

## Reviewing The Role of Gratitude on Student Life Satisfaction in Yogyakarta

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**Abstract:** Yogyakarta is a city of education with many campuses and students spread across public and private campuses. Students learn and adapt to the demands of the campus. This makes some students feel less satisfied with their current lives. The purpose of this study was to review how big the role of gratitude on life satisfaction in students. The population in this study is Psychology students studying at Ahmad Dahlan University. The sample was 180 students of class 2018 obtained by cluster random sampling technique. The scale used is two scales, namely the life satisfaction scale and the gratitude scale. The findings of this study explain that there is a role of gratitude for student life satisfaction. Students who have high gratitude then they also have high life satisfaction. With great gratitude, students are able to feel positive energy from the many pressures that come around them. Students are able to adapt and solve problems through appropriate coping strategies such as strengthening empathy, self-control, gratitude and not imposing their willingness or opinions. Students with satisfied characteristics more easily optimize their potential and abilities, even greater when they are passionate about what they do. This study can be recommended for future researchers, either with student satisfaction or other factors that affect student satisfaction.

**Keywords:** gratitude; life satisfaction;; self efficacy; student psychology

**Abstrak:** Yogyakarta merupakan kota pendidikan dengan banyak kampus dan mahasiswa yang tersebar di berbagai kampus negeri dan swasta. Mahasiswa belajar dan beradaptasi dengan tuntutan kampus. Hal ini membuat sebagian mahasiswa merasa kurang puas dengan kehidupannya saat ini. Tujuan dari penelitian ini adalah untuk meninjau seberapa besar peran kebersyukuran terhadap kepuasan hidup pada mahasiswa. Populasi dalam penelitian ini adalah mahasiswa Psikologi yang berkuliah di Universitas Ahmad Dahlan. Sampel dalam penelitian ini berjumlah 180 mahasiswa angkatan 2018 yang diperoleh dengan teknik cluster random sampling. Skala yang digunakan adalah dua skala, yaitu skala kepuasan hidup dan skala kebersyukuran. Temuan dari penelitian ini menjelaskan bahwa terdapat peran kebersyukuran terhadap kepuasan hidup mahasiswa. Mahasiswa yang memiliki kebersyukuran yang tinggi maka mereka juga memiliki kepuasan hidup yang tinggi. Dengan rasa syukur yang tinggi, mahasiswa mampu merasakan energi positif dari banyaknya tekanan yang datang di sekitarnya. Mahasiswa mampu beradaptasi dan menyelesaikan masalah melalui strategi coping yang tepat seperti memperkuat empati, kontrol diri, rasa syukur dan tidak memaksakan kehendak atau pendapatnya. Mahasiswa dengan karakteristik puas lebih mudah mengoptimalkan potensi dan kemampuan yang dimiliki, bahkan lebih besar lagi ketika mereka memiliki passion terhadap apa yang mereka kerjakan. Penelitian ini dapat direkomendasikan untuk peneliti selanjutnya, baik dengan kepuasan mahasiswa atau faktor-faktor lain yang mempengaruhi kepuasan mahasiswa

**Kata kunci:** kebersyukuran kepuasan hidup;; keyakinan diri; mahasiswa psikologi

### INTRODUCTION

The concept of life satisfaction encompasses an individual's cognitive assessment, as outlined by Lewis et al. (2011). Such as making judgments from information processing in the brain so as to fulfill their sense of life satisfaction. In addition to this, Khosravi et al. (2013) provide another perspective, defining life satisfaction as the fulfillment and satisfaction of wants,

needs, or tastes. This definition implies that life satisfaction is an outcome influenced by various positive life events, making it an intriguing and pertinent subject for discussion. Essentially, a life filled with happiness not only implies the ability to combat sadness and pain but also has far-reaching impacts on different facets of an individual's life. In the case of adolescents, studies by Jiang et al. (2016) and Jiang et al (2019) highlight the widespread positive effects of high life satisfaction, including increased coping competence, resilience, academic success, and psychological adjustment. Moreover, individuals with high life satisfaction as Doğan (2014) suggests, have more successful interpersonal connections, live longer lives, have better financial outcomes, and have better coping strategies for dealing with disease. This study clarifies the relationship between life satisfaction and peer relationships, academic performance, mental health, and academic motivation in adolescents, highlighting the need of researching life satisfaction in this age group. The relevance of this exploration is further underscored by the observed decline in the level of satisfaction within Indonesian society, as evidenced by data from the World Report Happiness spanning 2015-2018. Life satisfaction emerges as a critical variable deserving careful observation due to its multifaceted impact on various aspects of an individual's life.

However, a lot of people were generally unable to experience life's pleasures, including misery. According to the findings of the King et al. (2014) study, high levels of perceived stress and a lack of empathy or compassion for others were strongly associated with unhappy people. Teenage unhappiness, particularly among students, was characterized by their stress in response to cultural differences between college and home environments (Stephens et al., 2019); financial tasks related to academics (Engle & Tinto, 2008); and risks and uncertainties regarding the future (Walton & Cohen, 2003). Even this discontent causes individuals to experience depressive symptoms, such as sadness and daydreaming, which negatively impacts their ability to learn, interact with others, and go about their daily lives (Porter, 2018). Students in a study by Novianti and Alfiasari (2017) stated that they were not content to very unsatisfied with the percentage (10.8%), the enjoyment they experienced (6.9%), and their social lives (2.9%). having several student subjects ranging in age from eighteen to twenty-three.

The study by Fernández-Baena et al., (2014) explained that adolescents were stressed when they were anxious to go to the doctor, were afraid to be alone at home, socialize with family, worry about romantic relationships with their partners and uncertainty about the future. . Adolescents were not only exposed to stress, but their life satisfaction was decreasing. Life satisfaction can be said to decrease because individuals felt dissatisfaction and discomfort with their lives (Orben et al., 2022). The impact of decreased life dissatisfaction on students such as decreased self-competence, self-autonomy and increasing depression Individuals assess their life satisfaction from several factors such as personal factors, environment and individual sources of information (Diener et al., 2013).

In the reality, life satisfaction was not only seen from the point of view of factors but more that influence such as demographic factors, family, self-assessment and social environment (Fang et al., 2022). In fact, the results of the study by Wood et al., (2008) show that grateful behavior was a factor that affected life satisfaction. Gratitude encourages individuals to feel happier in their lives. Froh, et. al (2009) conducted a study with results stating that gratitude had a positive correlation with one's life satisfaction, such as optimism, and emotional control. Grateful can be seen from positive emotions, if it increased, the attitude of forgiving, supporting, and motivating the people around them would also had an effect on interpersonal relationships. According to Shahmoradi et al., (2014) life satisfaction was peace of mind and a comprehensive assessment of life which was seen as a form of cognitive and emotional evaluation.

Early adulthood problems were more complex than adolescent problems. It was mandatory for students to graduate, find employment, get married, and so on right away. That was the reason they felt less appreciative and less content with their accomplishments. Thus, that had an impact on life satisfaction. Among the considerations was appreciation. Those who are grateful for their lives would feel better about living in general and would be more hopeful about creating a brighter

future for themselves and others. It indicated that personal evaluations of life happiness were positively impacted by thankfulness.

Much of the information regarding student satisfaction was provided in earlier, more academic research. Furthermore, this study's explanation of the goal of improving one's life as well as its current state, history, future, and assessment made the student satisfaction even more distinctive. Despite the rigor and urgency of the research, this study aimed to carry out an empirical investigation under the heading **Reviewing The Role Of Gratitude On Student Life Satisfaction In Yogyakarta**

## **METHOD**

### **Research design**

The purpose of this study had been to describe a study with a quantitative setting. With quantitative studies, student satisfaction rates can be calculated and justified. This study did not use observations and interviews but focused more on descriptive findings and more measurable statistical data. Researchers believed that this quantitative setting could provide a statistically clear picture of student satisfaction and gratitude (Gogtay & Thatte, 2017)

### **Population and sample of the research**

The target population that the study aims to investigate or treat is known as the population of interest. It is frequently inappropriate or impractical to enroll every member of the population of interest in clinical research investigations. Rather, to include in their study, researchers will select a sample from the population of interest (Majid, 2018). The population in this study were students of the Psychology faculty at University X. From the population, 180 people were selected as samples. The cluster sampling technique was a regional sampling technique used to determine the sample if the object to be studied or the data source was very broad, for example the population of a country, province or district so as to help researchers find an appropriate sample from the number of students at University X.

### **Data Collection Tool**

To collect heterogeneous data from this study, researchers needed to use psychological tools. In this case, the psychological tool in question was a scale. Researchers used two different scales. The first was the satisfaction scale and the second was the gratitude scale.

#### **Satisfaction Scale**

This scale consisted of five aspects consisting of 35 items with the highest index of 0.824 and the lowest index value of 0.437. The reliability of the satisfaction scale was 0.963. The first aspect had 7 items that were able to represent the desire to change lives. Then, the second aspect had 7 items that were able to represent satisfaction with current life. Furthermore, the third aspect had 7 items that represent past life satisfaction. In addition, the fourth aspect contained 7 items that entered into satisfaction with life in the future. In the last aspect, the individual's assessment of his life consisted of 7 items.

#### **Gratitude Scale**

This scale consisted of 36 items. The reliability was 0.954 with the highest index of 0.750 and the lowest of 0.271. These items were divided into three main aspects, namely cognitive, social and positive emotions. All aspects had 12 items consisting of 6 favorable items and 6 unfavorable items.

#### **Data analysis**

The next step after coding the data was data analysis. Analysis of the data used was product moment correlation. Because the researchers used parametric statistical data. Data analysis was conducted to find the relationship between gratitude and student life satisfaction. The coefficient

to be achieved was the correlation coefficient. So, it can be concluded that this study analyzed the data through the SPSS version 20 program with the product moment correlation test.

## RESULT AND DISCUSSION

The first finding in this study is the statistical value then conveys the dominant category that each student has per variable with the aim of describing the construct of the variable within the participant. then the third step is hypothesis testing where the results of this study show that there is an influence of gratitude on student life satisfaction. This is a finding that is in accordance with the hypothesis of this study. The results of this study involved the categorization of subjects into high, medium, and low levels for each variable. First, considering the life satisfaction variable, the categorization results revealed that out of the entire sample, 13 students, accounting for 16%, exhibited high life satisfaction, 60 students, constituting 75%, fell into the medium life satisfaction category, and 7 students, representing 9%, were categorized with low life satisfaction. Moving on to the gratitude variable, the findings indicated that 17 students, comprising 21%, demonstrated high gratitude, 52 students, making up 65%, showed medium gratitude, and 11 students, amounting to 14%, displayed low gratitude.

The subsequent discovery involved hypothesis testing, utilizing the r-test to examine the relationship between the independent variable (gratitude) and the dependent variable (life satisfaction). This relationship is detailed in the table below: [proceed to include the specific details from the table].

**Table 1. Hypothesis Test Results**

Variabel	r	Significant (p)	Information
Life satisfaction with gratitude	0,862	0,000	Accepted Hypothesis

The table above indicates that the product moment (r) for the relationship between life satisfaction and gratitude is 0.862, with a probability (p) of 0.000 ( $p < 0.01$ ). This signifies that the analysis results support the researcher's hypothesis, confirming a highly significant positive relationship between life satisfaction and gratitude among students at the Faculty of Psychology, University X. In essence, the higher the gratitude, the higher the life satisfaction, and conversely, lower gratitude correlates with lower life satisfaction. These study findings align with research by Wang et al. (2015), affirming that individuals with a heightened sense of gratitude experience elevated life satisfaction, maintain harmonious relationships, and exhibit reduced levels of stress and depression—mirroring the present study's conclusion that gratitude contributes substantially to students' life satisfaction by filling voids and fostering positive thinking. Overall, the research hypothesis has been successfully substantiated. The findings emphasize an optimal association between life satisfaction and gratitude for students, indicating that students enhance their life satisfaction through optimal reinforcement of gratitude. This study, focusing on the relationship between gratitude and life satisfaction in students at University X, reveals a correlation of 0.862, with a significance level (p) of 0.000 ( $p < 0.01$ ).

Previous research analyses consistently show a positive correlation between life satisfaction and gratitude (Kong et al., 2015), reinforcing gratitude's role as a reliable predictor of life satisfaction. Gratitude emerges as a key factor in enhancing individual mental and physical development, as noted by Szczesniak and Timoszyk-Tomczak (2018). The current study supports this perspective, highlighting the presence of gratitude as a means to elevate student life satisfaction.

Grateful students tend to engage in meaningful social interactions, demonstrating empathy, forgiveness, and support (McCullough et al., 2002). Providing positive feedback contributes to a sense of comfort, reducing estrangement in relationships and fostering better social interactions, satisfaction, and stress coping abilities (Lyubomirsky et al., 2005). The study suggests that individuals satisfied with their lives tend to be more grateful, spiritually prosperous, and experience decreased negative emotions such as depression, anxiety, stress, and envy, consistent with findings reported for college students (Ju-Yeon et al., 2018).

This empirical study, uniquely focusing on student life satisfaction and gratitude in Yogyakarta, offers insights into the impact of spirituality, particularly Islam, prevalent in the region with a Muslim majority. The research aligns with Keivan et al.'s (2019) observation that religious individuals, supported by a strong faith, show resilience against pain. This parallels the present study's findings that individuals embracing Islam experience less pain, sadness, and prolonged depression due to their strong religious foundation. Religion and spirituality emerge as glue, promoting positive behavior, contentment, and a heightened sense of gratitude, fostering good social relationships and receiving God's blessings (Ru'ya et al., 2020).

The study further affirms the strong relationship between gratitude and individuals' quality of life, a sentiment echoed in Wood et al.'s (2010) research. This aligns with the present research, reinforcing the interconnectedness of life satisfaction and gratitude. Students demonstrate a markedly better quality of life compared to children, differing from previous studies indicating decreased life satisfaction and increased psychopathological behavior in children and adolescents (Huebner, ahin Baltaci & Karataş, 2004; 2015). The study concludes that students exhibit greater and distinct life satisfaction, with resilience and reduced stress. Severe psychological disorders are rare among students, with positive emotions such as happiness, joy, optimism, and gratitude prevalent.

Conversely, students dissatisfied with their lives, as indicated in the findings of Bassam and Hosis (2021), express discontent with various aspects, including online learning during the Covid-19 period. Additional research by Zhang et al. (2021) highlights issues such as morning fatigue, decreased sleep quality, and unpleasant mood, contributing to students' dissatisfaction. Despite challenges such as limited rest, numerous assignments, and pressure from various sources, students maintain a positive spirit and intent to enjoy life. This diverges from previous research findings, suggesting that student satisfaction is extensive, allowing them to find satisfaction in various aspects of life.

Despite its strengths, the study has limitations, including challenges in finding suitable subjects, limited interview time, and difficulties in understanding and verifying information due to the subject's comprehension of the scale. Gesture observation was also omitted. Future research should delve into more theoretical studies, explore additional independent variables, and consider qualitative and indigenous research methods to comprehensively understand the phenomenon of student satisfaction.

## CONCLUSION AND SUGGESTIONS

This study's findings might be summed up as follows: thankfulness affects students' life satisfaction, or put another way, gratitude can make people happier. When pupils are able to express gratitude, they think that their circumstances are not as horrible as those of others and that there are those who suffer worse fates than them. Through receiving several blessings and acts of generosity from others, kids interpret their lives. This suggests that kids have the aspiration to have a great future and should consider all of their options. In order to avoid making poor decisions or going against the rules, students consider the effects of every action they will do. Students better equip themselves with capacity building and better prepare themselves for good activities.

## REFERENCES

- Bassam, S. E. A., & Hosis, K. F. Al. (2021). Satisfaction of Students about Educational Process through E-Learning during COVID-19 Pandemic at Qassim University, KSA. *Ijicc.Net*, 15(7), 988–999.  
[https://www.ijicc.net/images/Vol\\_15/Iss\\_7/15758\\_Bassam\\_2021\\_E1\\_R.pdf](https://www.ijicc.net/images/Vol_15/Iss_7/15758_Bassam_2021_E1_R.pdf)
- Diener, E., Inglehart, R., & Tay, L. (2013). Theory and validity of life satisfaction scales. *Social Indicators Research*, 112(3), 497–527.
- Doğan, U. (2014). Examining the Factors Contributing to Students' Life Satisfaction. *Educational Sciences: Theory & Practice*, 14(6), 2121–2128.  
<https://doi.org/10.12738/estp.2014.6.2058>
- Engle, J., & Tinto, V. (2008). Moving beyond access: College success for low-income, first-generation students. The Pell Institute for the Study of Opportunity in Higher Education, 1–38.
- Fang, L., Yuen, M., Fung, E., Zhang, J., Chan, S., & Wu, F. (2022). Life Satisfaction of Gifted and Average Adolescents in Hong Kong: Validation of the Chinese Brief Multidimensional Students' Life Satisfaction Scale (BMSLSS). *Applied Research in Quality of Life*, 17(2), 751–761. <https://doi.org/10.1007/s11482-021-09932-8>
- Fernández-Baena, F. J., Trianes, M. V., Escobar, M., Blanca, M. J., & Muñoz, Á. M. (2014). Daily Stressors in Primary Education. *Canadian Journal of School Psychology*, 30(1).  
<https://doi.org/10.1177/0829573514548388>
- Fiorentin, L., Cordeiro, M. F., Cetolin, S. F., Marmitt, L. P., & Beltrame, V. (2022). Impacts of covid-19 social distancing on the sleep of health students. *International Journal of Advanced Engineering Research and Science*, 9(7), 025–034.  
<https://doi.org/10.22161/ijaers.97.4>
- Huebner, E. S. (2004). Research on Assessment of Life Satisfaction of Children and Adolescents. *Social Indicators Research*.  
<https://doi.org/10.1023/B:SOCI.0000007497.57754.e3>
- Jiang, X., Fang, L., & Lyons, M. D. (2019). Is Life Satisfaction an Antecedent to Coping Behaviors for Adolescents? *Journal of Youth and Adolescence*, 48(11), 2292–2306.  
<https://doi.org/10.1007/s10964-019-01136-6>
- Jiang, X., Lyons, M. D., & Huebner, E. S. (2016). An examination of the reciprocal relations between life satisfaction and social problem solving in early adolescents. *Journal of Adolescence*, 53(December), 141–151. <https://doi.org/10.1016/j.adolescence.2016.09.004>
- Ju-Yeon, L., Seon-Young, K., Kyung-Yeol, B., Jae-Min, K., Ii-Seon, S., Jin-Sang, Y., & Sung-Wah, K. (2018). The association of gratitude with perceived stress and burnout among male firefighters in Korea. *Personality and Individual Differences*, 123, 205–208.  
<https://doi.org/10.1016/j.paid.2017.11.010>
- Keivan, N., Daryabeigi, R., & Alimohammadi, N. (2019). Effects of religious and spiritual care on burn patients' pain intensity and satisfaction with pain control during dressing changes. *Burns*, 45(7), 1605–1613. <https://doi.org/10.1016/j.burns.2019.07.001>
- Khosravi, A. A., Kambiz, P., Roozegar, A., & Sohrabifard, N. (2013). Determination of Factors Affecting Student Satisfaction of Islamic Azad University. *Procedia Social and Behavioral Sciences*, 84, 579–583. <https://doi.org/doi:10.1016/j.sbspro.2013.06.607>
- King, K. A., Vidourek, R. A., Merianos, A. L., & Singh, M. (2014). A study of stress, social support, and perceived happiness among college students. *Üniversite Öğrencileri Arasında Stres , Sosyal Destek ve Algılanan Mutluluk Üzerine Bir*, 2(2), 132–144.
- Kong, F., Chen, Z., Xue, S., Wang, X., & Liu, J. (2015). Mother's but not father's education predicts general fluid intelligence in emerging adulthood: Behavioral and neuroanatomical evidence. *Human Brain Mapping*, 36(11), 4582–4591.  
<https://doi.org/10.1002/hbm.22934>
- Lambert, N. M., Fincham, F. D., Stillman, T. F., & Dean, L. R. (2009). More gratitude, less

- materialism: The mediating role of life satisfaction. *Journal of Positive Psychology*, 4(1), 32–42. <https://doi.org/10.1080/17439760802216311>
- Lewis, A. D., Huebner, E. S., Malone, P. S., & Valois, R. F. (2011). Life Satisfaction and Student Engagement in Adolescents. *Journal of Youth and Adolescence*, 40(3), 249–262. <https://doi.org/10.1007/s10964-010-9517-6>
- Lyubomirsky, A., Sheldon, S., & Schkade, K. M. (2005). Pursuing happiness: The architecture of sustainable change. *Journal of Personality and Social Psychology*, 89(2), 111–131.
- McCullough, M. E., Emmons, R. A., & Tsang, J. A. (2002). The grateful disposition: A conceptual and empirical topography. *Journal of Personality and Social Psychology*, 82(1), 112–127. <https://doi.org/10.1037/0022-3514.82.1.112>
- Novianti, D. S., & Alfiasari, A. (2017). Kepuasan Hidup Mahasiswa Tingkat Pertama: Kaitannya dengan Karakter Mahasiswa dan Gaya Pengasuhan Orang Tua. *Jurnal Ilmu Keluarga Dan Konsumen*, 10(1), 13–23. <https://doi.org/10.24156/jikk.2017.10.1.13>
- Gogtay, N., & Thatte, U. (2017). Principles of Correlation Analysis. *Journal of The Association of Physicians of India*, 65.
- Majid, U. (2018). Research Fundamentals: Study Design, Population, and Sample Size. *Undergraduate Research in Natural and Clinical Science and Technology (URNCTST) Journal*, 2(1), 1–7. <https://doi.org/10.26685/urnctst.16>
- Orben, A., Lucas, R. E., Fuhrmann, D., & Kievit, R. A. (2022). Trajectories of adolescent life satisfaction. *Royal Society Open Science*, 9(8), 211808.
- Porter, S. (2018). A Descriptive Study of Post-Secondary Student Mental Health Crises (2013–2016). 21(3). [https://www.cacuss.ca/files/Resources/PSSMH\\_GuideToSystemicApproach\\_CACUSS-Ru'iyah](https://www.cacuss.ca/files/Resources/PSSMH_GuideToSystemicApproach_CACUSS-Ru'iyah)
- Ru'iyah, S., Diponegoro, A. M., & Kistoro, H. C. A. (2020). Religiosity, Forgiveness, and Subjective Well-Being Among Adolescents in Yogyakarta. *International Journal of Advanced Science and Technology*, 29(4), 2918–2926. <https://www.researchgate.net/publication/343888596>
- Şahin Baltacı, H., & Karataş, Z. (2015). Perceived social support, depression and life satisfaction as the predictor of the resilience of secondary school students: The case of Burdur. *Eurasian Journal of Educational Research*, 202(60), 111–130. <https://doi.org/10.14689/ejer.2015.60.7>
- Shahmoradi, G., Maleki, E., Maleki, T., Shahmoradi, Z., & Fomany, G. H. E. (2014). Relationship between Marital Satisfaction and Personality Characteristics on the basis of Myers-Briggs Inventory and Big Five Questionnaire. *Journal of Educational and Management Studies*, 4(4), 787–790. [www.science-line.com](http://www.science-line.com)
- Stephens, N. M., Townsend, S. S. M., & Dittmann, A. G. (2019). Social-Class Disparities in Higher Education and Professional Workplaces: The Role of Cultural Mismatch. *Current Directions in Psychological Science*, 28(1), 67–73. <https://doi.org/10.1177/0963721418806506>
- Szczesniak, M., & Timoszyk-Tomczak, C. (2018). A time for being thankful: Balanced time perspective and gratitude. *Studia Psychologica*, 60(3), 150–166. <https://doi.org/10.21909/sp.2018.03.759>
- Vollmann, M., Sprang, S., & van den Brink, F. (2019). Adult attachment and relationship satisfaction: The mediating role of gratitude toward the partner. *Journal of Social and Personal Relationships*, 36(11–12), 3875–3886. <https://doi.org/10.1177/0265407519841712>
- Walton, G. M., & Cohen, G. L. (2003). Stereotype lift. *Journal of Experimental Social Psychology*, 39(5), 456–467. [https://doi.org/10.1016/S0022-1031\(03\)00019-2](https://doi.org/10.1016/S0022-1031(03)00019-2)
- Wang, D., Wang, Y. C., & Tudge, J. R. H. (2015). Expressions of Gratitude in Children and Adolescents: Insights From China and the United States. *Journal of Cross-Cultural Psychology*, 46(8), 1039–1058. <https://doi.org/10.1177/0022022115594140>
- Wood, A. M., Froh, J. J., & Geraghty, A. W. A. (2010). Gratitude and well-being: A review and

theoretical integration. *Clinical Psychology Review*, 30(7), 890–905.  
<https://doi.org/10.1016/j.cpr.2010.03.005>

- Wood, A. M., Joseph, S., & Maltby, J. (2008). Gratitude uniquely predicts satisfaction with life: Incremental validity above the domains and facets of the five factor model. *Personality and Individual Differences*, 45(1), 49–54. <https://doi.org/10.1016/j.paid.2008.02.019>
- Zhang, Y., Wang, D., Zhao, J., CHEN, X. Y., Chen, H., Ma, Z., Yu, Q., Wang, T., Chen, Z., Jiang, J., Zhu, Z., Huang, S., Fan, F., & Liu, X. (2021). Insomnia and other sleep-related problems during the remission period of the COVID-19 pandemic: A large-scale survey among college students in China. *Psychiatry Research*, 304, 114153.  
<https://doi.org/10.1016/j.psychres.2021.114153>