

## Do You See Harm in Your Social Media Influencer Engagement? The Mechanism of Perceived Threat

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### Abstract

*In the era of excessive social media usage, users' coping responses are shaped by their assessment of potential harm, known as perceived threat. This study explores the mechanism underlying perceived threat in followers' engagement with social media influencers. Based on the stimulus-organism-response framework, we examine the relationships between followers' following and interaction comprehensiveness, their cognitive and affective engagement, and perceived threat, with the moderation of influencers' intimate disclosure. Findings from a survey of 250 followers indicate that following comprehensiveness increases obsession and emotional attachment related to influencer engagement, while the effect of interaction comprehensiveness is insignificant. Obsession positively influences perceived threat, which is negatively moderated by influencers' intimate disclosure. These results highlight the importance of following (rather than interaction) comprehensiveness and the cognitive (rather than emotional) facet in followers' threat assessment. The study contributes valuable insights for users, influencers, marketers, and researchers, in fostering healthy engagement practices on social media.*

**Keywords:** social media influencers, problematic engagement, perceived threat, intimate disclosure, Instagram

### 1. Introduction

In the era of social media dominance, social media influencers have emerged as a potent social force, exerting significant influence over the attitudes and behaviors of billions of followers (Wies et al., 2023). Social media influencers are social media users who have gained significant attention through their engaging content and are followed by a noteworthy number of other users (Harrigan et al., 2021).

Following and engaging with social media influencers is pervasive. Due to their interesting content, frequent updates, and large, interactive follower groups, followers can easily become attached, leading to excessive and problematic engagement with influencers (Farivar et al., 2022a). Problematic engagement can seriously damage users' well-being and result in self- and others-harming outcomes (de Bérail et al., 2019; Reimann & Jain, 2021).

Dealing with problematic engagement primarily relies on followers' self-regulation (Witkiewitz et al., 2022), a process that begins with followers' assessment of harm, or perceived threat, in influencer engagement. Perceived threat is a critical concept in the information systems (IS) literature concerning problematic IS use. Several theoretical frameworks, such as coping theory (Gaudioso et al., 2017; Lazarus, 1966), protection motivation theory (Vance et al., 2012), and information security models (Moody et al., 2018), emphasize the significance of threat appraisal as the initial step. Individuals who perceive a higher threat in influencer engagement or IS usage are more likely to take actions to mitigate or manage the threat.

However, despite its significance, the formation of perceived threat is underexplored. The IS literature on problematic use has largely focused on the post-process of perceived threat, i.e., the coping and reacting process (Gaudioso et al., 2017; Moody et al., 2018) after users' perception of threat. In contrast, the understanding of the precedents of threat perception is rather coarse, limiting to descriptions such as stressors and environmental factors (Vance et al., 2012; Moody et al., 2018). Little attention has been given to systematically examining the mechanism underlying perceived threat. Furthermore, as social media influencers are a recent phenomenon and problematic engagement is an emerging topic in influencer research, to the best of our knowledge, no studies have investigated perceived threat in influencer engagement.

To develop an understanding of threat perception, this research investigates the mechanism underlying followers' assessment of harm in influencer engagement. To establish a connection between follower behavior and their perception of threat, we adopt the overarching framework of stimulus-organism-response (S-O-R) theory to propose and examine the relationships between followers' following and interaction comprehensiveness, their cognitive engagement (obsession), affective engagement (emotional attachment), and perceived threat. Additionally, drawing from the social penetration theory, we examine the role of influencers' intimate disclosure as a moderator on the effects of obsession and emotional attachment on perceived threat in influencer engagement.

Results from a survey conducted among 250 followers of social media influencers reveal that followers' following comprehensiveness positively influences both the cognitive and affective aspects of problematic engagement, suggesting that the breadth of usage (interests in following influencers) plays a critical role in shaping the degree of problematic engagement. Surprisingly, however, interaction comprehensiveness did not exhibit any significant impact on problematic engagement, indicating that the ways followers interact with influencers may not necessarily contribute to problematic engagement. Moreover, our results reveal that only obsession, i.e., the cognitive aspect of problematic engagement, significantly predicts followers' perceived threat. The effect of emotional attachment on followers' perception of threat is not significant. Additionally, intimate disclosure by influencers negatively moderates the impact of obsession on perceived threat, suggesting that influencers' intimate disclosure can hinder followers' assessment of harm in their problematic engagement.

This paper contributes to the burgeoning field of social media influencer research. It develops the understanding of the mechanism of perceived threat, which is essential to the study of social media well-being (Vance et al., 2012; Moody et al., 2018). The findings offer valuable insights into the literature on social media overuse. It underscores the role of following comprehensiveness, rather than interaction comprehensiveness, in driving problematic engagement and highlights the importance of cognition (i.e., obsession) rather than emotion on followers' perception of threat. The moderating effect of intimate disclosure on this relationship offers a valuable understanding of the complex nature of problematic engagement. These insights can guide users, influencers, marketers, and social media

platforms in fostering healthy and responsible engagement practices on social media consequences.

## 2. Background

### 2.1. Social media influencers

Social media influencers have become a prominent phenomenon in recent years. They are social media users who have amassed substantial followings and wield considerable influence over their audiences (Farivar et al., 2021). Social media influencers are now recognized as powerful drivers of consumer behavior, brand endorsements, and cultural trends (Wies et al., 2023). As influencer marketing continues to evolve, existing literature has actively explored ways to enhance influencer effectiveness and improve follower engagement. Studies have identified various key factors for influencer effectiveness, including influencers' characteristics (e.g., attractiveness and opinion leadership), post features (e.g., novelty, originality, and informativeness), and followers' attributes (e.g., parasocial relationship and social identification) (Breves et al., 2019; Casaló et al., 2020; Farivar & Wang, 2022; Farivar et al., 2023).

Along with the growing impact of social media influencers, there is a growing recognition of the potential drawbacks associated with engaging with these influencers (Farivar et al., 2022a). The relentless focus on increasing follower engagement can result in problematic engagement. Several studies have expressed concerns and identified key factors contributing to followers' problematic engagement with social media influencers (e.g., de Bérail et al., 2019; Farivar et al., 2022a, 2022b). For instance, de Bérail et al. (2019) suggest that the audience of YouTube influencers may develop social anxiety and addiction. Similarly, Farivar et al. (2022a) report that followers of Instagram influencers develop both bond- and identity-based attachments to influencers, which can result in problematic engagement.

Recognizing the growing concern surrounding problematic engagement with social media influencers, recent research has emerged to investigate how followers assess and respond to influencer engagement (Farivar et al., 2022b). Building upon the IS literature on technology addiction and problematic use (Gaudio et al., 2017; Islam et al., 2022), this research adopts coping theory, which suggests the significant role of perceived threat in followers' responses and coping mechanisms during their engagement with influencers (Farivar et al., 2022b). Followers who perceive their influencer engagement as harmful are more likely to employ coping responses. Consequently, understanding the

mechanism and antecedents of perceived threat is important. However, to the best of our knowledge, no studies have examined the mechanism of perceived threat in relation to followers' following and interaction behavior with influencers.

## 2.2. Stimulus-organism-response theory

We follow S-O-R theory to develop our research model on the perceived threat of followers in influencer engagement. The S-O-R theory, originally developed in environmental psychology (Mehrabian & Russell, 1974), is a widely recognized and comprehensive framework for understanding individuals' responses to stimuli. These stimuli may encompass environmental, informational, social, psychological, and behavioral cues (Hou et al., 2023; Xu et al., 2020). The theory emphasizes the influence of stimuli on individuals' responses through internal psychological processes such as cognition and affect (Hou et al., 2023). As an overarching model, it has been applied to study how individuals perceive, interpret, and respond to stimuli in various business contexts, including consumer behavior, social interactions, and online behavior (Fei et al., 2021; Hou et al., 2023; Xu et al., 2020).

In IS research, the S-O-R model has been extensively employed in theorizing and understanding user behavior such as adoption, usage, and purchase intentions in a wide range of situations (Huang, 2016; Lin et al., 2020; Luqman et al., 2017). Particularly relevant to the context of this study, the S-O-R model has provided guidance for examining user behavior on social networking sites (SNS) (e.g., Huang, 2016; Luqman et al., 2017; Zhang et al., 2014), including those related to problematic SNS usage (Cao & Sun, 2018; Luqman et al., 2017; Lin et al., 2020). For example, Cao and Sun (2018) apply the S-O-R model to investigate the impact of information, communication, and social overloads on users' discontinuance intention of social media through the mediation of psychological states of exhaustion and regret. Similarly, Lin et al. (2020) use the S-O-R model to explore the effect of overload on discontinuance intention, suggesting that flow experience can mitigate the effect. In line with these prior studies on SNS usage, we adopt the S-O-R model as the overarching framework for this research.

## 3. Research model and hypotheses

Following the S-O-R framework, we posit the usage scope of followers on social media, including their following comprehensiveness and interaction comprehensiveness, shape their psychological states

of problematic engagement, including obsession and emotional attachment associated with influencers, which in turn affect their perception of threat in influencer engagement. Figure 1 shows our research framework.

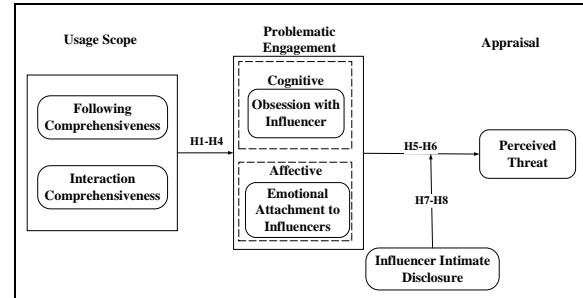


Figure 1. Research framework.

### 3.1. Followers' usage scope and problematic engagement

Usage comprehensiveness, or usage scope, refers to the breadth of functions for which an IS is utilized (Barnes & Böhringer, 2011; Mirkovski et al., 2018). Prior IS research has highlighted the significance of usage comprehensiveness in predicting user attitudes and behavioral intentions. Usage comprehensiveness affects users' habit formation and their interest in continuing the usage (Barnes & Böhringer, 2011; Limayem et al., 2007; Mirkovski et al., 2018). In the context of social media influencers, followers' usage comprehensiveness plays a crucial role in shaping their engagement with influencers (Farivar et al., 2022a).

This study examines two aspects of usage comprehensiveness of social media followers: following comprehensiveness and interaction comprehensiveness. Following comprehensiveness refers to the extent to which followers serve diverse interests in following influencers, including seeking entertainment, gaining inspiration, or obtaining product recommendations. Interaction comprehensiveness, on the other hand, encompasses the various ways in which followers interact with influencers, such as liking posts, leaving comments, sharing content, or sending private messages (Farivar et al., 2022a).

The IS literature on problematic engagement depicts two important facets of problematic engagement—cognitive and affective preoccupation (Turel & Qahri-Saremi, 2016). Cognitive and affective preoccupations refer to obsession or persistent thoughts and emotions about a subject or behavior, respectively (Fillmore, 2001; Jones et al., 2003). In the context of influencer engagement, followers'

obsession with influencer engagement, i.e., the cognitive facet of problematic engagement, indicates an intense preoccupation and fixation of followers on an influencer's activities, content, and persona. On the other hand, the affective facet of problematic engagement reflects followers' emotional attachment to influencer engagements.

In the context of social media influencer engagement, we propose and study the relationship between follower's usage scope, including following comprehensiveness and interaction comprehensiveness, on their psychological states of problematic engagement, i.e., obsession and emotional attachment with influencer engagement.

First, we argue that following comprehensiveness would increase the likelihood of followers' obsession with influencer engagement. Uses and gratification theory suggests that individuals actively choose and engage with media content to satisfy specific needs and gratifications (Katz et al., 1974). Followers have varied needs and gratifications in their following influencers. Some may follow for information; others may have multiple interests to fulfill, such as information, entertainment, and social connections. Followers with multiple interests in following influencers are likely to have higher involvement and attachment to the influencers' content and persona. This increased exposure and investment in following influencers may contribute to a heightened sense of preoccupation and fixation (Zajonc, 1968), leading to a higher level of cognitive engagement, or obsession.

Meanwhile, following comprehensiveness may increase followers' emotional attachment to influencer engagement. With broader purposes in following, followers may consistently find interesting and pleasant content on social media. The more followers receive various uses and gratifications from following, the more they may feel a sense of enjoyment and satisfaction in their engagement with the influencer. The abundance of uses and gratifications in following can create a perception of a virtual world, serving as an escape or a pleasant distraction from the challenges and issues individuals encounter in the physical world. Hence, we propose:

**H1:** Following comprehensiveness increases followers' obsession with influencers on social media.

**H2:** Following comprehensiveness increases followers' emotional attachment to influencers on social media.

Interaction comprehensiveness may also increase followers' obsession with and emotional attachment to influencers. Interaction comprehensiveness reflects the active participation and interaction of followers with influencers through various forms, such as liking, commenting, or sharing their content. The more

extensively followers engage with influencers, the greater their involvement and investment in the influencer-follower relationship. This heightened engagement can foster a sense of attachment and preoccupation, thereby increasing followers' obsession with the influencer. Similarly, interaction comprehensiveness may increase followers' emotional attachment to influencers. Followers who extensively interact with influencers through various activities are likely to be more exposed to content that can evoke emotional attachment. Repeated exposure to influencer-related content and interactions may reinforce emotional attachment and the urge to check influencers' accounts. Therefore, it is expected that a higher level of interaction comprehensiveness would be positively related to followers' affective problematic engagement with influencers. Hence, we propose:

**H3:** Interaction comprehensiveness increases followers' obsession with influencers on social media.

**H4:** Interaction comprehensiveness increases followers' emotional attachment to influencers on social media.

### **3.2. Problematic engagement and perceived threat**

Problematic engagement with influencers can influence followers' perception of threat in influencer engagement. When followers develop an obsession with influencers, they may perceive their engagement as more threatening or harmful. Obsession involves an excessive and uncontrollable focus on influencers, which can lead to negative consequences and potential risks for followers. Drawing from the cognitive appraisal theory (Lazarus, 1966), followers who experience obsession with influencers may interpret their engagement as a source of potential harm, including negative impacts on mental health, self-esteem, and overall well-being. This perception of threat may stem from concerns about excessive time and attention devoted to influencers, potential loss of autonomy or control, and the displacement of important real-life activities and relationships. Consequently, followers with higher levels of obsession with influencers may also perceive a greater threat associated with their influencer engagement. Hence, we propose:

**H5:** Obsession with social media influencers increases followers' perceived threat in influencer engagement.

Similarly, emotional attachment to influencers may increase followers' perceived threat in influencer engagement. Followers' emotional attachment to influencers can serve as important signals that shape

their perceptions of the engagement itself. The affect-as-information theory (Clore, 1992; Schwarz & Clore, 1988) suggests that individuals tend to rely on their emotions as valuable sources of information when evaluating a situation or making judgments. In the case of influencer engagement, followers may interpret their emotional attachment as a sign that their engagement with influencers is threatening or potentially detrimental to themselves. Hence, we propose:

**H6:** Emotional attachment to social media influencers increases followers' perceived threat in influencer engagement.

### 3.3. Moderation of influencers' intimate disclosure

Intimate disclosure is a key concept in social penetration theory (Altman & Taylor, 1973) which suggests that sharing emotions and experiences is critical in building a deeper understanding and trust in social interactions. Recently, the concept of intimate disclosure has gained significant attention in the realm of computer-mediated communication (Jiang et al., 2010). Researchers have explored intimate disclosure in virtual environments (Bazarova & Choi, 2014; Jiang et al., 2010; Lin & Utz, 2017; Qiu et al., 2012) and individuals' reactions to disclosure by popular media personas, such as celebrities (Chung & Cho, 2017; Kim & Kim, 2020; Kim & Song, 2016), as well as social media influencers (Ferchaud et al., 2018; Leite & Baptista, 2022a, 2022b).

In the social media context, influencers' intimate disclosure refers to the extent to which influencers share personal and private information with their followers through their social media accounts (Leite et al., 2022). Influencers who engage in intimate disclosure often reveal personal aspects of their lives, disclosing personal experiences, romantic relationships, personal habits, and even their life history (Leite et al., 2022; Leite & Baptista, 2022a). These disclosures create a sense of intimacy and connection between the influencers and their followers, allowing followers to feel a deeper connection and a sense of familiarity with the influencers (Zhang & Mac, 2023). Through intimate disclosures, influencers have the ability to establish a connection between their realities and those of their followers, leading to perceptions of humanization and approachability (Hosek & Presley, 2018). Consequently, influencers' intimate disclosure can positively influence followers' trust in the influencers, foster parasocial relationships with influencers, and enhance their perceived credibility among followers (Leite & Baptista 2022a).

Influencers' intimate disclosure may negatively moderate the relationship between problematic engagement with influencers and perceived threat. According to social penetration theory (Altman & Taylor, 1973), as individuals disclose more intimate information, their relationship with others becomes deeper and more meaningful. In the context of followers' problematic engagement with influencers, the presence of intimate disclosure may act as a buffering mechanism. Intimate disclosure can mitigate the perceived threat associated with problematic engagement by fostering feelings of trust, empathy, and a sense of shared experiences. Followers who are obsessed with influencers and have developed emotional attachments may view the intimate disclosure as an indication of a more genuine and authentic connection, resulting in a weakened assessment of potential harm with influencer engagement. Hence, we propose:

**H7:** Influencers' intimate disclosure negatively moderates the relationship between obsession with influencers and perceived threat in influencer engagement on social media.

**H8:** Influencers' intimate disclosure negatively moderates the relationship between emotional attachment to influencers and perceived threat in influencer engagement on social media.

## 4. Methodology

To test the model and proposed hypotheses, we conducted an online survey. Table 1 provides all measurement items, which are adopted from well-established scales in the literature. To assess the clarity and reliability of measurement items, a pilot study with 50 Instagram users who were following social media influencers was conducted. After ensuring the clarity and reliability of the measures, we collected data using the questionnaire. Respondents of the survey are Instagram users who were following social media influencers. The reason for focusing on Instagram is that Instagram is the major platform for influencer marketing (Omnicores, 2023).

**Table 1. Measurement items**

Constructs	Items	Reference
Following comprehensiveness (FC)	<p>What are your primary reasons for checking the influencers' accounts? Select all that apply:</p> <ul style="list-style-type: none"> <li>• Enjoyment/fun.</li> <li>• Updating yourself on new things.</li> <li>• Receiving product information for shopping.</li> <li>• Getting to know the influencer's life.</li> </ul>	Limayem et al., 2007

	<ul style="list-style-type: none"> <li>• Communication with the influencer.</li> <li>• Other (please specify).</li> </ul>	
Interaction comprehensiveness (IC)	<p>Over the past few weeks, have you done any of the following activities? Select all that apply:</p> <ul style="list-style-type: none"> <li>• Wrote comment on influencers' posts.</li> <li>• Sent private message to influencers.</li> <li>• Liked influencers' posts.</li> <li>• Watched influencers' lives.</li> <li>• Shared influencers' posts with my followers.</li> <li>• Other (please specify).</li> <li>• None (I had no interaction).</li> </ul>	Limayem et al., 2007
Obsession with influencers (OI)	<p>Reflecting on your experience with the influencers you are following, how often. . .</p> <ul style="list-style-type: none"> <li>• Do you find yourself unable to stop thinking about checking influencers accounts?</li> <li>• Is it hard to distract yourself from thinking about influencers?</li> <li>• Do thoughts about checking influencers intrude into your daily activities?</li> </ul>	Collins & Lapp, 1992
Emotional attachment to influencers (EA)	<p>Reflecting on your experience with the influencers you are following, how often. . .</p> <ul style="list-style-type: none"> <li>• When you feel anxious, you crave to check influencers accounts?</li> <li>• When you feel lonely, do you feel an urge to check influencers accounts?</li> <li>• Do you ever feel so nervous that you really need to check influencers account?</li> </ul>	Collins & Lapp, 1992
Influencers' intimate disclosure (ID)	<p>In their Instagram account, these influencers...</p> <ul style="list-style-type: none"> <li>• share their personal feelings.</li> <li>• share their desires.</li> <li>• talk about their moods.</li> <li>• share their thoughts.</li> <li>• share their beliefs.</li> <li>• often disclose personal things about themselves.</li> <li>• talk about their romantic partners. *</li> <li>• talk about personal habits.</li> <li>• talk about personal life history.</li> </ul>	Leite & Baptista, 2022a
Perceived threat of problematic engagement (PT)	<p>To what extent do you agree with the following statements:</p> <ul style="list-style-type: none"> <li>• Continuing this level of engagement with influencers would cause negative impacts on me.</li> <li>• Continuing the engagement with influencers in this current way imposes a threat to me.</li> <li>• It is highly likely that my engagement with influencers impacts me negatively.</li> </ul>	Johnston et al., 2015

\* Dropped from analysis (low loading in the pilot study)

The online survey was distributed to a North American panel of a reputable research firm. Several screening questions were included to ensure participants are over 18 years old, have an active Instagram profile, and follow social media influencers. In addition, the survey incorporates attention-check questions for the purpose of response quality checks. A total of 300 responses were collected. After screening out incomplete and inattentive respondents, 230 valid responses are retained for data analysis. Table 2 shows the demographics of the sample.

**Table 2. Characteristics of the sample (n=230)**

Characteristics	Number
<b>Gender</b>	
Male	121
Female	127
Other	1
<b>Age</b>	
18-24	32
25-34	81
35-44	80
45-54	31
55-64	5
Over 64	1
<b>Length of using Instagram</b>	
Less than a month	1
Less than six months	2
Less than a year	16
1-2 years	49
More than 2 years	162

## 5. Results

We used the partial least square method with SmartPLS 4.0 for the data analysis (Ringle et al., 2022). First, the measurement model was evaluated to test the reliability and convergent and discriminant validities of the model. Table 3 shows that all Cronbach's alpha values are higher than 0.7 and the average variance extracted values are higher than 0.5. The square roots of AVEs are higher than the corresponding correlations. We also checked the heterotrait-monotrait ratio of correlations; all values are below the threshold of 0.9 (Henseler et al., 2015). These indicate satisfactory convergent and discriminant validities of the measurement model.

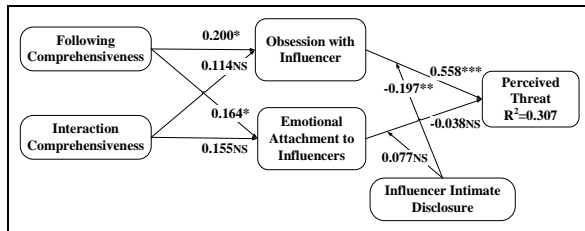
To evaluate the common method bias, we conducted a full collinearity examination (Kock, 2015). Results show that the variance inflation factors (VIF) are below the threshold of 3.30. Furthermore, we followed Herman's single-factor approach to further assess the common method bias. Results show that one factor accounts for 33 percent of the variance. Hence, we can conclude that the presence of common method bias is unlikely. Then, we evaluated the

structural model via bootstrapping with 5,000 resamples. Figure 2 shows the results.

**Table 3. Reliability and discriminant validity**

Constructs	$\alpha$	CR	AVE	1.	2.	3.	4.	5.	6.
1.FC	NA	NA	NA						
2. IC	NA	NA	NA	0.61					
3. OI	0.92	0.91	0.86	0.28	0.26	<b>0.93</b>			
4. EA	0.86	0.86	0.78	0.26	0.27	0.70	<b>0.88</b>		
5. ID	0.92	0.78	0.58	0.23	0.13	0.20	0.20	<b>0.76</b>	
6. PT	0.89	0.88	0.82	0.02	0.11	0.45	0.32	-0.2	<b>0.90</b>

FC: following comprehensiveness; IC: interaction comprehensiveness; OI: obsession with influencer; EA: emotional attachment to influencers; ID: influencer intimate disclosure; PT: perceived threat



**Figure 2. Structural Model Results (n=230)**

\*\*\*  $p < 0.001$ ; \*\*  $p < 0.01$ ; \*  $p < 0.05$ ; NS not significant

As shown in Figure 2, following comprehensiveness significantly increases both obsession with and emotional attachment to influencers. H1 and H2 are supported. However, the impact of interaction comprehensiveness is not significant on either obsession or emotional attachment. H3 and H4 are not supported. Interestingly, only obsession with influencers (i.e., the cognitive aspect of problematic engagement) increases perceived threat, while emotional attachment (i.e., the affective aspect of problematic engagement) does not have a significant impact on perceived threat. H5 is supported and H6 is not supported. The moderation of influencers' intimate disclosure is significant for the relationship between obsession and perceived threat. H7 is supported; H8 is not supported.

## 6. Discussion

This research examines the mechanism of perceived threat in social media influencer engagement. To explain followers' perception of threat, it follows the S-O-R framework. It identifies two aspects in followers' usage scope- following comprehensiveness and interaction comprehensiveness, and links them to the cognitive and affective components of problematic engagement, i.e., the obsession with and emotional attachment to influencers, which in turn link to followers' perceived threat in influencer engagement. It further explores the

moderating impact of influencers' intimate disclosure on the relationship between followers' problematic engagement (obsession and emotional attachment) and perceived threat.

Our findings reveal a significant, positive relationship between following comprehensiveness and both cognitive and affective components of problematic engagement. This suggests that followers who possess a wide range of interests in following influencers, such as the pursuit of inspiration, entertainment, or identification, are more prone to experiencing cognitive obsession with and emotional attachment to influencers. In contrast, our study does not find a significant relationship between interaction comprehensiveness and either cognitive or affective problematic engagement. This unexpected result suggests that the ways followers interact with influencers may not play a significant role in fostering problematic engagement. These findings contribute to the existing body of research on engagement with influencers and deepen our comprehension of the formation of cognitive and affective components of problematic engagement.

In addition, our findings indicate that only obsession, i.e., the cognitive component of problematic engagement, positively affects perceived threat of influencer engagement. This implies that followers who exhibit cognitive obsession with influencers perceive a higher level of threat regarding their influencer engagement. This finding underscores the potential negative consequences of cognitive fixation on influencers and highlights the need for interventions and support for individuals experiencing problematic engagement.

Moreover, our examination on the moderating role of influencers' intimate disclosure reveals that intimate disclosure by influencers negatively moderates this relationship between obsession and perceived threat. Followers of influencers who share more private and intimate information are less likely to perceive their obsession as threatening. This finding highlights the importance of considering the content and disclosure strategies employed by influencers in shaping followers' perceptions and experiences of problematic engagement.

## 7. Theoretical and practical contributions

This research contributes to the social media influencer literature, particularly the emerging stream on problematic engagement and well-being of social media participants, by investigating the mechanism of perceived threat within the context of influencer engagement. The results highlight the importance of following comprehensiveness, cognitive aspect of

problematic engagement (obsession), and influencer's intimate disclosure in shaping followers' perceived threat, and advance our understanding of the underlying dynamics and consequences of problematic engagement with influencers.

Followers' perception of threat, or the self-assessment of harm in influencer engagement, serves as a catalyst for their coping strategies and responses to problematic engagement. By focusing on perceived threat, this study addresses an important knowledge gap in understanding followers' motivations and coping mechanisms. The proposed research framework in this study provides a comprehensive understanding of the complex interplay between followers' scope of usage in influencer engagement and perceived threat.

Moreover, our study contributes to the existing literature by examining the multidimensional nature of problematic engagement with social media influencers and uncovering the underlying factors that contribute to this phenomenon. Existing studies mainly focus on the positive aspects of following social media influencers (e.g., Breves et al., 2019; Casalo et al., 2020; Farivar & Wang, 2022), and a limited body of literature has stressed the dark side of social media influencers. The problematic engagement with influencers and its various facets has remained largely uninvestigated. This research, by identifying usage scope and distinguishing between cognitive and affective facets of problematic engagement, advances theoretical understanding and provides a nuanced perspective of problematic engagement with influencers.

Additionally, this study uncovers the role of influencers' intimate disclosure in shaping followers' perceptions of their problematic engagement. Findings indicate that followers of influencers who share intimate and private details tend to downplay the perceived threat associated with cognitive engagement (obsession). This finding takes a step further from the current literature, which has primarily suggested the positive consequences of influencers' intimate disclosure such as enhancing perceived credibility and fostering parasocial relationships among followers (Leite & Baptista, 2022a, 2022b), and put forth the potential negative consequences of the practice. This enriches our understanding of the complex dynamics of influencer-follower interactions and stresses the importance of examining social media phenomena from alternative points of view.

The practical implications of this study are twofold. For followers, understanding the role of perceived threat can help them recognize the potential negative consequences of cognitive and affective problematic engagement. By being aware of these

consequences, followers can adopt healthier engagement behaviors, manage their emotional well-being, and make informed decisions regarding their online interactions. For influencers, the findings highlight the significance of creating a supportive and positive engagement environment for their followers. Influencers should be mindful of the potential threat that followers may perceive in their engagement and take steps to alleviate this perception. Influencers can foster trust and reduce cognitive problematic engagement by promoting transparency, authenticity, and balanced engagement practices.

Additionally, social media platforms could develop and provide various measures and tools to both influencers and followers to help build healthy following engagement. For example, followers' usage volume and categories can be tracked and analyzed. Followers with a developing track toward problematic engagement could be warned early so they can proactively manage their engagement. Followers could also be provided with journals or small surveys for them to report their feelings and self-assessment of the engagement behavior. Followers can choose to block certain types of influencer content if they are susceptible to the harms of excessive influencer engagement. By promoting healthy engagement practices, providing support resources, and raising awareness about the potential risks associated with problematic engagement, influencers, followers, and social media platforms can build together a more positive and responsible social media landscape.

## **8. Limitations and future research**

This study has several limitations. First, in investigating the phenomenon of social media influencers and their followers' problematic engagement, this research conducts an empirical study in the context of Instagram. Instagram was selected due to its prominence as a major social media platform with active interactions and engagement between influencers and followers. It has been extensively examined in the influencer marketing literature (Breves et al., 2019; Casalo et al., 2020; Farivar et al., 2021). However, it is important to recognize that influencers also utilize other social networking sites such as YouTube and TikTok, and the different social networking sites present subtle differences in platform features. Future studies can explore the potential impacts of platform differences on follower behavior and problematic engagement. This will not only enable the validation and generalization of the present research findings but also the identification of platform-specific effects in influencer-follower interactions.

To examine the followers' problematic engagement, this research employs a cross-sectional survey. Future research could conduct longitudinal studies to gain insights into followers' behavior over time and gain a deeper understanding of the evolution of followers' problematic engagement. Furthermore, it is essential to recognize that the dark side of social media influencers encompasses various dimensions and involves complex behavioral, social, and psychological factors. This study focuses specifically on followers' problematic engagement. Future research can explore additional issues such as depression and anxiety of followers and study connections between following influencers and the well-being of followers.

## 9. References

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