Association for Information Systems

AIS Electronic Library (AISeL)

ICEB 2021 Proceedings (Nanjing, China)

International Conference on Electronic Business (ICEB)

Winter 12-3-2021

Research on the Effects of Youth Personalities on Impulse Purchasing Intention

Qiong Jia Hohai University, Nanjing, China, jiaqionghit@163.com

Anqi Zhang Hohai University, Nanjing, China, shujiang19980224@163.com

Ziyu Wan China Mobile Communications, Nantong, China, roseherb@163.com

Follow this and additional works at: https://aisel.aisnet.org/iceb2021

Recommended Citation

Jia, Qiong; Zhang, Anqi; and Wan, Ziyu, "Research on the Effects of Youth Personalities on Impulse Purchasing Intention" (2021). *ICEB 2021 Proceedings (Nanjing, China)*. 62. https://aisel.aisnet.org/iceb2021/62

This material is brought to you by the International Conference on Electronic Business (ICEB) at AIS Electronic Library (AISeL). It has been accepted for inclusion in ICEB 2021 Proceedings (Nanjing, China) by an authorized administrator of AIS Electronic Library (AISeL). For more information, please contact elibrary@aisnet.org.

Jia, Q., Zhang, A. Q. & Wan, Z.Y. (2021). Research on the effects of youth personalities on impulse purchasing intention. In *Proceedings of The International Conference on Electronic Business, Volume 21* (pp. 640-646). ICEB'21, Nanjing, China, December 3-7, 2021.

Research on the Effects of Youth Personalities on Impulse Purchasing Intention

(Work in Progress) Qiong Jia¹ Anqi Zhang² Ziyu Wan^{3,*}

² Graduate Student, Hohai University, Nanjing, China, shujiang19980224@163.com

³ Undergraduate Student, China Mobile Communications, Nantong, China, roseherb@163.com

ABSTRACT

Youth are the main group of social media users, but there is limited literature on the influencing factors of impulse consumption tendency that focus on youth. This research mainly studies the influence of teenagers' personality traits on impulse buying. We attempt to the mediating effect of upward social comparison and the moderating effect of emotion. We design a questionnaire with measures of personality, upward social and emotion in the recent one month. We expect that the positive/negative emotion would moderate the direct influence of personality traits on impulse consumption and the indirect effect of upward social comparison on impulse consumption. The study not only contributes to the youth purchase behaviors but also links the connections among the personalities, emotions, and purchase intention.

Keywords: Big-five model; impulse purchasing intention; upward social comparison

INTRODUCTION

Social Network and Personality

Instant messaging, search engines, online news, online payment, online shopping, online banking, and other kinds of mobile Internet applications have deeply embedded all aspects of people's life and work life, which builds a new social form and a basic way of life. According to statistics from the International Telecommunication Union (ITU), the total number of Internet users in the world reached 3.5 billion at the end of 2016, and the network penetration rate was 47.1% (Roser *et al.*, 2015). Since 2003, Social Networking has emerged rapidly all over the world. Today, it has created many myths and is regarded as the second wave of the Internet with the rise of friendster.com, Orkut.com, Ryze.com, tribe. Nine out of ten teens aged 13-17 use social media platforms, and most (71%) of them use more than one (CNNIC, 2020). The number of youth Internet users using mobile phones reached 932 million, and the proportion of mobile Internet users has reached 99.2% since 2020 (CNNIC, 2021). The rise of social networking on the Internet goes hand in hand with the high penetration of mobile devices.

The new model of Internet social networking is different from face-to-face communication in real life in four main points: anonymity, invisibility, no geographical restrictions, and non-synchronization in time (McKenna & Bargh, 2000). Many researchers have studied the influencing factors of Internet social services, and it can be seen from numerous studies that the use of Internet social services is mainly related to personality traits such as extraversion, neuroticism, social support, and social anxiety (Durbano & Marchesi, 2016). Some researchers believe that extroverted and sociable individuals are more likely than introverted individuals to use the Internet to maintain relationships with family and friends or to make new friends by frequent use of online chat rooms, expand their social relationships and obtain more social support (Amichai-Hamburger & Ben-Artzi, 2003). It is always believed that neurotic people are shy and anxious, and it is difficult for them to form social relationships in real social situations. They can only socialize in front of computer screens. Hamburger and Ben-Artzi's study found that neurotic individuals are more likely to be lonely (Amichai-Hamburger & Ben-Artzi, 2003). They are also more likely to use social services on the Internet. Individuals with social anxiety are more likely to form close friendships on the Internet, and the formation of such friendships on the Internet will increase the individual's self-confidence and self-efficacy. When in the traditional face-to-face interpersonal communication situation, he or she will be more confident about their social skills. The development of social network objectives but how to use them is affected by individual personality differences. We wonder how the different performance led by individual personality would have effects on upward social comparison and thus the online impulse purchase.

Online Impulse Buying

From the perspective of psychology, online consumption behavior is the behavior of people in the virtual space of the Internet when they collect, buy, use, judge, and deal with the services, products, resources, and ideas that they want to meet their needs (Li B.N, 2008). A 2014 study by Merzer found that among 1000 adult Americans, 75% reported having made a purchase on impulse alone. Impulse buying is also apparent among consumers in China and arguably even more serious because of the popularity and convenience of online shopping (Chen, & Zhang, 2015). This article would focus on the online impulse buying raised along with the development of the social network.

^{*}Corresponding author

¹ Associate Professor, Hohai University, Nanjing, China, jiaqionghit@163.com

Impulse buying is defined as an unplanned, sudden purchase, usually accompanied by cognitive and emotional reactions (Rook, 1987). Weinberg and Gottwald (1982) measured impulsive buying from the three levels of emotion, cognition, and reflection. They say impulse buying is actually a rash, thoughtless and unplanned purchase. Impulsive consumers have very strong emotional activities and lack rational evaluation when consuming. Cobb and Hoyer(1986) believed that the so-called impulse purchase is an immediate, sudden behavior without a prior purchase purpose. Dittmar and Friese (1995,1996) explained consumers' impulsive shopping on the basis of social construction theory. They believe that consumers' purchase is a projection of self-identity. That is, consumers regard products as an extension of themselves. The research results confirm that symbolic and emotional products are indeed easy to cause the impulsive purchase of consumers. Researchers to further explain, consumers in the actual I (herself) in real life and ideal (want to be the kind of person) I perceived that the difference between, will want to borrow mountain products use m self-image to make oneself want to be the kind of person, so for such symbolic products, produces impulsive purchase. For example, males attach importance to autonomy and tend to impulsively purchase instrumental and leisure products, while females attach importance to emotional vent and relationship maintenance and tend to impulsively purchase symbolic and self-expression products. Figure 1 followed below is the decision-making process of impulse purchase (Kim, 2003).

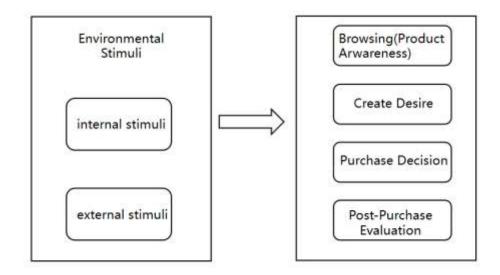


Figure 1: Impulse purchase decision-making process (Kim, 2003).

There have been quite a few researches on impulsive buying. However, most of their study group were adults. As of June 2021, China's Internet users aged 6-19 reached 158 million, accounting for 15.7 percent of the total Internet users (CNNIC, 2021). Our research is designed to focus on the impulse buying existing among the youth (age 15 to 25, defined by World Health Organization). We conducted a questionnaire survey with scales of the Big Five Inventory (John O. P., 1999), Upward Comparison(GIBBONS, F. X., & BUUNK, B. P., 1999), the PANAS Scales (Watson *et al.*, 1988) to figure out the interaction between the personality traits of youth and impulsive buying. We introduced Upward Comparison as the mediation variable and Emotion as the moderator variable.

This paper would fill the research gap in the role of personality traits in impulse shopping among youth, expanding the literature on impulse buying. We are committed to exploring the reasons behind this abnormal shopping and contributing to the targeted improvement of youth mental health. Our study could also provide guidance for mobile social networking marketing.

Impulse Purchasing Intention

LITERATURE REVIEW

Stern (1962) gave the early definition of impulse buying and classified impulse buying into pure impulse buying, prompt impulse buying, induced impulse buying, and planned impulse buying. Based on the intrinsic motivation of consumers, Bayley and Nancarrow (1998) divided the types of impulse purchase into a self-confirmed impulse purchase, self-compensation impulse purchase, self-redefinition impulse purchase, and pathological impulse purchase.

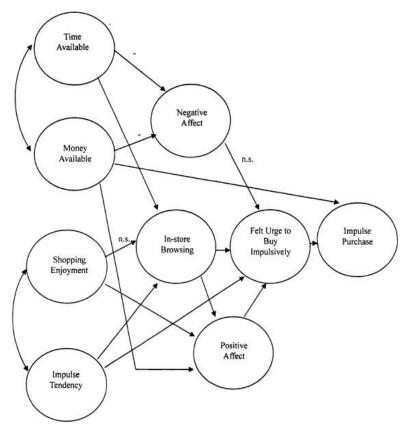
Kollat (1967) pointed out in the research on impulse buying of food that, from the perspective of consumers, the more frequently purchased products (such as various daily necessities and clothing, etc.), the lower the proportion of impulse buying will be. Product decoration refers to the goods on the rack, decoration location, shelf height, etc. Applebaum (1951), Clover (1950), and Katona and Mueller (1955) investigated the frequency of consumers' impulsive purchase behavior under different product categories, different product layouts, and different retail store shelf displays. It confirms the effect of product layout and shelf display on impulse buying.

In addition, the combination of goods can also arouse consumers' desire to buy. Goods are endowed with special meaning, such as representing a way of life, which is very tempting to consumers. Narasimhan, Neslin & Sen(1996) pointed out in the literature that "for impulsive consumers, the time for consideration is relatively short, so some stimulus in the environment, such as a

relatively low price, will increase consumers' perceived value and purchase intention. Agee and Martin(2001) discussed information advertising and pointed out that if manufacturers want to influence consumers' impulse purchases, they need to make consumers aware of the existence of products through advertising information so as to persuade consumers to have demand for the products. The research of D'Astous *et al.* found that TV advertisements can affect consumers' irrational and irregular consumption behaviors, and the amount of exposure to advertisements is significantly positively correlated with consumers' impulsive shopping. We could easily speculate that the development of social networks increased exposure to goods and promoted impulse buying.

Internal stimuli are also significant factors that cause individual impulse buying related to personality (Bratko, Butkovic, & Bosnjak, 2013). Impulse buying can be induced through individuals' tendency to involve in impulse buying, a hedonic need, motives to seek variety and differences, lack of self-control, and a desire to escape from negative feelings. Situational and product-related factors involve a time of shopping (Jeffrey & Hodge, 2007).

Demographics and social-cultural factors, consisting of individuals' gender, age, income, education, culture, and socioeconomic, are also important determinants of impulse buying (Coley & Burgess, 2003; Vohs & Faber, 2007). The youth group has a series of characteristics, such as personalized needs, rebellious spirit, curiosity about new things, and attention to personal privacy. The network provides the youth group with a consumption space without real boundaries, which is very convenient and full of desire consciousness. Therefore, the youth group has consistency with personality traits that cause impulse buying. Figure 2 followed below is the precursor model of impulse buying (Beatty & Ferrell, 1998).



Source: Beatty & Ferrell (1998). Figure 2: Cause and effect model of impulsive buying

Upward Social Comparison

Social comparison is an important feature of social life. People need to compare themselves with others in order to better understand themselves and more accurately understand their own abilities and abilities (Festinger, 1954). Upward social comparison and downward social comparison are two common types of social comparison. Upward social comparison occurs when people are compared to those who are perceived to be socially superior in some way, while downward social comparison occurs when individuals compare themselves to those who are socially inferior (Vogel *et al.*, 2014). Social comparison has multiple functions, including satisfying self-enhancement motivation (Suls, Martin, & Wheeler, 2002), enhancing self-esteem (Vogel *et al.*, 2014), regulating emotions and happiness (Taylor & Brown, 1988), evaluating self (Muller & Butera, 2007), etc. More recently, with the emergence of social networking sites (social networks), social comparisons have become ubiquitous, as social networks can provide a large amount of information describing individuals' lives (Sabati & Sarracino, 2019), and because we spend far more time browsing and searching for information online than offline (Wise, Alhabash, & Park, 2010). Considering that checking other people's profiles on social networks has become an increasingly popular activity (Pempek *et al.*, 2009), social networks are considered to be an almost ideal platform for individuals to make social comparisons. Social comparisons on social

networks may be particularly pronounced among younger people (18-29 years old) as they spend more time browsing and searching information online (Pempek *et al.*, 2009).

MODEL CONSTRUCTION AND RESEARCH HYPOTHESES

Research Hypotheses

The formal studies of impulsive buying mostly focused on the eternal influence factors of impulse buying. The impulse purchase behavior of youth has been overlooked. Because compared with other groups, the youth group has a strong connection with online consumption, whether in the internal level of education, the motivation to pursue new experience and consumption level with certain level requirements, or in the external level of proficiency in the application of payment technology, avoiding the risk of online consumption, we expected that the personality traits of the youth had a significant influence on their impulse buying.

H1 : The personality traits of the big five trait taxonomy have a significant effect on the youth's impulsive buying behavior.

As entered the post-industrial period, the popularity of social networks has had a significant effect on the mental health and behavior of youth through upward comparison. We suggest that the upward comparison would have a mediating effect on the interaction of youth personality and impulsive buying.

H2: The upward comparison mediates the relationship between personality and impulsive buying of the youth group.

We still introduced emotion as the moderating variable. Impulse buying is emotion-related behavior. When negative emotions occur, individuals are inclined to purchase impulsively and regard this behavior as a way to comfort themselves. In addition, impulse buying can also elevate chronic negative emotions because the purpose of impulse buying is to make someone feel better (Verplanken *et al.*, 2005). Therefore, we tend to figure out the moderating effect emotion has on the relationship between key variables.

H3: The emotion moderates the relationship between personality and impulsive buying of the youth group.

H4: The emotion moderates the relationship between upward comparison and impulsive buying of the youth group.

Conceptual Structure

The conceptual model is illustrated by the following figure 3.

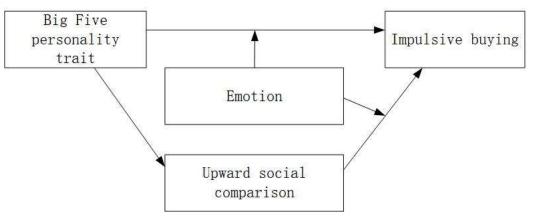


Figure 3: Conceptual model

Measurements

Table 1 shows the scale of variables selected in this study.

Table 1: Measurement						
Variable	Scale	Source				
Impulse Buying Tendency	Impulse Buying Tendency Scale	Verplanken, B., & Herabadi, A. (2001). Individual differences in impulse buying tendency: feeling and no thinking. <i>European Journal of Personality</i> , 15.				
Personality Traits	The Big Five Inventory	John, O. P., & Srivastava, S. (1999). The Big Five trait taxonomy: History, measurement, and theoretical perspectives.				

Upward Social Comparison	Iowa-Netherlands Comparison Orientation Measure	Gibbons, F. X., & Buunk, B. P. (1999). Individual Differences in Social Comparison: Development of a Scale of Social Comparison Orientation. <i>Journal of Personality and Social Psychology</i> , 76(1), 129–142.
Emotion	The PANAS	Watson, D., Clark, L. A., & Tellegen, A. (1988). Development and validation of brief measures of positive and negative affect: the PANAS scales. <i>Journal of personality and social psychology</i> , <i>54</i> (6), 1063.

Reliability and validity analysis

Table 2: Reliability analysis					
Overall reliability statistics					
Clone Bach Alpha	Standardized term based clone Bach Alpha	items			
0.832	0.841	118			

As shown in the above table 2, the Alpha value of all items is greater than 0.7 (and the overall Alpha value of each item is less than the revised Alpha value after the deletion of a certain item), and the overall Alpha value of the questionnaire is 0.841. In conclusion, each measurement item has good reliability, and the item design is reasonable without adjustment.

Validity analysis refers to the validity of test results. The coefficient of the KMO test ranges from 0 to 1. The closer its value is to 1, the better the validity of the questionnaire is. Validity test is conducted in this report according to SPSS26.0, and the analysis is shown in Table 3:

Table 3: Validity analysis						
KMO and Bartlett tests						
KMO sampling suitability quantity		0.816				
	chi-squared approximation	18795.354				
Bartlett sphericity test	DOF	6903				
	significance	0.000				

According to the above results of exploratory factor analysis, the coefficient of the KMO test is 0.816. According to the significance of the sphericity test, the significance of this test is infinitely close to 0. In conclusion, the measurement validity of the questionnaire in this report is good.

Expected result

We expect that among the dimensions of the five personalities, openness, extraversion and neuroticism have a significant influence on adolescents' impulsive buying behavior, and the other two dimensions are not significant. The upward social comparison is an indirect mediating variable of the relationship between personality and impulsive buying. The interaction would strengthen while the participant in negative emotion during recent one month.

CONCLUSIONS

In the existing studies, the underlying causes of youth' online impulse spending have been neglected. Our research expands the application of the Big Five Personality Theory in youth groups. We explore the internal cause and mechanism of youth impulsive buying behavior, providing theoretical guidance for the marketing of social network platforms.

ACKNOWLEDGMENT

Generous financial support was provided by the National Natural Science Foundation of China [grant numbers71904043, 71872061, 71702045], Social Science Foundation of Jiangsu Province (18TQC002), the Key Program of NSFC-FRQSC Joint Project (NSFC No. 72061127002, FRQSC No. 295837), and Fundamental Research Funds for the Central Universities [grant numbers B210207008].

REFERENCES

- Agee, T., & Martin, B. A. (2001). Planned or impulse purchases? How to create effective Infomercials. *Journal of Advertising Research*, *41*(6), 35-42. doi: 10.2501/JAR-41-6-35-42 Published 1 November 2001
- Amichai-Hamburger, Y., & Ben-Artzi, E. (2003). Loneliness and Internet use. *Computers in Human Behavior*, 19(1), 71-80. doi: 10.1016/S0747-5632(02)00014-6

Applebaum, W. (1951). Studying customer behavior in retail stores. *Journal of Marketing*, 16(2), 172-178. doi: 10.1177/002224295101600204

- Bayley, G., & Nancarrow, C. (1998). Impulse purchasing: A qualitative exploration of the phenomenon. *Qualitative Market Research*, 1(2), 99-114. doi: 10.1108/13522759810214271
- Beatty, S.E., Ferrell, M.E. (1998). Impulse buying: Modeling its precursors. *Journal of Retailing*, 74 (2) : 161-162. doi: 10.1016/S0022-4359(99)80092-X
- Bratko, D., Butkovic, A., & Bosnjak, M. (2013). Twin study of impulsive buying and its overlap with personality. *Journal of Individual Differences*. 34 (1), 8-14. doi: 10.1027/1614-0001/a000091
- Chen, Y., & Zhang, L. (2015). Influential factors for online impulse buying in China: A model and its empirical analysis. *International Management Review*, 11, 57-60.
- China Internet Network Information Center (CNNIC). *The 46th statistical report on the development of Internet in China* (in Chinese) .http://www.cnnic.net.cn/hlwfzyj/hlwxzbg/hlwtjbg/202009/t20200929_71257.htm [Online Resource]
- China Internet Network Information Center (CNNIC). *The 48th statistical report on the development of Internet in China* (in Chinese). http://www.cnnic.net.cn/hlwfzyj/hlwxzbg/hlwtjbg/202109/t20210915_71543.htm [Online Resource]
- Clover, V. T. (1950). Relative importance of impulse-buying in retail stores. *Journal of Marketing*, 15(1), 66-70. doi: 10.1177/002224295001500110
- Cobb, C. J., & Hoyer, W. D. (1986). Planned versus impulse purchase behavior. *Journal of Retailing*, 62(4), 384-409. doi: 10.1016/0737-6782(86)90025-1
- Coley, A., & Burgess, B. (2003). Gender differences in cognitive and affective impulse buying. *Journal of Fashion Marketing and Management: An International Journal*, 7(3), 282-295. doi: 10.1108/13612020310484834
- Dittmar, H., Beattie, J., & Friese, S. . (1996). Objects, decision considerations and self-image in men's and women's impulse purchases. *Acta Psychologica*, 93(1-3), 187. doi: 10.1016/0001-6918(96)00019-4
- Dobrean, A., & Păsărelu, C. R. (2016). Impact of social media on social anxiety: A systematic review. In F. Durbano & B. Marchesi (Eds.). *New developments in anxiety disorders*. IntechOpen., DOI: 10.5772/62656 (Chapter 7).
- Festinger, L. (1954). A theory of social comparison processes. *Human Relations*, 7(2), 117-140. doi: 10.1177/001872675400700202
- Gibbons, F. X., & Buunk, B. P. (1999). Individual differences in social comparison: development of a scale of social comparison orientation. *Journal of Personality and Social Psychology*, 76(1):129-42. doi: 10.1037/0022-3514.76.1.129
- Jeffrey, S. A., & Hodge, R. (2007). Factors influencing impulse buying during an online purchase. *Electronic Commerce Research*, 7(3), 367-379. doi: 10.1007/s10660-007-9011-8
- John, O. P., & Srivastava, S. (1999). *The Big-Five trait taxonomy: History, measurement, and theoretical perspectives* (Vol. 2, pp. 102-138). Berkeley: University of California.
- Katona, G., & Mueller, E. (1955). A study of purchase decisions. *Consumer behavior: The Dynamics of Consumer Reaction*, *1*, 30-87.
- Kim, J. (2003). *College students' apparel impulse buying behaviors in relation to visual merchandising* (Doctoral dissertation, University of Georgia).
- Kollat, D. T., & Willett, R. P. (1967). Customer Impulse Purchasing Behavior. *Journal of Marketing Research*, 4(1), 21-31. doi: 10.1177/002224376700400102
- Roser, M., Ritchie, H., & Ortiz-Ospina, E.(2015). *Internet*. Published online at OurWorldInData.org. Retrieved from: 'https://ourworldindata.org/internet' [Online Resource]
- McKenna, K. Y., & Bargh, J. A. (2000). Plan 9 from cyberspace: The implications of the Internet for personality and social psychology. *Personality and Social Psychology Review*, 4(1), 57-75. doi: 10.1207/S15327957PSPR0401_6
- Micozzi, M. S., Brown, E. D., Taylor, P. R., & Wolfe, E. (1988). Carotenodermia in men with elevated carotenoid intake from foods and beta-carotene supplements. *The American Journal of Clinical Nutrition*, 48(4), 1061-1064. doi:10.1093/ajcn/48.4.1061
- Muller, D., & Butera, F. (2007). The focusing effect of self-evaluation threat in coaction and social comparison. *Journal of Personality and Social Psychology*, 93(2), 194-211. doi: 10.1037/0022-3514.93.2.194
- Narasimhan, C., Neslin, S. A., & Sen, S. K. (1996). Promotional elasticities and category characteristics. *Journal of Marketing*, 60(2), 17-30. doi: 10.1177/002224299606000202
- Pempek, T. A., Yermolayeva, Y. A., & Calvert, S. L. (2009). College students' social networking experiences on Facebook. *Journal of Applied Developmental Psychology*, 30(3), 227-238. doi: 10.1016/j.appdev.2008.12.010
- Rook, D. W. (1987). The buying impulse. Journal of Consumer Research, 14(2), 189-199. doi: 10.1086/209105
- Sabatini, F., & Sarracino, F. (2019). Online social networks and trust. Social Indicators Research, 142(1), 229-260. doi: 10.1007/s11205-018-1887-2
- Stern, H., 1962. The significance of impulse buying today. *Journal of Marketing*, 26 (2), 59–62. doi: 10.1177/002224296202600212
- Suls, J., Martin, R., & Wheeler, L. (2002). Social comparison: Why, with whom, and with what effect?. Current Directions in Psychological Science, 11(5), 159-163. doi: 10.1111/1467-8721.00191
- Taylor, S. E., & Brown, J. D. (1988). Illusion and well-being: a social psychological perspective on mental health. *Psychological Bulletin*, 103(2), 193. doi: 10.1037/0033-2909.103.2.193
- Tobin, J., Katona, G., & Mueller, E. L. (1953). Consumer attitudes and demand, 1950-1952. *Econometrica*, 23(4), 456. doi: 10.2307/1905356
- Verplanken, B., & Herabadi, A. (2001). Individual differences in impulse buying tendency: Feeling and no thinking. *European Journal of Personality*, 15(1_suppl), S71-S83. doi: 10.1002/per.423

- Verplanken, B., Herabadi, A. G., Perry, J. A., & Silvera, D. H. (2005). Consumer style and health: The role of impulsive buying in unhealthy eating. *Psychology & Health*, 20(4), 429-441. doi: 10.1080/08870440412331337084
- Vogel, E. A., Rose, J. P., Roberts, L. R., & Eckles, K. (2014). Social comparison, social media, and self-esteem. *Psychology of Popular Media Culture*, 3(4), 206–222. doi: 10.1037/ppm0000047
- Vohs, K. D., & Faber, R. J. (2007). Spent resources: Self-regulatory resource availability affects impulse buying. Journal of Consumer Research, 33(4), 537-547. doi: 10.1086/510228
- Watson, D., Clark, L. A., & Tellegen, A. (1988). Development and validation of brief measures of positive and negative affect: The PANAS scales. *Journal of Personality and Social Psychology*, *54*(6), 1063-1070. doi: 10.1037/0022-3514.54.6.1063
- Weinberg, P., & Gottwald, W. (1982). Impulsive consumer buying as a result of emotions. *Journal of Business Research*, 10(1), 43-57. doi: 10.1016/0148-2963(82)90016-9
- Wise, K., Alhabash, S., & Park, H. (2010). Emotional responses during social information seeking on facebook. *Cyberpsychology, Behavior, and Social Networking, 13*(5), 555-562. doi: 10.1089/cyber.2009.0365