Prosocial behavior in adolescents: A systematic Literature Review

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Abstarct

A systematic literature review was conducted to understand adolescents' prosocial behavior. Using the PRISMA approach and involving 38 Scopus databases, research results from various contexts show that prosocial behavior has a significant positive impact. Content analysis using VosViewer revealed social influence, cognitive development, moral socialization, empathy, and self-regulation as factors related to adolescent prosocial behavior. Longitudinal studies highlight gender differences in the development of adolescent prosocial behavior. Empathic attention is important in the relationship between the ability to take perspective and prosocial behavior. The role of the family environment is also important in shaping adolescent prosocial behavior. Positive parenting, high acceptance, and positive interactions between parents and children are associated with increased prosocial behavior. Social relationships and friendships influence the development of prosocial behavior. Adolescents with high prosocial behavior have a higher quality of friendship and well-being. A holistic approach involving the family, school, and community environment is needed to improve adolescent prosocial behavior. Programs and interventions should consider gender differences, cognitive and social development, social environment, and the quality of interpersonal relationships. The findings provide valuable insights into prosocial behavior in adolescents and the importance of factors that influence it.

Kata kunci: systematic literature review; adolescent prosocial behavior, forming factors

Introduction

Prosocial behavior, which refers to voluntary actions aimed at benefiting others, plays an important role in adolescent development and overall well-being (Eisenberg & Fabes, 1998; Padilla-Walker & Carlo, 2014; Putra et al., 2021; Xiao et al., 2019). In educational psychology, it is critical to understand the factors that influence prosocial behavior in adolescents to design effective interventions and strategies that lead to positive social development in educational settings. Prosocial adolescent behavior includes helping, sharing, cooperating, and showing empathy for others and efforts to suppress aggressive behavior (Greitemeyer, 2011).

One of the theoretical perspectives widely used in studying adolescent prosocial behavior is the social-cognitive domain theory (Eisenberg & Fabes, 1998). According to this theory, adolescents' prosocial behavior is influenced by their understanding of social norms, moral values, and the consequences of their actions. Social-cognitive domain theory emphasizes the role of cognitive processes, including perspective-taking, moral reasoning, and empathy, in shaping prosocial behavior. Perspective-taking involves the ability to consider the viewpoints and emotions of others, whereas moral reasoning involves the ability to judge right from wrong. Research (Carlo et al., 2015) supports this theory, highlighting the positive relationship between cognitive skills and adolescent prosocial behavior.

The empathy-altruism hypothesis is another influential theoretical framework in prosocial behavior(Batson et al., 1981). This hypothesis suggests that individuals are motivated to help others because of genuine care and empathy. Empathy, which involves understanding and sharing the emotional experiences of others, plays a central role in the empathy-altruism hypothesis. Teens with higher levels of empathy are more likely to engage in prosocial behaviors because of their increased emotional response and concern for others (Eisenberg et al., 2010). Research (Espino-Díaz et al., 2021) Supports this hypothesis, showing a positive relationship between emotional intelligence and adolescents' prosocial behavior.

Family environment and parenting practices are important factors in shaping adolescent prosocial behavior. The framework of Baumrind's parenting style (Baumrind, 1967) provides insight into how different parenting styles can influence a teen's prosocial behavior. Authoritative parenting, characterized by high levels of warmth, responsiveness, and reasonable boundary-setting, has been consistently associated with higher levels of prosocial behavior in adolescents (Padilla-Walker & Carlo, 2014). On the other hand, authoritarian or negligent parenting styles have been associated with lower levels of prosocial behavior.

The school context also plays an important role in promoting prosocial behavior in adolescents. School-based programs focusing on social-emotional learning, character education, and a positive school climate have increased prosocial behavior (Kadafi et al., 2021). The school context also plays an important role in promoting prosocial behavior in adolescents. School-based programs focusing on social-emotional learning, character education, and a positive school climate have increased prosocial behavior (Longobardi et al., 2021). This includes the support of parents in the educational process (Pfeiffer et al., 2016).

Peer relationships are also influential in shaping prosocial behavior during adolescence. Peers are important socializing agents and provide opportunities for adolescents to learn and practice prosocial behaviors. Peer acceptance, friendships, and social norms within peer groups can influence adolescent involvement in prosocial behavior (Van Ryzin et al., 2009; Zhang et al., 2020)). Social learning theory(Bandura, 1971) shows that adolescents observe and imitate their peers' prosocial behavior, which leads to developing and reinforcing their prosocial behavior. In addition, peer reinforcement and peer approval can significantly motivate adolescents to engage in prosocial actions (Schoeps et al., 2020).

School climate and culture play an important role in fostering prosocial behavior among adolescents. Studies have shown that schools prioritizing inclusivity, respect, and empathy have higher rates of prosocial behavior among students (Zhang et al., 2020). In such an environment, students feel valued, supported, and connected, which promotes positive social interaction and prosocial behavior. In addition, interventions that promote empathy, conflict resolution skills, and cooperation in school settings have improved prosocial behavior among adolescents (Durlak et al., 2011).

Cultural factors also contribute to the understanding of prosocial behavior in adolescence. Cultural values, norms, and beliefs influence the manifestation and expression of prosocial behavior among adolescents. Collectivistic cultures, which emphasize interdependence and group harmony, tend to promote prosocial behavior by prioritizing the well-being of others and fostering a sense of communal responsibility (Chen et al., 2015). Conversely, individualistic cultures, which emphasize independence and personal purpose, may place less emphasis on prosocial behavior.

Technology and social media use have also emerged as relevant areas of study regarding prosocial behavior among adolescents. The digital age has created new opportunities and challenges for prosocial behavior (Lysenstøen et al., 2021). Technology and social media use have also emerged as relevant areas of study regarding prosocial behavior among adolescents. The digital age has created new opportunities and challenges for prosocial behavior (Paulin et al., 2014). However, the online environment also presents risks, including cyberbullying and spreading harmful content, which can undermine prosocial behavior and well-being among adolescents (Yang, 2021). Understanding how technology influences the expression and development of prosocial behavior is essential in today's digital society.

Considering the complexity of the prosocial supporting factors above, this study aims to systematically examine the development of research related to prosocial supporting factors for adolescents. The research

questions were set as follows: 1) What is the development trend of adolescent prosocial research?; 2) What are the findings of variations in factors that influence prosocial behavior in adolescents? Through a systematic literature review of prosocial behavior in adolescence in the context of educational psychology, it is expected to obtain a comprehensive understanding of the factors that influence prosocial behavior in educational development. This knowledge is expected to inform the development and implementation of effective interventions, programs, and policies to promote prosocial behavior among adolescents. This study is presented in 3 (three) parts, namely the background of the study as described in this section. The second part is the method, which contains the options used to carry out systematic literature studies, and the third part is a discussion accompanied by conclusions.

Methods

This Systematic Literature Review (SLR) uses the PRISMA (Preferred Reporting Items for Systematic Reviews and Meta-Analyses) approach (Pati & Lorusso, 2018), which has been widely utilized for the benefit of social literature studies. The stages taken in this approach are: 1) setting study objectives; 2) identifying concepts; 3) establishing search terminology; 4) assigning a data source; 5) conducting searches and data collection; 6) selecting data; 7) establishing inclusion and exclusion criteria; and 8) analyze data. Goal-setting activities have been conveyed in the background section to examine prosocial behavior research development trends and explore the factors forming prosocial behavior. The prosocial concept used as an umbrella for research is voluntary behavior that shows support for efforts to provide benefits and welfare for others (Eisenberg & Fabes, 1998; Padilla-Walker & Carlo, 2014; Putra et al., 2021; Xiao et al., 2019).

Data search activities are defined using the terminology: adolescence prosocial behavior sourced from 2018-2022 Publish or Peris database. The search was conducted using Publish or Perish software with the syntax "prosocial behavior adolescence"; and "Adolescence Prosocial Behavior" as part of the metadata title. This activity collected metadata that will be qualitatively selected for use at the content analysis stage. The selection of data was determined by the criteria of articles published in the Scopus database, with the main content of assessing the factors forming adolescent prosocial behavior. The next stage is to analyze data with a bibliometrics approach and mapping with VosViewer software to answer study question 1 and content analysis to answer research question 2.

Findings dan Discussion

Bibliometrics

The collected metadata has shown the development of research on researchers' prosocial behavior across institutions, professions, and countries. From the Publish or Perish database, it is known that there were 38 published papers in the 2018-2022 period, with an average number of authors of 1 person per paper. The number of citations was 698, with an average of 139.6 citations per year, or equivalent to 18.37 citations per paper. The H-index in this metadata is 14, and the g-index is 26. The paper with the highest citation is "Prosocial Behavior in Adolescence: Gender Differences in Development and Links with Empathy" (Van der Graaff et al., 2018), with 220 citations published in the Journal of Youth and Adolescence. Details of the data are presented in Figure 1.

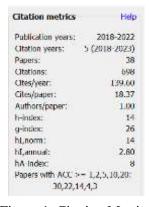


Figure 1. Citation Metrics

This study processes metadata to describe trends by comparing the development of publications and citations in 2018-2022. As presented in Figure 2, it is known that in that year, there were fluctuations in publications on this theme. 2019 and 2021 are the years with the lowest publications in this term. Interestingly, if you pay attention to the number of citations, publications in 2020 significantly increased the number of citations compared to 2019, 2021, and 2022. Article (M. K. Memmott-Elison et al., 2020) This study processes metadata to describe trends by comparing the development of publications and citations in 2018-2022. As presented in Figure 2, it is known that in that year, there were fluctuations in publications on this theme. 2019 and 2021 are the years with the lowest publications in this term. Interestingly, if you pay attention to the number of citations, publications in 2020 significantly increased the number of citations compared to 2019, 2021, and 2022. Article.

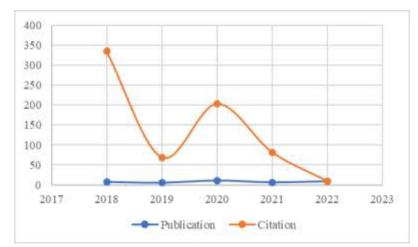


Figure 2. Trends in the Number of Publications and Citations 2018-2022

Content Analysis

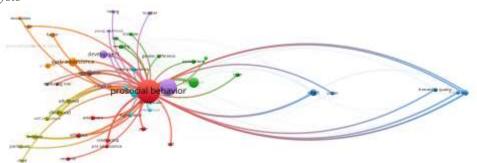


Figure 3. Map of publication networks on VosViewer

Content analysis is carried out with the help of VosViewer to obtain images and topic mapping on the metadata that has been collected. This activity is done by inputting a proxy. RIS into the software to present a map of the relationship between metadata to describe the phenomenon. Figure 3 provides an overview of the relationship obtained information that there are 8 (eight) clusters of prosocial behavior publication relationships, namely: 1) cluster 1: adolescents, influence, mediating role, peer, pre-adolescence, relationship, research, and self; 2) cluster 2: associations, behavior, empathy, gender differences, improvement; 3) cluster 3: influence, friendship, friendship quality, mental health, mix method, multidimensional, victim and wellbeing; 4) cluster 4: adulthood, child, participant, relation, self-regulation, and transition; 5) cluster 5: adolescence, age, development, number, timing, trajectory, and young adulthood; 6) cluster 6: evidence, higher level, intervention, late adolescence, lower level, and study; 7) cluster 7: early adolescence, factor, problem, prosocial behavior tendency, role, and social class; and 8) cluster 8: aggression and form.

Furthermore, this SLR qualitatively examines the content in the metadata that we find with the procedures that have been submitted. Longitudinal studies (Van der Graaff et al., 2018) Investigate the development of

prosocial behavior in adolescents and examine its relationship with empathic attention and perspective. Participants in the study were 497 adolescents (average age t1=13.03 years, 43% female) who reported prosocial behavior, empathic attention, and perspective-taking ability. The results showed significant gender differences in the development of prosocial behavior. In adolescent boys, levels of prosocial behavior stabilize until age 14, then increase until age 17, and decrease slightly after that. In adolescent girls, prosocial behavior increases until age 16 and decreases slightly.

Regarding longitudinal relationships, empathic attention is consistently associated with subsequent prosocial behavior. However, the ability to take perspective is only indirectly linked to prosocial behavior through its influence on empathic attention. Influence tests show earlier prosocial behavior predicts later empathy traits, but only in adolescent girls. These findings support theories of cognitive development and moral socialization in prosocial development, as well as the leading role of moral emotions in predicting prosocial behavior. The findings provide information for strategies to encourage prosocial behavior by emphasizing moral emotions rather than moral cognition during adolescence.

A study (M. Memmott-Elison et al., 2020) investigated the interrelationship between intentional self-regulation and prosocial behavior toward strangers aged 12 to 18 based on the Positive Youth Development (PYD) theory and related empirical research. Participants in the study were 500 adolescents (52% female, 77% European American; age at Time 1 = 12 years, Time 2 = 14 years, Time 3 = 16 years, Time 4 = 18 years) from the northwestern United States. Teens filled out self-reports of intentional self-regulation and prosocial behavior toward strangers four times. The cross-lagged panel model with random intercept (RICLPM) was used to assess bidirectionality without obscuring intra- and inter-individual variability. The results of this study suggest that deliberate self-regulation and prosocial behavior towards strangers have a reciprocal relationship in early adolescence (i.e., from 12 to 14 years of age). In mid-to-late adolescence (i.e., from 14 to 18), prosocial behavior towards strangers facilitates deliberate self-regulation, whereas intentional self-regulation does not encourage the development of prosocial behavior towards strangers. These findings suggest that early adolescence can be a very flexible development period in py. The findings also suggest the need for further attention to investigating the relationship between adolescents' assets and contributing factors.

A cross-country study (Putnick et al., 2017) Examines the relationship between positive parenting and prosocial behavior in children. The study involved 1178 families (mother, father, and child) from 9 countries to explore the developmental interaction between parental acceptance-rejection and prosocial behavior of girls and boys in three waves (children ages 9 to 12 years). In controlling for inter-wave stability, relationships in one wave, and parental age and education factors, higher acceptance of parents predicted an increase in prosocial behavior of children from 9 to 10 years of age and from 10 to 12 years of age. Higher child prosocial behavior at age 9 also predicted increased parental acceptance from ages 9 to 10. This transactional path is no different in 9 countries, between mothers and fathers and daughters and boys. Parental acceptance increases a child's prosocial behavior in the future, but it is ineffective in increasing parental acceptance as it transitions into adolescence. This study identifies socialization processes widely accepted between mothers and fathers and girls and boys in different countries.

Study (Son & Padilla-Walker, 2020) Using a multidimensional approach to adolescent prosocial behavior by 1) exploring different types of adolescent prosocial behavior toward friends (physical assistance, sharing, defending, emotional support, including), and 2) examining the longitudinal relationship between prosocial behavior toward friends, friendship quality, and mental health and well-being outcomes during adolescence (anxiety, life satisfaction, depression). Data taken from Waves 8, 9, and 10 from [project name pseudonymized for review]. Participants in Wave 8 were 470 adolescents (mean age = 18.4 years, elementary = 1.04, 49% male, 33% single family) from the United States. The results showed that overall, prosocial behavior in boys and emotional support in girls were positively associated with friendship quality over time. Prosocial behavior was also associated with increased life satisfaction 2 years later.

From this discussion, factors influencing prosocial behavior in adolescents can be described, as presented in Figure 4.

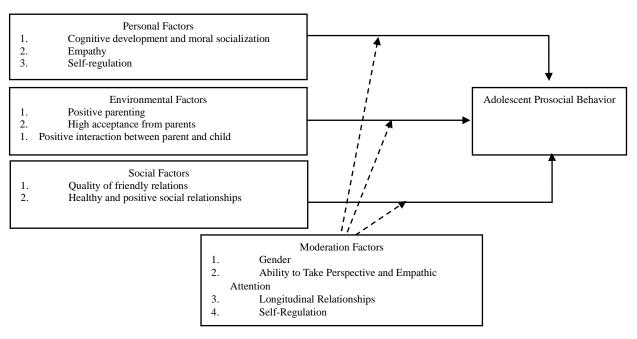


Figure 4. Expandable models

Conclusion

Findings from various studies show that prosocial behavior in adolescents has a significant positive impact in various contexts. Content analysis using VosViewer has provided a deeper understanding of various topics related to prosocial behavior in adolescents, including social influence, cognitive development, moral socialization, and personal factors such as empathy and self-regulation.

Longitudinal studies show that the development of prosocial behavior in adolescents is influenced by gender factors, with slightly different patterns between adolescent boys and girls. This highlights the importance of considering gender differences in designing interventions and programs to improve adolescents' prosocial behavior. In addition, the findings also suggest that empathic attention plays an important role in the relationship between perspective-taking ability and prosocial behavior in adolescents. Research involving positive parenting from parents highlights the importance of the family environment in shaping prosocial behavior in children. High acceptance from parents and positive interactions between parents and children is strongly associated with increased prosocial behavior. These findings suggest the importance of the role of parents as models and directors for children's prosocial behavior.

In addition, research also highlights the importance of social relationships and friendships in developing prosocial behavior in adolescents. Teens with higher prosocial behavior tend to have better-quality friendships and feel more satisfied with their lives. This suggests healthy, positive interpersonal relationships can encourage prosocial behavior and improve adolescent well-being. These findings provide valuable insights into our understanding of prosocial behavior in adolescents. A holistic and integrated approach involving the family, school, and community environment is needed to improve prosocial behavior. Programs and interventions promoting prosocial behavior in adolescents should consider factors such as gender differences, cognitive and social development, social environment, and quality of interpersonal relationships.

References

Bandura, A. (1971). Social Learning Theory. In *General Learning Coprporation*. General Learning Press. https://doi.org/10.4324/9781315744902-26

Batson, C. D., Duncan, B. D., Ackerman, P., Buckley, T., & Birch, K. (1981). Is empathic emotion a source of altruistic motivation? *Journal of Personality and Social Psychology*, 40, 290–302.

- https://doi.org/10.1037/0022-3514.40.2.290
- Baumrind, D. (1967). Child care practices anteceding three patterns of preschool behavior. In *Genetic Psychology Monographs* (Vol. 75, pp. 43–88). Heldref Publications.
- Carlo, G., Padilla-Walker, L. M., & Nielson, M. G. (2015). Longitudinal bidirectional relations between adolescents' sympathy and prosocial behavior. *Developmental Psychology*, 51(12), 1771–1777. https://doi.org/10.1037/dev0000056
- Chen, X., Fu, R., & Zhao, S. (2015). Culture and socialization. In *Handbook of socialization: Theory and research*, 2nd ed. (pp. 451–471). The Guilford Press.
- Durlak, J. A., Weissberg, R. P., Dymnicki, A. B., Taylor, R. D., & Schellinger, K. B. (2011). The Impact of Enhancing Students' Social and Emotional Learning: A Meta-Analysis of School-Based Universal Interventions. *Child Development*, 82(1), 405–432. https://doi.org/10.1111/j.1467-8624.2010.01564.x
- Eisenberg, N., & Fabes, R. A. (1998). Prosocial Development. In *Handbook of child psychology: Social, emotional, and personality development, Vol. 3, 5th ed.* (pp. 701–778). John Wiley & Sons, Inc.
- Espino-Díaz, L., Fernández-Caminero, G., Hernández-Lloret, C. M., González-González, H., & Álvarez-Castillo, J. L. (2021). Emotional intelligence and executive functions in the prediction of prosocial behavior in high school students. An interdisciplinary approach between neuroscience and education. *Children*, 8(9). https://doi.org/10.3390/children8090759
- Greitemeyer, T. (2011). Effects of prosocial media on social behavior: When and why does media exposure affect helping and aggression? *Current Directions in Psychological Science*, 20(4), 251–255. https://doi.org/10.1177/0963721411415229
- Kadafi, A., Wiyono, B. B., Muslihati, & Ramli, M. (2021). Improving Prosocial Behavior Through Virtual Media Based on Religious Values in Elementary School Students. *Pegem Egitim ve Ogretim Dergisi*, 11(4), 230–236. https://doi.org/10.47750/pegegog.11.04.22
- Longobardi, C., Settanni, M., Lin, S., & Fabris, M. A. (2021). Student–teacher relationship quality and prosocial behaviour: The mediating role of academic achievement and a positive attitude towards school. *British Journal of Educational Psychology*, *91*(2), 547–562. https://doi.org/10.1111/bjep.12378
- Lysenstøen, C., Bøe, T., Hjetland, G. J., & Skogen, J. C. (2021). A Review of the Relationship Between Social Media Use and Online Prosocial Behavior Among Adolescents. *Frontiers in Psychology*, 12(September). https://doi.org/10.3389/fpsyg.2021.579347
- Memmott-Elison, M. K., Holmgren, H. G., Padilla-Walker, L. M., & Hawkins, A. J. (2020). Associations between prosocial behavior, externalizing behaviors, and internalizing symptoms during adolescence: A meta-analysis. *Journal of Adolescence*, 80(November 2019), 98–114. https://doi.org/10.1016/j.adolescence.2020.01.012
- Memmott-Elison, M., Padilla-Walker, L. M., Yorgason, J. B., & Coyne, S. M. (2020). Intra-individual associations between intentional self-regulation and prosocial behavior during adolescence: Evidence for bidirectionality. *Journal of Adolescence*, 80(May 2019), 29–40. https://doi.org/10.1016/j.adolescence.2020.02.001
- Padilla-Walker, L. M., & Carlo, G. (2014). Prosocial Development: A Multidimensional Approach (L. M. Padilla-Walker & G. Carlo (eds.)). Oxford University Press. https://doi.org/10.1093/acprof:oso/9780199964772.001.0001
- Pati, D., & Lorusso, L. N. (2018). How to Write a Systematic Review of the Literature. *Health Environments Research and Design Journal*, 11(1), 15–30. https://doi.org/10.1177/1937586717747384

- Paulin, M., Ferguson, R. J., Schattke, K., & Jost, N. (2014). Millennials, Social Media, Prosocial Emotions, and Charitable Causes: The Paradox of Gender Differences. *Journal of Nonprofit and Public Sector Marketing*, 26(4), 335–353. https://doi.org/10.1080/10495142.2014.965069
- Pfeiffer, J. P., Pinquart, M., & Krick, K. (2016). Social Relationships, Prosocial Behaviour, and Perceived Social Support in Students From Boarding Schools. *Canadian Journal of School Psychology*, *31*(4), 279–289. https://doi.org/10.1177/0829573516630303
- Putnick, D. L., Marc H. Bornstein, Jennifer E. Lansford, & Lei Chang. (2017). Parental Acceptance-Rejection and Child Prosocial Behavior: Developmental Transactions across the Transition to Adolescence in Nine Countries, Mothers and Fathers, and Girls and Boys. *Physiology & Behavior*, 176(3), 139–148. https://doi.org/10.1053/j.gastro.2016.08.014.CagY
- Putra, I. G. N. E., Astell-Burt, T., Cliff, D. P., Vella, S. A., & Feng, X. (2021). Association between caregiver perceived green space quality and the development of prosocial behaviour from childhood to adolescence: Latent class trajectory and multilevel longitudinal analyses of Australian children over 10 years. *Journal of Environmental Psychology*, 74(February), 101579. https://doi.org/10.1016/j.jenvp.2021.101579
- Schoeps, K., Mónaco, E., Cotolí, A., & Montoya-Castilla, I. (2020). The impact of peer attachment on prosocial behavior, emotional difficulties and conduct problems in adolescence: The mediating role of empathy. *PLoS ONE*, *15*(1), 1–18. https://doi.org/10.1371/journal.pone.0227627
- Son, D., & Padilla-Walker, L. M. (2020). Correction to: Happy Helpers: A Multidimensional and Mixed-Method Approach to Prosocial Behavior and Its Effects on Friendship Quality, Mental Health, and Well-Being During Adolescence (Journal of Happiness Studies, (2020), 21, 5, (1705-1723), 10.1007/s10. *Journal of Happiness Studies*, 21(5), 1725. https://doi.org/10.1007/s10902-019-00174-y
- Van der Graaff, J., Carlo, G., Crocetti, E., Koot, H. M., & Branje, S. (2018). Prosocial Behavior in Adolescence: Gender Differences in Development and Links with Empathy. *Journal of Youth and Adolescence*, 47(5), 1086–1099. https://doi.org/10.1007/s10964-017-0786-1
- Van Ryzin, M. J., Gravely, A. A., & Roseth, C. J. (2009). Autonomy, belongingness, and engagement in school as contributors to adolescent psychological well-being. *Journal of Youth and Adolescence*, 38(1), 1–12. https://doi.org/10.1007/s10964-007-9257-4
- Xiao, S. X., Hashi, E. C., Korous, K. M., & Eisenberg, N. (2019). Gender differences across multiple types of prosocial behavior in adolescence: A meta-analysis of the prosocial tendency measure-revised (PTM-R). *Journal of Adolescence*, 77(September), 41–58. https://doi.org/10.1016/j.adolescence.2019.09.003
- Yang, F. (2021). Coping strategies, cyberbullying behaviors, and depression among Chinese netizens during the COVID-19 pandemic: a web-based nationwide survey. *Journal of Affective Disorders*, 281(June 2020), 138–144. https://doi.org/10.1016/j.jad.2020.12.023
- Zhang, Y., Yang, X., Liu, D., & Wang, Z. (2020). Chinese college students' parental attachment, peer attachment, and prosocial behaviors: The moderating role of respiratory sinus arrhythmia. *Biological Psychology*, 150(199), 107844. https://doi.org/10.1016/j.biopsycho.2020.107844