



Impact of perceived social support on fear of missing out (FoMO): A moderated mediation model

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Abstract

Fear of Missing Out (FoMO) is a pervasive phenomenon among college students that may negatively affect the physical and mental health of individuals. Perceived social support, as one of the effective protective factors, can mitigate the harmful effects of FoMO, but few studies to date have examined the potential mechanisms underlying this relationship. The present study conducted an investigation involving 806 college students in China and used scales measuring perceived social support, basic psychological needs, perceived stress and FoMO to explore the relationship between perceived social support and FoMO. Findings indicated that 1) perceived social support was negatively associated with college students' FoMO; 2) basic psychological needs partially mediated the relationship between perceived social support and FoMO; 3) the mediating role of basic psychological needs is moderated by perceived stress. Further, the study provides some theoretical and practical implications for the prevention of FoMO.

Keywords Perceived social support · Basic psychological needs · Perceived stress · Fear of missing out

Introduction

Fear of missing out (FoMO), also referred to as anxiety of missing out in some studies, involves a fear of missing out on someone's novel experiences (Przybylski, Murayama, DeHaan, & Gladwell, 2013) and can be regarded as a subcategory of anxiety (Chai et al., 2018). The exponential growth of the Internet in recent years and the pervasive use of social media have resulted in the increasing prominence of FoMO (Milyavskaya, Saffran, Hope, & Koestner, 2018) and, equally, its impact on people's physical and mental health has started to gain attention. Previous studies have shown that individuals with high-level FoMO are likely to develop mobile phone and

Internet addictions (Alt & Boniel-Nissim, 2018; Blackwell, Leaman, Tramosch, Osborne, & Liss, 2017; Casale, Rugai, & Fioravanti, 2018; Wolniewicz, Tiamiyu, Weeks, & Elhai, 2018), phubbing behavior (Chotpitayasunondh & Douglas, 2016), poor sleep quality (Adams et al., 2016; Scott & Woods, 2018), narcissism (Błachnio & Przepiórka, 2018) and other maladaptive behaviors. An increase in one's FoMO level is associated with a reduction in the subjective well-being of individuals (Alt, 2016; Dhir, Yossatorn, Kaur, & Chen, 2018; Stead & Bibby, 2017). Many factors influence FoMO, including situational factors like stress or social support (Przybylski et al., 2013; Wegmann, Oberst, Stodt, & Brand, 2017). Individual psychological factors, such as one's psychological needs and personality (Blackwell et al., 2017; Tresnawati, 2016), also have an impact on FoMO. This study aimed to examine the contribution of perceived social support and other psychological variables to FoMO, which may facilitate the formulation of possible preventive measures and interventions for FoMO-related problems.

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Perceived Social Support and FoMO

Perceived social support refers to the degree to which individuals believe they have social support and the impression whether they are supported by their social network (Barrera, 1986; Kuru & Piyal, 2018). Perceived

social support can reduce individuals' negative psychological characteristics (Al-Gamal, Bin Saeed, Victor, & Long, 2019; Jacobson, Lord, & Newman, 2017; Henry et al., 2019) and it has an important impact on individuals' physical and mental health (Graziano & Elbogen, 2017; Itzick, Kagan, & Tal-Katz, 2017; Sirois, Millings, & Hirsch, 2016). The social causality model indicates that lack of social support can lead to anxiety. Empirical studies have found that perceived social support has a negative predictive effect on anxiety (Jeong, Shin, Kim, Yang, & Park, 2016; Peter et al., 2017) and some studies have found that support from friends can effectively alleviate one's FoMO (Xie, Wang, Wang, Zhao, & Lei, 2018). Hence, Hypothesis 1 is proposed: *Perceived social support can negatively predict individuals' FoMO.*

Basic Psychological Needs as a Mediator

According to self-determination theory (SDT), human beings have three basic psychological needs: autonomy, competence and relatedness (Ryan & Deci, 2000). A lack of these basic psychological needs may lead to FoMO (Chai et al., 2018). Empirical studies have documented that having one's basic psychological needs satisfied is a significant negative predictor of FoMO (Przybylski et al., 2013; Xie et al., 2018) while a deficiency in specific psychological needs is positively correlated with FoMO (Beyens, Frison, & Eggermont, 2016; Oberst, Wegmann, Stodt, Brand, & Chamarro, 2017). Both the developmental tendencies of individuals and diverse factors in social environments have an impact on one's satisfaction of basic psychological needs (Ryan & Deci, 2000). Some studies have found that perceived social support, as a situational variable (Bakker & Demerouti, 2007), can positively and significantly predict individuals' basic psychological needs (Luo & Mu, 2017; Tian, Tian, & Huebner, 2016). Self-determination theory states that the satisfaction of one's basic psychological needs is an important mediating variable (Deci & Ryan, 2008; Deci & Vansteenkiste, 2004). When such needs are not met, individuals are compelled to undertake compensatory actions (Sheldon, Abad, & Hirsch, 2011), and this view has been supported by a number of empirical studies (e.g. Corrales et al., 2016; Vansteenkiste & Ryan, 2013). Therefore, Hypothesis 2 is formulated: *Basic psychological needs would mediate the association between perceived social support and FoMO.*

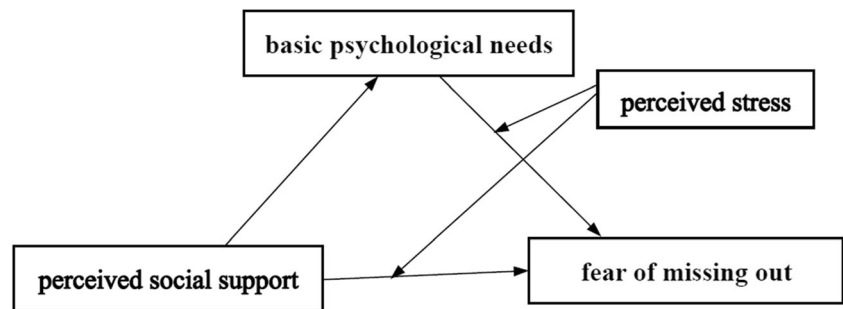
Perceived Stress as a Moderator

Ecological systems theory (Bronfenbrenner & Morris, 1998) indicates that individual behaviour results from the interaction between individual characteristics and the environment. That is, individuals with the same or similar individual characteristics may behave differently because

of different environments (Graves & Sheldon, 2017). Although perceived social support may indirectly affect FoMO, some differences may be observed in this relationship depending on the level of stress present in a given situation. Therefore, whether the mediated effect is affected by perceived stress or not should be explored. The stress-vulnerability hypothesis suggests that positive factors' positive effects on one's ability to cope with risks tend to be alleviated in a high-stress environment (Li, Zhang, Li, Li, & Ye, 2012; Wang, Li, & Zhang, 2010). That is, when individuals' perceived stress is low, their positive qualities will adapt well. However, individuals' adaptability will rapidly decrease under high-stress situations, in which risk factors will weaken the beneficial impact of positive factors. Some empirical studies have provided evidence in support of this hypothesis (Fu, Ye, & Wen, 2012; Yang & Ye, 2014). In contrast, resource protection theory suggests that risk factors play a moderating role in the relationship between resource factors and social adaptation, but that risk factors will not alleviate the beneficial impact of resource factors. That is, protective factors have a beneficial impact on social adaptation whether the risk is low or high, which is supported by some empirical studies (e.g. Ye, Hu, Yang, & Hu, 2014). Both the stress-vulnerability hypothesis and resource protection model suggest that perceived stress as a risk factor may affect the relations between perceived social support, basic psychological needs, and FoMO. Therefore, Hypothesis 3 is proposed: *Perceive stress would moderate the mediation between perceived social support, basic psychological needs, and FoMO. Specifically, the association between perceived social support and FoMO as well as the association between basic psychological needs and FoMO would be moderated by perceive stress.*

Studies have found that FoMO is related to maladaptive behaviors, such as smartphone overuse (Elhai, Levine, Dvorak, & Hall, 2016), diminished sleep (Milyavskaya et al., 2018), and substance abuse (Riordan, Flett, Hunter, Scarf, & Conner, 2015), which is also associated with deterioration of physical health and mental well-being (Buglass, Binder, Betts, & Underwood, 2017; Stead & Bibby, 2017). Therefore, it is meaningful and necessary to discover protective factors that could reduce FoMO. Thus, the current study proposed a moderated mediation model to examine both the mediating role of basic psychological needs and the moderating role of perceived stress on the relation between perceived social support and FoMO (Fig. 1). A moderated mediation model can simultaneously reflect how and when perceived social support may affect FOMO, which can provide ample and valuable information for better understanding the relationship between focused variables as well as providing some useful visions for practical intervention.

Fig. 1 conceptual model



Method

Participants

A total of 850 different college students in China were randomly selected as subjects and questionnaires were sent to them. Eventually, 806 valid questionnaires were collected and included in the full analysis (response rate = 94.82%). The subjects' average age was 20.27 years ($SD_{\text{age}} = 1.76$). Amongst the participants, 400 students were male (49.63%) and 406 were female (50.37%). There was a total of 198 freshmen (24.57%); 180 sophomores (22.33%); 216 juniors (26.80%) and 212 seniors (26.30%). Amongst the total number of students, 382 were only child (47.39%) and 424 had siblings (52.61%). Lastly, 358 participants were rural students (44.42%), whilst 448 were urban students (55.58%).

Measures

Perceived Social Support Scale

Perceived social support was measured by the Chinese version of Zimer's perceived social support scale (PSSS), which was revised by Jiang (2001); Zimet, Dahlem, Zimet, & Farley, (1988). The Chinese version of PSSS exhibited good reliability and validity, which was consisted of 12 items. The scale measures perceived social support from three sources including family, friends, and significant other. Each item was rated on a seven-degree Likert scale (from 1 = strongly disagree to 7 = strongly agree), with high scores indicating high levels of perceived social support. A sample item is "I get emotional help and support I need from my family". The results of confirmatory factor analysis (CFA) was satisfactory ($\chi^2/df = 2.72$, CFI = .96, NFI = .96, GFI = .92, RMSEA = .063). The Cronbach's α coefficients of all dimensions in this study were in the range of .84 to .89. The Cronbach's α coefficient of the total scale in the present study was .92.

Chinese Perceived Stress Scale

The study used the Chinese perceived stress scale (CPSS), which was revised by Yang and Huang (2003). This scale

comprised 14 items, including the 2 dimensions (sense of nervous and sense of uncontrol). Participants rated each item on a five-point Likert scale (1 as never, 5 as always), 7 of the 14 items were reversed-scored. The higher score predicted the higher the degree of perceived stress. A sample item is "Feeling upset when something unexpected happens". For the current study, Cronbach's α coefficients of the total scale and the two dimensions were .85, .81 and .84 respectively. CFA showed that the fitting index of the questionnaire structure was satisfactory ($\chi^2/df = 2.95$, CFI = .94, NFI = .92, GFI = .90, RMSEA = .053).

FoMO Scale

The study adopted the FoMO scale (Chinese version) compiled by Przybylski et al. (2013) and revised by Li, Wang, Zhao, and Jia (2019). The revised scale included eight items in two dimensions (fear of missing out on information and fear of missing out on situations). Items were paired with a five-point Likert-type scale (1 = Not at all true of me, 5 = Extremely true of me) with higher scores indicating higher degrees of FoMO. A sample item is "I get anxious when I don't know what my friends are up to". The Cronbach's α coefficient of the total scale was reported as .881 in the current study. The result of CFA was satisfactory ($\chi^2/df = 3.65$, CFI = .92, NFI = .90, GFI = .90, RMSEA = .067). The FoMO scale has been proven to have good reliability and validity.

The Revised Basic Need Satisfaction in General Scale

The basic psychological needs was assessed by the Revised Basic Need Satisfaction in General Scale. It comprised a total of 12 items using a 5-point Likert scale (1 = strongly disagree; 5 = extremely agree). The higher the total score, the greater the satisfaction of the individual's basic needs. A sample item is "I feel like I am free to decide for myself how to live my life".

Since this scale in our survey was initially developed from the the basic need satisfaction in general scale (BNSG-S; 16 items revised by Johnston & Finney, 2010), we translated the items into Chinese according to the process of translation and back-translation (Brislin, 1980). All 16 items were subjected

to a structural equation modeling analysis aimed at corroborating the basic need satisfaction's structure. Four items were removed from the scale due to low item loading results ($< .30$). The analysis results in three factors: need for relatedness, including four items ($\alpha = .82$); four items of need for competence ($\alpha = .86$); and need for autonomy, including four items ($\alpha = .81$). CFA showed satisfactory results: $\chi^2/df = 1.84$, CFI = .98, NFI = .97, GFI = .92, RMSEA = .057. The Cronbach's α for the entire scale in current study was .92.

Procedure

This study was approved by the Nanjing Normal University Ethics Committee, and conducted from January to March 2019. The college students were selected randomly for the questionnaire survey. Participants completed the investigation online through <https://www.wjx.cn/>. Informed written consent was obtained from participants prior to the investigation.

Data Analysis

Descriptive analysis and correlation analysis were performed in SPSS21.0. The proposed conceptual model were tested by using Amos 21.0. Demographic variables including participants' gender, age, grade and one-child were included as covariates in analysis. All continuous variables were standardized and all variables were mean-centered prior to analyses. Then, the mediating role of basic psychological needs and moderating effect of perceived stress were examined. Simple slope analysis was carried out to further explore the moderation effect.

Missing data from self-report measures were less than 1% for all variables. Hence, mean imputation was used to handle missing data (Little & Rubin, 2002).

Results

Common Method Bias Test

Common method biases may be observed because the collected data collected were subjective self-reported data. Related studies (e.g., Zhou & Long, 2004) have suggested using the Harman single factor method to conduct the common method bias test for variables. All items in each questionnaire were subjected to an exploratory factor analysis in SPSS to test the common method variance. The first factor in the model accounted for 24.28% of variance, which was less than the threshold of 40%. Hence, common method bias was unlikely to be of great concern in the current sample data.

Descriptive Statistics

Pearson's zero-order correlations, means, standard deviations for all variables (Table 1). Results showed that perceived social support was negatively correlated with FoMO and perceived stress, and positively correlated with basic psychological needs. Basic psychological needs was negatively correlated with perceived stress and FoMO, and perceived stress was positively correlated with FoMO.

Impact of Perceived Social Support on FoMO: Model with Moderation Mediation Role

Perceived social support, perceived stress, FoMO and basic psychological needs are standardised to Z fraction on the basis of the test method with the moderated mediation effect proposed by Wen and Ye (2014). Thereafter, the corresponding Z fraction was multiplied to generate the interaction term: perceived stress \times perceived social support and perceived stress \times basic psychological needs. Perceived social support significantly and negatively predicted college students' FoMO without adding perceived stress and basic psychological needs ($\beta = -.312$, $t = -9.341$, $p < .001$) after controlling for demographic variables such as age, gender, region, grade, and one child. Thus, Hypothesis 1 was supported. After adding perceived stress and basic psychological needs, the test result showed that the data fit the model well ($\chi^2/df = 14.63$, CFI = .95, TLI = .94, NFI = .94, RFI = .95, RMSEA = .05). Perceived social support positively and significantly predicted basic psychological needs ($\beta = .47$, $t = 15.89$, $p < .001$) and basic psychological needs negatively and significantly predicted FoMO ($\beta = -.17$, $t = -4.45$, $p < .001$) (see Fig. 2). Therefore, basic psychological needs played a mediating role between perceived social support and FoMO, verifying Hypothesis 2. Perceived stress \times basic psychological needs significantly predicted FoMO ($\beta = .11$, $t = 3.68$, $p < .01$). Therefore, perceived stress significantly moderated the relationship between basic psychological needs and FoMO. That is, perceived stress moderated the second half of the mediating model. However, perceived social support \times perceived stress had no significant impact on basic psychological needs ($\beta = .03$, $t = .02$, $p = .11$). We then used the bias-corrected percentile bootstrap method to conduct further tests and the result remained insignificant (95% CI = $-.056$ to $.045$). Therefore, perceived stress failed to moderate the effect of perceived social support on basic psychological needs. Moreover, perceived social support \times perceived stress had a significant impact on FoMO ($\beta = .09$, $t = 2.85$, $p < .01$) and moderated the direct effect of perceived social support on FoMO. After adding a mediating variable (basic psychological needs), and a moderating variable (perceived stress), the impact of perceived social support on FoMO was still significant ($\beta = -.20$, $t = -5.38$, $p < .001$). Hence, basic

Table 1 Descriptive statistics of all variables

Variables	<i>M</i>	<i>SD</i>	Perceived social support	Perceived stress	FoMO	Basic psychological needs
Perceived social support	5.30	0.93	1			
Perceived stress	2.86	0.48	-.27***	1		
FoMO	2.88	0.21	-.31***	0.25***	1	
Basic psychological needs	3.61	0.57	0.52***	-.38***	-.33***	1
gender	0.50	0.50	-.003	-.002	.008	.006

FoMO, Fear of Missing Out; Sample size *n* = 806; gender coded as male = 0, female = 1; * *p* < .05, ** *p* < .01, *** *p* < .001

psychological needs partially mediated the association between perceived social support and FoMO. Thus, the moderated effects of perceived stress on the second path and direct path of the mediating model were significant. The analysis demonstrated that the impact of perceived social support on FoMO was a moderated mediation model, supporting Hypothesis 3.

To further explain the moderating role of stress, simple slope tests were conducted (Aiken & West, 1991). This moderation effect is shown in Figs. 3 and 4.

Figure 3 depicted the relation between basic psychological needs and FoMO at both low and high level of perceived stress. For college students with low perceived stress, FoMO showed a significantly declining trend ($B_{simple} = -.34, t = -6.05, p < .001$) with an increase in basic psychological needs. College students with high perceived stress showed a significantly declining trend of FoMO ($B_{simple} = -.12, t = -2.27, p = .02$) when the basic psychological needs increase, but the degree of decline was slightly reduced. Therefore, the relation between basic psychological needs and FoMO is stronger when perceived stress is low rather than high.

Figure 4 showed the impact of perceived stress on the direct effect of perceived social support on FoMO. Results showed that for college students with low levels of perceived stress, the level of FoMO significantly declined ($B_{simple} = -.26, t = -4.09, p < .01$) with an increase in perceived social support. For college students with high levels of perceived stress, the negative effect of perceived social support on FoMO was no longer significant ($B_{simple} = -.01, t = -0.03, p = .98$). This result indicated that the lower of perceived

stress, the higher impact of perceived social support on FoMO.

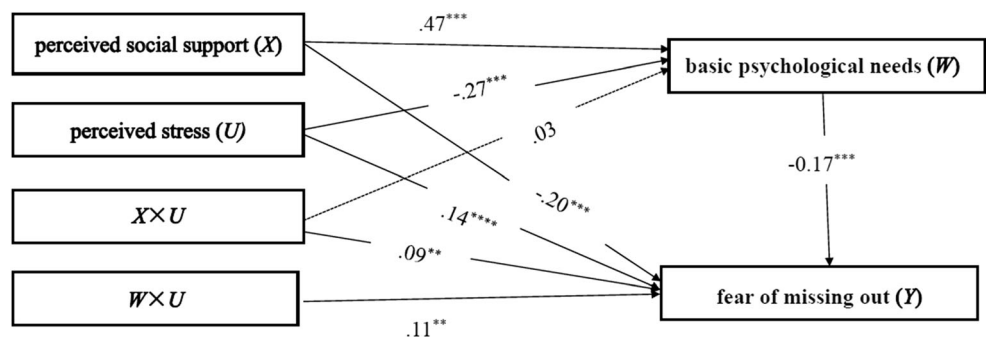
Discussion

The topic of perceived social support and FoMO has received attention from researchers. What remains unknown is how and when perceived social support contributes to FoMO. The present study tries to answer this question by developing and testing a moderated mediation model to assess how basic psychological needs and perceived stress impact this relation based on self-determination theory and ecological systems theory. The results revealed that (a) perceived social support was a significant negative predictor of college students’ FoMO, providing empirical support for the social causality model, (b) basic psychological needs mediated the relation between perceived social support and FoMO, and (c) perceived stress moderated the indirect effect of basic psychological needs. Specifically, the effect of basic psychological needs on FoMO was greater for individuals reporting low relative to high perceived stress; conversely, the direct effect of perceived social support on FoMO only emerge for individuals reporting low perceived stress.

Mediating Effects of Basic Psychological Needs

Basic psychological needs are the bases and conditions of intrinsic motivation, self-acquisition, personality integration and positive development, playing a vital role in the process

Fig. 2 Moderated mediation model



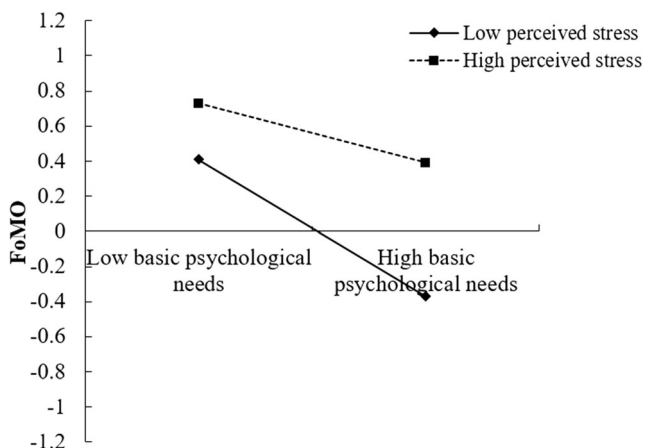


Fig. 3 Moderating role of perceived stress in the relationship between college students' basic psychological needs and FoMO

of life development and integration (Ryan & Deci, 2000). Hence, exploring the mediating role of basic psychological needs in the relationship between perceived social support and FoMO can help to reveal the internal cognitive mechanisms of FoMO. Results showed that basic psychological needs played a partially mediating role between perceived social support and college students' FoMO, which supported self-determination theory. That is, perceived social support can influence FoMO through the mediating factor of basic psychological needs and high levels of perceived social support can directly alleviate one's FoMO.

Perceived social support can buffer external pressure and promote subjective passive feelings (Reinelt et al., 2014). People with higher levels of perceived social support are more likely to interpret other people's arbitrary behaviors as supportive resources. High levels of perceived social support can inhibit adverse reactions and facilitate one's adaptive behaviors (Liu & Huang, 2010). Individuals with higher levels of perceived social support are more capable of combating FoMO, which is a passive event, by using more protective resources. Findings revealed that perceived social support

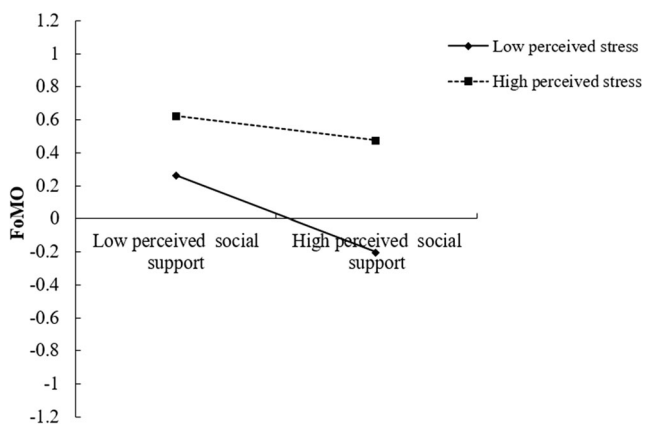


Fig. 4 Moderating role of perceived stress in the relationship between college students' perceived social support and FoMO

positively predicted basic psychological needs. This is in line with previous studies (Luo & Mu, 2017; Tian et al., 2016). According to the theory of basic psychological needs satisfaction, basic psychological needs (needs for competence, autonomy and relatedness) are nourishment for individual development and happiness (Ryan & Deci, 2002). Individuals with high levels of perceived social support can use protective resources to meet their psychological needs and satisfaction of basic psychological needs appears to serve as protective factors itself against harmful effects. Conversely, when such needs cannot be satisfied, the desire to fulfil these needs might hinder self-regulatory mechanisms, which may result in FoMO (Chai et al., 2018). Therefore, individuals with high levels of perceived social support are more likely to satisfy their basic psychological needs, which could help boost well-being and reduce their FoMO.

Moderating Role of Perceived Stress

This study also examined whether perceived stress played a moderating role in the mediating effect of perceived social support on FoMO through basic psychological needs. Results showed that perceived stress moderated the impact of perceived social support and basic psychological needs on FoMO. The relationship between basic psychological needs and FoMO was stronger among participants with lower perceived stress as compared to participants with higher perceived stress. That is, the basic psychological needs of college students still predicted FoMO significantly under higher perceived stress, which illustrated that basic psychological needs is a stress-protective factor rather than a stress-vulnerability factor. Since basic psychological need satisfaction is a protective factor against FoMO, the results provide evidence for "the resource protection model". Hence, when basic psychological needs are satisfied, individuals can utilize their protective resources to reduce FoMO more effectively. Thus, a higher level of basic psychological needs satisfaction can lead to a reduction in FoMO, and this is in line with work by Xie et al. (2018).

The moderated direct effect revealed that the negative relationship between perceived social support and FoMO only emerged for college students reporting lower perceived stress. One possible reason for this may be college students' maladaptive explanation about high levels of stress and negative events. Individuals with high perceived stress may lost in the negative effects caused by severe stress, and fail to perceive support from others, which could result in high levels of FoMO. Hence, perceived stress as a risk factor could substantially damage the effect of perceived social support on FoMO. The results were consistent with those of previous studies (e.g. Yang & Ye, 2014), which provided evidence for the stress-vulnerability hypothesis (Wang et al., 2010).

Implications for Theory and Practice

The present study constructed and examined a moderated mediation model to identify the protective and risk factors of FoMO. Findings have important theoretical and practical implications for further explorations of FoMO, and advance the research topic investigating the influence of social support on FoMO. Theoretically, the current study contributes to the literature by illuminating the potential mechanism between perceived social support on FoMO. Moreover, by exploring the mediating effect of basic psychological needs and moderating effect of perceived stress among college students, the current study contributes to the literature by providing important empirical support for self-determination theory and ecological systems theory in the context of Chinese cultures.

The results have practical implications. The current study provided evidence for promoting perceived social support and basic psychological needs and decreasing perceived stress in the clinical implications for relieving FoMO. Possible reasons why individuals develop high levels of FoMO have been receiving considerable attention from both practitioners and researchers, which can make a great contribution to the prevention of FoMO. Findings have the merit of shedding new light on the prevention for FoMO. When individuals' basic psychological needs are not satisfied, they would experience FOMO (Przybylski et al., 2013). Thus, developing responsive prevention and intervention programs aimed at filling the deficits in psychological needs and appropriately supporting basic psychological needs may be beneficial in the prevention of FoMO for Chinese college students.

A substantial body of studies suggests that perceived social support can protect people from the adverse effects of stressful events and improving their social adaptability (Cohen & Syme, 1985; Jaffar et al., 2019). Lower perceived social support associated with lower basic psychological needs, which can further lead to a higher level of fear of missing out. According to the compensatory motivation perspective of self-determination theory (Deci and Ryan 2000), individuals are more likely to make compensation behaviors when their needs are not satisfied. Therefore, college students who cannot perceive sufficient social support in the offline world may turn to social media to seek online support (Brailovskaia, Rohmann, Bierhoff, Schillack, & Margraf, 2019). While social support through online social networking sites is positively correlated with fear of missing out (Liu & Ma, 2018). Hence, it is important for clinicians and practitioners to formulate strategies to promote college students' perceived social support as well as basic psychological needs. Specifically, it might be more meaningful to establish supporting frameworks conducive to offline connections with families, friends, and significant others of college students, functioning to provide more offline social support rather than online

support for students experiencing high levels of FoMO. Moreover, due to strong roles of perceived stress in the moderated mediation model, stress coping, stress management and social skills should be included in the education programs to mitigate high levels of FoMO.

Limitations and Future Research Directions

This study had some limitations. First, the data that we utilised was collected using self-reported measures which may hide the real answers. Further study should provide more objective measures, such as experimental research, to verify the proposed model in current study. Second, our investigation was conducted among regional college students in China, it is uncertain whether the culture context of Chinese university students is generalizable to the wider population. Third, this study focused on the moderating role of perceived stress, but there may be other internal factors that can influence the relationship between perceived social support and FoMO, such as shyness and social phobia. Further studies should evaluate whether such internal factors could explain the relationship between perceived social support and FoMO, providing complementary insights in the process.

Conclusions

Based on self-determination theory and ecological systems theory, the present study tested a moderated mediation model and found that basic psychological needs mediated the relation between perceived social support and FoMO. Furthermore, perceived stress moderated this mediation model. Accordingly, the current study has extended previous research findings in showing perceived social support as a potential protective factors to prevent against FoMO. Moreover, enhancing basic psychological needs satisfaction and decreasing their feelings of stress can reduce FoMO of college students effectively. This study has important implications for outlining why and how perceived social support can reduce FOMO among college students.

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Data Availability Some or all data, models, or code generated or used during the study are available from the corresponding author by request.

Declarations

Ethical Approval The research procedures performed in studies involving human participants were approved by the Institutional Review Board of Henan university.

Research Involving Human Participants and Informed Consent Informed consent was obtained from all research participants included in the study. They were informed that participation was voluntary.

Conflict of Interest The authors declare that they have no conflicts of interest.

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