

# KARYA ILMIAH

*by Eky Okviana Armyati*

---

**Submission date:** 13-Oct-2022 12:56PM (UTC+0700)

**Submission ID:** 1924117906

**File name:** Jurnal\_1.pdf (307.63K)

**Word count:** 3063

**Character count:** 17370

### Article journey:

Submitted  
30/08/2020  
Revised  
4/9/2021  
Accepted  
28/10/2021  
Online first  
28/10/2021



## ORIGINAL RESEARCH

# Psychological wellbeing of social media users: A structural equation modeling analysis

Ririn Nasriati<sup>1</sup>, Dian Laila Purwaningroom<sup>2</sup>, Eky Okviana Armyati<sup>3</sup>, Sugeng Mashudi<sup>4</sup>

### Author information

<sup>1,2,3,4</sup>Department of Nursing, Universitas Muhammadiyah Ponorogo, Indonesia

yieyien.nasriati@gmail.com

<https://doi.org/10.31603/nursing.v1i1.3952>

### Abstract

Social media has positive and negative impacts on human life. Even though negative impacts have been identified, positive impacts are rarely studied in the literature. The identification of positive impacts will be useful for preventing health issues among social media users. Therefore, the study is intended to investigate the psychological well-being status of the social media population. The study used a cross-sectional design with a purposive sampling method. The analysis used structural equation modeling to answer the research question of the study. The results showed the psychological well-being of social media users is at normal levels with mild stress. The influencing factors influencing the finding are sex and education. Health promotion is fundamental to improving the outcomes and *vice versa*, decreasing the risk factors of mental disorders. Interventional studies are needed to prevent distress in the future.

**Keywords:** social media; psychological well-being; mental health nurses; nursing assessment; community practice

### Introduction

Restlessness, tension, and sleeping disorder are the main signs of psychological distress (Casagrande et al., 2020; McGinty et al., 2020). Studies highlighted that confusion, worried and concentration difficulties have been considered clinical symptoms of stress (Beard et al., 2020; Viertiö et al., 2019). As already known, the stage of growth and development of adolescence is related to psychological distress (Bernstein & Pfefferbaum, 2018). That distress is caused by situational crises, threats to self-concept, fear of failure, dysfunction of the family system and less information on social media (Barbe & Pennington-Gray, 2018; Roddy et al., 2018; Asibong et al., 2020).

Social media is media allowing one to interact and socialize along with communicating with another person. Recent investigation suggests several approaches to reduce distress as follows relaxation therapy, group support counseling and social media interactions (Dumbala et al., 2020; Shechter et al., 2020; Vidal, Lhaksampa, Miller, & Platt, 2020; McFerran et al., 2018). In response to this health issue, social networking implemented screening and intervention procedures when users show signs of emotional distress or risk of suicide. Also, social media help increase mental health awareness, and health promotion to prevent behavioral problems (Nesi, 2020). Interestingly, social media may predict diseases such as diabetes, anxiety, depression, and psychosis (Merchant et al., 2019). People's personalities, mental states, and health behaviors can be reflected on their social media. The research is since language on Facebook can predict diagnoses in people's health records, revealing new opportunities to personalize care and understand how patients' daily lives relate to their health.

Unfortunately, a study evaluating the psychological status of social media user is limited in the literature as excessive use of social media leads to anxiety, depression, and other psychological disorders. In addition, the symptoms are common among people aged 18-25 years old. A study found that students using Facebook every 15 minutes decrease their academic achievement (Rosen et al., 2011). Social media allows commenting and sharing of information which sometimes leads to distress (Kaplan & Haenlein, 2010). When left untreated, this will reduce the health-related quality of life among social media users. Therefore, the study is intended to investigate the psychological well-being status of the social media population. It is hoped that the finding of the study helps nurses

to provide a comprehensive intervention plan for those having psychological problems in the community. Also, this will encourage the government to elaborate with healthcare professionals to solve the issues.

### Method

This study used a cross-sectional study design as there was no intervention given during the data collection process. The inclusion criteria were male or female living in Ponorogo, students who were active in social media within one year had complaints in psychological aspects and were able to communicate in Bahasa. Meanwhile, the exclusion criteria were students experiencing mental health problems. Purposive sampling methods were used in the study. A total of 110 respondents who met the inclusion criteria were engaged from June 2020 until July 2020.

Depression, Anxiety, Stress Scale 42 (DASS 42) was used to the collected psychological status of the respondents. This instrument has been validated and can be used for the study as the reliability score is 0.9483. Psychological stress scores include Normal = 0-14, mild stress = 15-18, moderate stress = 19-25, severe stress = 26-33, very heavy stress = 34 (Lovibond & Lovibond, 1995). Univariate and bivariate analyses were used to present the characteristics of respondents. Structural Equation Modeling (SEM) and Partial Least Square (PLS) were used to reach the objective of this study.

### Results

The following is the detail of our findings during the study process (**Table 1**). The table concluded that most of the respondents (77.3%) were female, 17-25 years old (85%), in high school (72.7%) and stress levels were normal (50%). All the respondents signed the informed consent before the study outset. The opportunity to participate in the study was announced on social media and they were volunteered. The results showed that demographic factors that did not affect psychological distress were good. Individuals experiencing mild stress increased motivation and performance (Karim, Oyewande, Abdalla, Ehsanullah, & Khan, 2020). The influencing demographic variables are gender and education level of respondents. The gender of the respondents is almost entirely (77.3%) female, the age is in the late adolescence category (85%) and most of the respondents' education (72.7%) is high school.

Variables	Percentage (%)
Sex	
Female	77,3
Male	22,7
Age (Years)	
12-16	1,8
17-25	85
26-35	9,0
36-45	2,7
46-55	0,9
Education	
Elementary School	0,9
Junior High School	3,7
Senior High School	72,7
Bachelor	22,7
Stress Level	
Normal	50
Mild	20
Moderate	19,1
Severe	10,9

**Table 1.** Demographic Data

## **Discussion**

Social media has a significant impact on people's lives, particularly in adolescence. Some of the most popular social media sites currently used by teenagers include YouTube (85%), Instagram (72%), Snapchat (69%), and Facebook (51%). There is a new social media site platform that has been introduced recently, TikTok, which is quickly gaining traction among adolescence. This group is very dependent and influenced by their peers as an important developmental task came from peer relationships and self-identity. The achievement of adolescent developmental tasks can be fulfilled and assisted with social media. This is because in social media there are features and contexts to help adolescents achieve these developmental tasks such as friends who are always available, personal information displayed publicly and permanently, and there is feedback from colleagues that can be measured instantly given in the form of "likes"(Nesi, 2020).

The finding of this study is in line with several previous studies. For example, the presence of friends on social media has a positive impact on adolescent mental health (Wood et al., 2016). Peer friendships become more prominent and characterized by similarities with their peers and social media (Brown & Larson, 2009). The study also reported that positive adjustment during adolescence is caused by the possession of broad social skills and social acceptance (e.g., status and power) (Brown & Larson, 2009). These findings highlight the importance of social circles and opportunities for learning and the provision of positive friendships during different periods. The quality of friendship could protect adolescents from negative influences. In addition, adolescents using social media tend to have lower levels of loneliness and higher social adjustment (Yang & Brown, 2013). Social media may improve relationships and social well-being, as well as increase self-disclosure (Valkenburg & Peter, 2009). Sending electronic messages in online conversations is a means of channeling emotions to cause emotional relief through conversations with peers and this can contribute to the psychological well-being of adolescents (Dolev-Cohen & Barak, 2013). Another factor that contributes to the level of stress is the feeling of well-being when presenting themselves on social media (Kim & Lee, 2011; Qiu et al., 2012). Through this self-presentation, the user gets feedback from fellow social media that impact positive self-identity (Valkenburg & Peter, 2009).

Almost all the social media users (77.3%) in this study were female. The findings in this study differ from previous studies in that adolescent girl, compared to boys, react more emotionally and behaviorally to ambiguous ridicule on Facebook (Barnett et al., 2013). In addition, female students are more likely to become anxious and distressed when using Facebook (Thompson & Loughheed, 2012). However, the study highlighted that the level of stress is in the mild stage influenced by the ability of women to express their emotions. This is in line with the findings that sending electronic messages in online conversations improves emotional relief and psychological well-being (Dolev-Cohen & Barak, 2013).

The results showed that the final education level of the respondents was at the high school stage (72.7%). Respondents with high school education are currently studying in the college or as students. A study stated that when compared to individuals with less education or from secondary school, those with high education, and bachelor's and higher degrees reported better social well-being (Bekalu et al., 2019). The use of social media is positively related to the heterogeneity of student communication networks, which in turn is positively related to social capital and psychological well-being (Kim & Kim, 2017). Also, someone with a higher level of education has a better cognitive ability to deal with stressors (Mandemakers & Monden, 2010). However, there is an intermediate variable that shows that demographic factors affect psychological distress. Demographic factors indirectly affect psychological distress through social media user variables. It is necessary to examine other variables that directly affect psychological distress.

## **Conclusion**

There is no influence of demographics (gender and education) on psychological distress during the study. Social media activity may increase psychological distress. As a result, intensive health education is urgently required to prevent severe distress. Further studies are important to provide interventions in preventing distress among the group. Health policymakers were fundamental to be engaged in the upcoming investigation.

## **Author's declaration**

The authors made substantial contributions to the conception and design of the study and took responsibility for data

analysis, interpretation, and discussion of results. For manuscript preparation, all the authors read and approved the final version of the paper.

#### **Funding**

The study received funding from the Center of Research and Community Empowerment (LPPM) along with the Faculty of Health Science Universitas Muhammadiyah Ponorogo, Indonesia.

#### **Availability of data and materials**

All data are available from the authors.

#### **Competing interests**

The authors declare no competing interest.

#### **Acknowledgment**

The authors thank the Center of Research and Community Empowerment (LPPM) along with the Faculty of Health Science Universitas Muhammadiyah Ponorogo, Indonesia for the research grant (PDP / Penelitian Dosen Pemula) and permissions.

#### **References**

- Asibong, U., Okafor, C. J., Asibong, I., Ayi, E., Omoronyia, O., & Owoidoho, U. (2020). Psychological distress and social media usage: A survey among undergraduates of a university in Calabar, Nigeria. *The Nigerian postgraduate medical journal*, 27(2), 115–121. [https://doi.org/10.4103/npmj.npmj\\_169\\_19](https://doi.org/10.4103/npmj.npmj_169_19)
- Barbe, D., & Pennington-Gray, L. (2018). Using situational crisis communication theory to understand Orlando hotels' Twitter response to three crises in the summer of 2016. *Journal of Hospitality and Tourism Insights*, 1(3), 258-275. <https://doi.org/10.1108/JHTI-02-2018-0009>
- Barnett, M. A., Nichols, M. B., Sonnentag, T. L., & Wadian, T. W. (2013). Factors associated with early adolescents anticipated emotional and behavioral responses to ambiguous teases on Facebook. *Computers in Human Behavior*, 29(6), 2225–2229. <https://doi.org/10.1016/j.chb.2013.05.003>
- Beard, J. S., Beeson, E., MacKay, H., Paternostro, J., Bassett, M., Lin, H., & Harris, M. (2020). P054 what are they worried about?: Findings from the IBD Distress Scale. *Inflammatory Bowel Diseases*, 26(Supplement\_1), S68-S68. <https://doi.org/10.1093/ibd/zaa010.174>
- Bekalu, M. A., McCloud, R. F., & Viswanath, K. (2019). Association of social media use with social well-being, positive mental health, and self-rated health: Disentangling routine use from emotional connection to use. *Health Education and Behavior*, 46(2\_suppl), 69–80. <https://doi.org/10.1177/1090198119863768>
- Bernstein, M., & Pfefferbaum, B. (2018). Posttraumatic Growth as a Response to Natural Disasters in Children and Adolescents. *Current psychiatry reports*, 20(5), 37. <https://doi.org/10.1007/s11920-018-0900-4>
- Brown, B. B., & Larson, J. (2009). Peer Relationships in Adolescence. In *Handbook of Adolescent Psychology*. John Wiley & Sons, Inc. <https://doi.org/10.1002/9780470479193.adlpsy002004>
- Casagrande, M., Favieri, F., Tambelli, R., & Forte, G. (2020). The enemy who sealed the world: effects quarantine due to the COVID-19 on sleep quality, anxiety, and psychological distress in the Italian population. *Sleep medicine*, 75, 12–20. <https://doi.org/10.1016/j.sleep.2020.05.011>
- Dolev-Cohen, M., & Barak, A. (2013). Adolescents' use of Instant Messaging as a means of emotional relief. *Computers in Human Behavior*, 29(1), 58–63. <https://doi.org/10.1016/j.chb.2012.07.016>
- Dumbala, S., Bhargav, H., Satyanarayana, V., Arasappa, R., Varambally, S., Desai, G., & Bangalore, G. N. (2020). Effect of Yoga on Psychological Distress among Women Receiving Treatment for Infertility. *International journal of yoga*, 13(2), 115–119. [https://doi.org/10.4103/ijoy.IJOY\\_34\\_19](https://doi.org/10.4103/ijoy.IJOY_34_19)
- Kaplan, A. M., & Haenlein, M. (2010). Users of the world, unite! The challenges and opportunities of Social Media. *Business Horizons*, 53(1), 59–68. <https://doi.org/10.1016/j.bushor.2009.09.003>
- Vidal, C., Lhaksampa, T., Miller, L., & Platt, R. (2020). Social media use and depression in adolescents: a scoping review. *International review of psychiatry (Abingdon, England)*, 32(3), 235–253. <https://doi.org/10.1080/09540261.2020.1720623>

3

- Kim, B., & Kim, Y. (2017). College students' social media use and communication network heterogeneity: Implications for social capital and subjective well-being. *Computers in Human Behavior*, 73, 620–628. <https://doi.org/10.1016/j.chb.2017.03.033>
- Kim, J., & Lee, J. E. R. (2011). The facebook paths to happiness: Effects of the number of Facebook friends and self-presentation on subjective well-being. *Cyberpsychology, Behavior, and Social Networking*, 14(6), 359–364. <https://doi.org/10.1089/cyber.2010.0374>
- Lovibond, P. F., & Lovibond, S. H. (1995). The structure of negative emotional states: Comparison of the Depression Anxiety Stress Scales (DASS) with the Beck Depression and Anxiety Inventories. *Behaviour Research and Therapy*, 33(3), 335–343. [https://doi.org/10.1016/0005-7967\(94\)00075-U](https://doi.org/10.1016/0005-7967(94)00075-U)
- Mandemakers, J. J., & Monden, C. W. S. (2010). Does education buffer the impact of disability on psychological distress? *Social Science & Medicine*, 71(2), 288–297. <https://doi.org/10.1016/j.socscimed.2010.04.004>
- McFerran, K. S., Hense, C., Koike, A., & Rickwood, D. (2018). Intentional music use to reduce psychological distress in adolescents accessing primary mental health care. *Clinical child psychology and psychiatry*, 23(4), 567–581. <https://doi.org/10.1177/1359104518767231>
- McGinty, E. E., Presskreischer, R., Han, H., & Barry, C. L. (2020). Psychological Distress and Loneliness Reported by US Adults in 2018 and April 2020. *JAMA*, 324(1), 93–94. <https://doi.org/10.1001/jama.2020.9740>
- Merchantid, R. M., Asch, D. A., Crutchleyid, P., Ungar, L. H., Guntukuid, S. C., Eichstaedt, J. C., Hill, S., Padrez, K., Smithid, R. J., & Schwartz, H. A. (2019). Evaluating the predictability of medical conditions from social media posts. *PLOS ONE*, 14(6), 1–12. <https://doi.org/10.1371/journal.pone.0215476>
- Nesi, J. (2020). The Impact of Social Media on Youth Mental Health: Challenges and Opportunities. *North Carolina Medical Journal*, 81(2), 116–121. <https://doi.org/10.18043/ncm.81.2.116>
- Qiu, L., Lin, H., Ka Yee Leung, A., Tov, W., Ka Yee, A., & Leung, A. K. (2012). Putting their Best Foot Forward: Emotional Disclosure on Facebook. *Cyberpsychology, Behavior, and Social Networking*, 15(10), 569–572. <https://doi.org/10.1089/cyber.2012.0200>
- Roddy, C., Rickard, N., Tamplin, J., Lee, Y. C., & Baker, F. A. (2020). Exploring self-concept, wellbeing and distress in therapeutic songwriting participants following acquired brain injury: A case series analysis. *Neuropsychological rehabilitation*, 30(2), 166–186. <https://doi.org/10.1080/09602011.2018.1448288>
- Karim, F., Oyewande, A. A., Abdalla, L. F., Ehsanullah, C. R., & Khan, S. (2020). Social Media Use and Its Connection to Mental Health: A Systematic Review. *Cureus*, 12(6), e8627. <https://doi.org/10.7759/cureus.8627>
- Rosen, L. D., Lim, A. F., Carrier, L. M., & Cheever, N. A. (2011). An Empirical Examination of the Educational Impact of Text Message-Induced Task Switching in the Classroom: Educational Implications and Strategies to Enhance Learning. *Psicologia Educativa*, 17(2), 163–177. <https://doi.org/10.5093/ed2011v17n2a4>
- Shechter, A., Diaz, F., Moise, N., Anstey, D. E., Ye, S., Agarwal, S., Birk, J. L., Brodie, D., Cannone, D. E., Chang, B., Claassen, J., Cornelius, T., Derby, L., Dong, M., Givens, R. C., Hochman, B., Homma, S., Kronish, I. M., Lee, S., Manzano, W., ... Abdalla, M. (2020). Psychological distress, coping behaviors, and preferences for support among New York healthcare workers during the COVID-19 pandemic. *General hospital psychiatry*, 66, 1–8. <https://doi.org/10.1016/j.genhosppsych.2020.06.007>
- Thompson, S. H., & Loughheed, E. (2012). Frazzled by Facebook? An Exploratory Study of Gender Differences in Social Network Communication among Undergraduate Men and Women. *College Student Journal*, 46(1), 88–98. <https://eric.ed.gov/?id=EJ991172>
- Valkenburg, P. M., & Peter, J. (2009). Social consequences of the Internet for adolescents: A decade of research. *Current Directions in Psychological Science*, 18(1), 1–5. <https://doi.org/10.1111/j.1467-8721.2009.01595.x>
- Viertiö, S., Kiviruuu, O., Piirtola, M., Kaprio, J., Korhonen, T., Marttunen, M., & Suvisaari, J. (2019). Gender and psychological distress: Contribution of work-family balance. *European Journal of Public Health*, 29(Supplement 4), ckz187.116. <https://doi.org/10.1093/eurpub/ckz187.116>
- Wood, M. A., Bukowski, W. M., & Lis, E. (2016). The Digital Self: How Social Media serves as a setting that Shapes Youth's emotional experiences. *Adolescent Research Review*, 1(2), 163–173. <https://doi.org/10.1007/s40894-015-0014-8>
- Yang, C. C., & Brown, B. B. (2013). Motives for using Facebook, patterns of Facebook activities, and late adolescents' social adjustment to college. *Journal of youth and adolescence*, 42(3), 403–416. <https://doi.org/10.1007/s10964-012-9836-x>

# KARYA ILMIAH

## ORIGINALITY REPORT

11%

SIMILARITY INDEX

12%

INTERNET SOURCES

12%

PUBLICATIONS

12%

STUDENT PAPERS

## PRIMARY SOURCES

1

[journal.unimma.ac.id](http://journal.unimma.ac.id)

Internet Source

6%

2

Denise Connelly, Melissa Hay, Anna Garnett, Lillian Hung et al. "Video conferencing with residents and families for care planning during COVID-19: experiences in Canadian long-term care", *The Gerontologist*, 2022

Publication

3%

3

Submitted to Chester College of Higher Education

Student Paper

3%

Exclude quotes Off

Exclude matches < 3%

Exclude bibliography Off