.5465/amj.2005.19573115
- [21] C. J. Collins and K. G. Smith, "Knowledge exchange and combination: The role of human resource practices in the performance of high-technology firms," Academy of management journal, vol. 49, no. 3, pp. 544-560, 2006, doi.org/10.5465/amj.2006.21794671
- [22] S. Majid and S. M. Wey, "Perceptions and knowledge sharing practices of graduate students in Singapore," International Journal of Knowledge Management (IJKM), vol. 5, no. 2, pp. 21-32, 2009, DOI: 10.4018/jkm.2009040102
- [23] S. Majid and P. K. Chitra, "Role of knowledge sharing in the learning process," *Literacy Information and Computer Education Journal (LICEJ)*, vol. 2, no. 1, pp. 1201-1207, 2013.
- [24] H.-J. So and T. A. Brush, "Student perceptions of collaborative learning, social presence and satisfaction in a blended learning environment: Relationships and critical factors," Computers & education, vol. 51, no. 1, pp. 318-336, 2008, doi.org/10.1016/j.compedu.2007.05.009
- [25] I. Choi, S. M. Land, and A. J. Turgeon, "Scaffolding peer-questioning strategies to facilitate metacognition during online small group discussion," Instructional science, vol. 33, no. 5, pp. 483-511, 2005, doi.org/10.1007/s11251-005-1277-4
- [26] T.-C. Lin, S. Wu, and C.-T. Lu, "Exploring the affect factors of knowledge sharing behavior: The relations model theory perspective," Expert Systems with Applications, vol. 39, no. 1, pp. 751-764, 2012, doi.org/10.1016/j.eswa.2011.07.068
- [27] A. Cabrera, W. C. Collins, and J. F. Salgado, "Determinants of individual engagement in knowledge sharing," The International Journal of Human Resource Management, vol. 17, no. 2, pp. 245-264, 2006, doi.org/10.1080/09585190500404614
- [28] D. R. Compeau and C. A. Higgins, "Application of social cognitive theory to training for computer skills," *Information systems research*, vol. 6, no. 2, pp. 118-143, 1995, doi.org/10.1287/isre.6.2.118
- [29] R. M. Ryan, M. F. Lynch, M. Vansteenkiste, and E. L. Deci, "Motivation and autonomy in counseling, psychotherapy, and behavior change: A look at theory and practice 1ψ7," The Counseling Psychologist, vol. 39, no. 2, pp. 193-260, 2011, doi.org/10.1177/0011000009359313

- [30] W.-T. Wang and Y.-P. Hou, "Motivations of employees' knowledge sharing behaviors: A self-determination perspective," Information and Organization, vol. 25, no. 1, pp. 1-26, 2015, doi.org/10.1016/j.infoandorg.2014.11.001
- [31] G.-W. Bock, R. W. Zmud, Y.-G. Kim, and J.-N. Lee, "Behavioral intention formation in knowledge sharing: Examining the roles of extrinsic motivators, social-psychological forces, and organizational climate," *MIS quarterly*, pp. 87-111, 2005, doi.org/10.2307/25148669
- [32] H. H. Chang and S.-S. Chuang, "Social capital and individual motivations on knowledge sharing: Participant involvement as a moderator," Information & management, vol. 48, no. 1, pp. 9-18, 2011, doi.org/10.1016/j.im.2010.11.001
- [33] J. Lampel and A. Bhalla, "The role of status seeking in online communities: Giving the gift of experience," Journal of Computer-Mediated Communication, vol. 12, no. 2, pp. 434-455, 2007, doi.org/10.1111/j.1083-6101.2007.00332.x
- [34] E. L. Deci and R. M. Ryan, "Self-determination theory: A macrotheory of human motivation, development, and health," Canadian psychology/Psychologie canadienne, vol. 49, no. 3, p. 182, 2008, doi.org/10.1037/a0012801
- [35] R. M. Ryan and E. L. Deci, "Intrinsic and extrinsic motivations: Classic definitions and new directions," *Contemporary educational psychology*, vol. 25, no. 1, pp. 54-67, 2000, doi.org/10.1006/ceps.1999.1020
- [36] A. Chennamaneni, J. T. Teng, and M. Raja, "A unified model of knowledge sharing behaviours: theoretical development and empirical test," Behaviour & Information Technology, vol. 31, no. 11, pp. 1097-1115, 2012, doi.org/10.1080/0144929X.2011.624637
- [37] M. M. Wasko and S. Faraj, "Why should I share? Examining social capital and knowledge contribution in electronic networks of practice," *MIS quarterly*, vol. 29, no. 1, pp. 35-57, 2005, doi.org/10.2307/25148667
- [38] S. Ba, J. Stallaert, and A. B. Whinston, "Research commentary: introducing a third dimension in information systems design—the case for incentive alignment," Information systems research, vol. 12, no. 3, pp. 225-239, 2001, doi.org/10.1287/isre.12.3.225.9712
- [39] J. Lampel and A. Bhalla, "The role of status seeking in online communities: Giving the gift of experience," *Journal of computer-mediated communication*, vol. 12, no. 2, pp. 434-455, 2007, doi.org/10.1111/j.1083-6101.2007.00332.x
- [40] S. Jeon, Y.-G. Kim, and J. Koh, "An integrative model for knowledge sharing in communities-of-practice," *Journal of knowledge management*, vol. 15, no. 2, pp. 251-269, 2011, doi.org/10.1108/13673271111119682
- [41] A. Ismail Al-Alawi, N. Yousif Al-Marzooqi, and Y. Fraidoon Mohammed, "Organizational culture and knowledge sharing: critical success factors," Journal of knowledge management, vol. 11, no. 2, pp. 22-42, 2007, doi.org/10.1108/13673270710738898
- [42] I. Seba, J. Rowley, and S. Lambert, "Factors affecting attitudes and intentions towards knowledge sharing in the Dubai Police Force," International Journal of Information Management, vol. 32, no. 4, pp. 372-380, 2012, doi.org/10.1016/j.ijinfomgt.2011.12.003
- [43] P. M. Leonardi, "Social media, knowledge sharing, and innovation: Toward a theory of communication visibility," *Information systems research*, vol. 25, no. 4, pp. 796-816, 2014, doi.org/10.1287/isre.2014.0536
- [44] Y. A. Ahmed, M. N. Ahmad, N. Ahmad, and N. H. Zakaria, "Social media for knowledge-sharing: A systematic literature review," Telematics and informatics, vol. 37, pp. 72-112, 2019, doi.org/10.1016/j.tele.2018.01.015
- [45] K.-Y. Kwahk and D.-H. Park, "The effects of network sharing on knowledge-sharing activities and job performance in enterprise social media environments," Computers in Human Behavior, vol. 55, pp. 826-839, 2016, doi.org/10.1016/j.chb.2015.09.044
- [46] J. L. Gibbs, N. A. Rozaidi, and J. Eisenberg, "Overcoming the "ideology of openness": Probing the affordances of social media for organizational knowledge sharing," Journal of Computer-Mediated Communication, vol. 19, no. 1, pp. 102-120, 2013, doi.org/10.1111/jcc4.12034
- [47] S. Kwayu, M. Abubakre, and B. Lal, "The influence of informal social media practices on knowledge sharing and work processes within organizations," International Journal of Information Management, vol. 58, p. 102280, 2021, doi.org/10.1016/j.ijinfomgt.2020.102280
- [48] Y. Sun, X. Zhou, A. Jeyaraj, R.-A. Shang, and F. Hu, "The impact of enterprise social media platforms on knowledge sharing: An affordance lens perspective," *Journal of Enterprise Information Management*, 2019, doi.org/10.1108/JEIM-10-2018-0232
- [49] V. Vuori and J. Okkonen, "Knowledge sharing motivational factors of using an intra-organizational social media platform," Journal of knowledge management, 2012, doi.org/10.1108/13673271211246167

- [50] S. Chatterjee, N. P. Rana, and Y. K. Dwivedi, "Social media as a tool of knowledge sharing in academia: an empirical study using valance, instrumentality and expectancy (VIE) approach," Journal of Knowledge Management, 2020, doi.org/10.1108/JKM-04-2020-0252
- [51] S. Ghazali, N. I. S. Sulaiman, N. Z. Zabidi, M. F. Omar, and R. A. Alias, "The impact of knowledge sharing through social media among academia," in *AIP Conference Proceedings*, 2016, vol. 1782, no. 1: AIP Publishing LLC, p. 030003, doi.org/10.1063/1.4966060
- [52] M. I. Rasheed, M. J. Malik, A. H. Pitafi, J. Iqbal, M. K. Anser, and M. Abbas, "Usage of social media, student engagement, and creativity: The role of knowledge sharing behavior and cyberbullying," Computers & Education, vol. 159, p. 104002, 2020, doi.org/10.1016/j.compedu.2020.104002
- [53] Y. Huang, C. Basu, and M. K. Hsu, "Exploring motivations of travel knowledge sharing on social network sites: an empirical investigation of US college students," Journal of hospitality marketing & management, vol. 19, no. 7, pp. 717-734, 2010, doi.org/10.1080/19368623.2010.508002
- [54] P. Nielsen and L. Razmerita, "Motivation and knowledge sharing through social media within Danish organizations," in *International working conference on transfer and diffusion of it*, 2014: Springer, pp. 197-213, doi.org/10.1007/978-3-662-43459-8_13
- [55] H. Rode, "To share or not to share: the effects of extrinsic and intrinsic motivations on knowledge-sharing in enterprise social media platforms," Journal of Information Technology, vol. 31, no. 2, pp. 152-165, 2016, doi.org/10.1057/jit.2016.8
- [56] E. Goffman, The Presentation of Self in Everyday Life. Garden City, NY: Anchor, 1959.
- [57] M. R. Leary, Self-presentation: Impression management and interpersonal behavior. Westview Press, 1996.
- [58] L. Bareket-Bojmel, S. Moran, and G. Shahar, "Strategic self-presentation on Facebook: Personal motives and audience response to online behavior," Computers in Human Behavior, vol. 55, pp. 788-795, 2016, doi.org/10.1016/j.chb.2015.10.033
- [59] N. C. Krämer and S. Winter, "Impression management 2.0: The relationship of self-esteem, extraversion, self-efficacy, and self-presentation within social networking sites," Journal of media psychology, vol. 20, no. 3, pp. 106-116, 2008, doi.org/10.1027/1864-1105.20.3.106
- [60] A. Siibak, "Constructing the self through the photo selection-visual impression management on social networking websites," Cyberpsychology: Journal of psychosocial research on cyberspace, vol. 3, no. 1, 2009.
- [61] M. R. Leary and R. M. Kowalski, "Impression management: A literature review and two-component model," Psychological bulletin, vol. 107, no. 1, p. 34, 1990, doi.org/10.1037/0033-2909.107.1.34
- [62] S. Y. Lee and K. Jang, "Antecedents of impression management motivations on social network sites and their link to social anxiety," *Media Psychology*, pp. 1-15, 2019, doi.org/10.1080/15213269.2019.1580588
- [63] B. R. Schlenker and M. R. Leary, "Social anxiety and self-presentation: A conceptualization model," *Psychological bulletin*, vol. 92, no. 3, p. 641, 1982, doi.org/10.1037/0033-2909.92.3.641
- [64] J. Kim, R. LaRose, and W. Peng, "Loneliness as the cause and the effect of problematic Internet use: The relationship between Internet use and psychological well-being," Cyberpsychology & behavior, vol. 12, no. 4, pp. 451-455, 2009, /doi.org/10.1089/cpb.2008.0327
- [65] A. M. Shaw, K. R. Timpano, T. B. Tran, and J. Joormann, "Correlates of Facebook usage patterns: The relationship between passive Facebook use, social anxiety symptoms, and brooding," Computers in Human Behavior, vol. 48, pp. 575-580, 2015, doi.org/10.1016/j.chb.2015.02.003
- [66] S. M. Turner, D. C. Beidel, and K. T. Larkin, "Situational determinants of social anxiety in clinic and nonclinic samples: Physiological and cognitive correlates," Journal of consulting and clinical psychology, vol. 54, no. 4, p. 523, 1986, doi.org/10.1037/0022-006X.54.4.523
- [67] K. C. Fernandez, C. A. Levinson, and T. L. Rodebaugh, "Profiling: Predicting social anxiety from Facebook profiles," Social Psychological and Personality Science, vol. 3, no. 6, pp. 706-713, 2012, doi.org/10.1177/1948550611434967
- [68] A. C. Weidman and C. A. Levinson, "I'm still socially anxious online: Offline relationship impairment characterizing social anxiety manifests and is accurately perceived in online social networking profiles," *Computers in Human Behavior*, vol. 49, pp. 12-19, 2015, doi.org/10.1016/j.chb.2014.12.045
- [69] D. Watson and R. Friend, "Measurement of social-evaluative anxiety," Journal of consulting and clinical psychology, vol. 33, no. 4, p. 448, 1969, doi.org/10.1037/h0027806
- [70] R. M. Rapee and R. G. Heimberg, "A cognitive-behavioral model of anxiety in social phobia," Behaviour research and therapy, vol. 35, no. 8, pp. 741-756, 1997, doi.org/10.1016/S0005-7967(97)00022-3

- [71] S. Kamalou, K. Shaughnessy, and D. A. Moscovitch, "Social anxiety in the digital age: The measurement and sequelae of online safety-seeking," Computers in Human Behavior, vol. 90, pp. 10-17, 2019, doi.org/10.1016/j.chb.2018.08.023
- [72] J. A. Keaten and L. Kelly, ""Re: We really need to talk": Affect for communication channels, competence, and fear of negative evaluation," Communication Quarterly, vol. 56, no. 4, pp. 407-426, 2008, doi.org/10.1080/01463370802451646
- [73] L. Kelly, J. A. Keaten, and D. Millette, "Seeking safer spaces: The mitigating impact of young adults' Facebook and Instagram audience expectations and posting type on fear of negative evaluation," *Computers in Human Behavior*, vol. 109, p. 106333, 2020, doi.org/10.1016/j.chb.2020.106333
- [74] A. Kankanhalli, B. C. Tan, and K.-K. Wei, "Contributing knowledge to electronic knowledge repositories: An empirical investigation," *MIS quarterly*, vol. 29, no. 1, 2005, doi.org/10.2307/25148670
- [75] N. Park and S. Lee, "College students' motivations for Facebook use and psychological outcomes," *Journal of Broadcasting & Electronic Media*, vol. 58, no. 4, pp. 601-620, 2014, doi.org/10.1080/08838151.2014.966355



© 2022 by the authors. Copyrights of all published papers are owned by the IJOC. They also follow the Creative Commons Attribution License (https://creativecommons.org/licenses/by-nc/4.0/) which permits unrestricted non-commercial use, distribution, and reproduction in any medium, provided the original work is properly cited.