

RESEARCH ARTICLE

Screening for Psychosocial Problems Using the PSC-35/Youth and Associated Factors among Adolescents: A Cross-Sectional Study at MTs Al-Washliyah 42 Sipispis, Serdang Bedagai, Indonesia

Asima Sirait^{1*}, Ismi Ilaika², Agnes Purba³, Mido Ester Sitorus⁴, Ronni Naudur Siregar⁵

¹Universitas Sari Mutiara Indonesia, Medan, Sumatera Utara, Indonesia

²Universitas Sari Mutiara Indonesia, Medan, Sumatera Utara, Indonesia

³Universitas Sari Mutiara Indonesia, Medan, Sumatera Utara, Indonesia

⁴Universitas Sari Mutiara Indonesia, Medan, Sumatera Utara, Indonesia

⁵Universitas Sari Mutiara Indonesia, Medan, Sumatera Utara, Indonesia

Correspondence: Asima Sirait Email: asimasirait@sari-mutiara.ac.id

ARTICLE HISTORY

Received: 06 March 2026

Revised: 12 May 2026

Accepted: 23 May 2026

Published: 11 September 2026

ARTICLE IDENTIFIERS

Volume 9 - Issue 9 - 2026

Pages: 1657-1664

DOI: [10.56338/mppki.v9i9.10606](https://doi.org/10.56338/mppki.v9i9.10606)

ABSTRACT

Introduction: Psychosocial problems may contribute to depression among adolescents, yet many cases remain undetected. In the 2023 Indonesian Health Survey, 2.8% of individuals aged 15–24 years had mental health problems in the previous month. Peer pressure and school bullying may increase psychosocial stress and the risk of depression. Evidence on school-based screening using the Pediatric Symptom Checklist (PSC) in North Sumatra is limited. This study aimed to screen adolescents for psychosocial problems using the PSC-35/Youth and identify associated factors at MTs Al-Washliyah 42 Sipispis, Serdang Bedagai, Indonesia.

Methods: This cross-sectional study included 142 adolescents aged 12–15 years at MTs Al-Washliyah 42 Sipispis; all 142 were included in the analysis. Psychosocial problems were assessed using the Pediatric Symptom Checklist-35/Youth (PSC-35/Y), an Indonesian translation reviewed by experts for linguistic appropriateness, item clarity, and semantic equivalence with the original instrument. The 35 items are rated as “never” (0), “sometimes” (1), or “often” (2), giving a total score of 0–70; a score ≥ 30 indicates a positive screen for psychosocial problems. Ethical approval was granted under approval number 4122/F/KEP/USM/IV/2026. Associations were examined using the chi-square test followed by multivariable logistic regression, with a 95% confidence level.

Results: Of the 142 adolescents, 65 (45.8%) screened positive for psychosocial problems. Bivariate analysis identified significant associations with family environment ($p = 0.001$), school environment ($p = 0.023$), peer relationships ($p = 0.009$), and academic achievement ($p = 0.008$). Multivariable analysis showed that adolescents with a positive family environment had lower odds of screening positive for psychosocial problems compared with those with a negative family environment as the reference category (OR = 0.093; 95% CI: 0.037–0.231; $p = 0.001$).

Conclusion: Psychosocial problems were common among the adolescents in this study. Family environment, school environment, peer relationships, and academic achievement were significantly associated with psychosocial problems in bivariate analyses; family environment remained significant in the multivariable model. These findings support strengthening family support systems and school-based psychosocial screening and support for adolescent mental health.

Keywords: Psychosocial Problems; Adolescents; PSC-35/Y; Associated Factors; School-Based Screening

INTRODUCTION

Adolescence is a critical developmental period involving biological and developmental changes, as well as evolving emotional and social experiences, which may interact with contextual factors to shape adolescents' well-being and responses to psychosocial stressors (1,2). According to the World Health Organization (WHO), as cited by (3), globally, mental health problems account for approximately 10%–20% of the burden of illness during adolescence, and the prevalence of mental health problems among adolescents in low- and middle-income countries remains high.

In Indonesia, the 2023 Indonesian Health Survey (*Survei Kesehatan Indonesia/SKI 2023*) reported that 2.8% of individuals aged 15–24 years experienced mental health problems in the previous month, as assessed using the Self-Reporting Questionnaire-20 (SRQ-20) with a cut-off score of ≥ 6 (4). Psychosocial problems among young people may be influenced by environmental and family-related factors. In educational settings, academic demands from parents, teachers, peers, and school activities may contribute to stress among adolescents. Family-related factors, including low socioeconomic status, single-parent households, parental mental illness, and family discord, have also been associated with a higher risk of psychosocial dysfunction (5,6).

A preliminary survey conducted at MTs Al-Washliyah 42 Sipispis among adolescents aged 12–15 years identified indications of psychosocial vulnerability among some students. These observations included concerns related to peer interactions, family circumstances, and academic demands, such as school assignments, examinations, and performance expectations. Some students were also reported to have experienced bullying and exhibited behaviours such as fighting and truancy. These preliminary findings highlight the need for early identification of psychosocial problems and appropriate school-based support (7–10). Although several studies have found that family-, school-, and peer-related factors are associated with psychosocial problems among adolescents, most existing research remains broad in scope and has not used standardised screening instruments for early detection in school settings. In addition, the Pediatric Symptom Checklist-35/Youth (PSC-35/Y) (11) has been used infrequently in Indonesian studies, particularly in North Sumatra, and few studies have examined multiple associated factors within a single analytical model. Research integrating multiple environmental factors in junior secondary school settings using a screening-based approach also remains scarce.

Therefore, studies are needed that use the PSC-35/Y for psychosocial screening while simultaneously examining associated factors among adolescents in school settings. The present study aimed to screen for psychosocial problems using the PSC-35/Y and to analyse associated factors among adolescents at MTs Al-Washliyah 42 Sipispis.

METHODS

Study Design

An analytical cross-sectional study was conducted to examine factors associated with psychosocial problems among adolescents.

Participants and Sampling

The study involved the entire population of 142 students aged 12–15 years at MTs Al-Washliyah 42 Sipispis. Total population sampling was used because all members of the population were accessible and met the study eligibility criteria. The inclusion criteria were students aged 12–15 years who were actively enrolled, willing to participate, and had obtained parental or guardian consent. The exclusion criteria were students who were absent during data collection, did not complete the questionnaire, or withdrew from the study. A total of 142 students were approached; all 142 provided the required consent and were included in the study. No participants were excluded, and data from all 142 participants were analysed.

Setting

The study was conducted at MTs Al-Washliyah 42 Sipispis. A preliminary survey was conducted in December 2025, followed by data collection from January to March 2026.

Measures

The standardised instrument used to assess psychosocial problems was the Pediatric Symptom Checklist-35/Youth (PSC-35/Y). The PSC-35/Y is a 35-item youth self-report screening instrument. The version used was translated from English into Indonesian and reviewed by experts for linguistic appropriateness, item clarity, and semantic equivalence with the original instrument. Formal psychometric validation of the Indonesian version of the PSC-35/Y was not performed in this study. Each item is rated as “never” (0), “sometimes” (1), or “often” (2), giving a total score of 0–70; a total score of ≥ 30 was considered a positive screen for psychosocial problems. All outcome classifications and subsequent analyses were based on the PSC-35/Y cut-off score of ≥ 30 .

Economic status was assessed based on self-reported monthly household income and classified using the regional minimum wage cut-off of IDR 3,313,500 per month. Monthly household income of $\leq$ IDR 3,313,500 was classified as low economic status, whereas income $>$ IDR 3,313,500 was classified as high economic status. Family status was assessed using a single categorical question regarding the participant's parental condition and was classified into three categories: both parents living, single-parent family, and orphaned/divorced-parent family.

Family, school, and peer environments were assessed using a researcher-developed questionnaire consisting of negatively worded yes/no items. Each “yes” response was scored 1 and each “no” response was scored 0. Based on the operational classification used in the study, domain scores of 0–2 were classified as a positive environment, whereas scores of ≥ 3 were classified as a negative environment. Academic achievement was assessed using students’ average report-card grades. The sample median was used as the cut-off for categorisation. Participants with an average report-card grade equal to or above the median were classified as having high academic achievement, whereas those with an average grade below the median were classified as having low academic achievement.

The researcher-developed questionnaire initially comprised 15 items assessing family environment, school environment, and peer environment and was tested for validity and reliability among 40 students from a different school, MTs AW 40 Tinokkah Sipispis. Instrument validity was evaluated using the Pearson Product–Moment correlation at a 5% significance level ($\alpha = 0.05$). A critical r-value of 0.312 was applied as the criterion for item validity. The validity analysis indicated that 14 items met the validity criterion, whereas one item was excluded because of an inadequate validity coefficient. Instrument reliability was subsequently assessed using Cronbach’s alpha, yielding a coefficient of 0.816 across the 14 valid items, indicating high internal consistency.

Data Collection

The researcher prepared the PSC-35/Y and the study instruments before data collection. Respondents were informed about the study objectives, questionnaire-completion procedures, and data confidentiality. The questionnaires were completed during school hours under the researcher’s supervision. Respondents could request clarification without being directed towards a particular response. Completed questionnaires were collected and checked for completeness and internal consistency before statistical analysis.

Statistical Analysis

Univariate analysis was used to describe respondent characteristics and the distribution of each study variable using frequencies and percentages. Bivariate associations between the independent variables and psychosocial problems were examined using the chi-square test, with statistical significance set at $p < 0.05$ and 95% confidence intervals. Variables with $p < 0.25$ in the bivariate analysis were entered into a multivariable logistic regression model. In the logistic regression analysis, screening positive for psychosocial problems was specified as the outcome of interest. Negative family environment, negative school environment, negative peer environment, and low academic achievement were used as the reference categories. Table 9 presents the full adjusted multivariable logistic regression model including all variables entered into the model. Results are reported as odds ratios (OR) with 95% confidence intervals (CI).

Ethical Considerations

Ethical approval was obtained from the Research Ethics Committee of Universitas Sari Mutiara Indonesia (approval number 4122/F/KEP/USM/IV/2026). Ethical procedures were followed throughout the study. Written informed consent was obtained from the parents or legal guardians of each participant before data collection, and written adolescent assent was obtained from all participating students. The adolescents were informed about the study objectives and procedures, the voluntary nature of participation, and their right to refuse or withdraw at any time without adverse consequences. Confidentiality was maintained by using coded participant identifiers rather than names, and the collected data were accessible only to the research team.

RESULTS

Respondent characteristics are presented in Table 1.

Table 1. Characteristics of respondents at MTs Al-Washliyah 42 Sipispis, Serdang Bedagai

Characteristics	Description	Frequency	%
Gender	Male	47	33.1
	Female	95	66.9
	Total	142	100
Age	12 years	10	7.0
	13 years	44	31.0
	14 years	40	28.2
	15 years	48	33.8
	Total	142	100

Most respondents were female (66.9%), and the largest age group was 15 years (33.8%).

Table 2. Distribution of psychosocial problems among adolescents

Psychosocial Problems	Frequency	%
Yes	65	45.8
No	77	54.2
Total	142	100

Overall, 65 adolescents (45.8%) screened positive for psychosocial problems using the PSC-35/Y.

Table 3. Association between economic factors and psychosocial problems

Economic Factor	Psychosocial Problems		Total	p-value
	Yes	No		
Low	43 (49.4%)	44 (50.6%)	87	0.272
High	22 (40.0%)	33 (60.0%)	55	
Total	65 (45.8%)	77 (54.2%)	142	

Statistical significance was set at $p < 0.05$. The association was not statistically significant ($p = 0.272$).

Table 4. Association between family status and psychosocial problems

Family Status	Psychosocial Problems		Total	p-value
	Yes	No		
Both parents living	52 (45.2%)	63 (54.8%)	115	0.580
Single parent family	1 (25.0%)	3 (75.0%)	4	
Orphan/Divorced	12 (52.2%)	11 (47.8%)	23	
Total	65 (45.8%)	77 (54.2%)	142	

The association was not statistically significant ($p = 0.580$).

Table 5. Association between family environment and psychosocial problems

Family Environment	Psychosocial Problems		Total	p-value
	Yes	No		
Positive	24 (26.4%)	67 (73.6%)	91	0.000*
Negative	41 (80.4%)	10 (19.6%)	51	
Total	65 (45.8%)	77 (54.2%)	142	

Family environment was significantly associated with psychosocial problems ($p = 0.001$). A substantially higher proportion of adolescents with a negative family environment screened positive for psychosocial problems (80.4%) compared with those with a positive family environment (26.4%).

Table 6. Association between school environment and psychosocial problems

School Environment	Psychosocial Problems		Total	p-value
	Yes	No		
Positive	54 (42.5%)	73 (57.5%)	127	0.023*
Negative	11 (73.3%)	4 (26.7%)	15	
Total	65 (45.8%)	77 (54.2%)	142	

School environment was significantly associated with psychosocial problems ($p = 0.023$).

Table 7. Association between peer environment and psychosocial problems

Peer Environment	Psychosocial Problems		Total	p-value
	Yes	No		
Positive	51 (41.5%)	72 (58.5%)	123	0.009*
Negative	14 (73.7%)	5 (26.3%)	19	
Total	65 (45.8%)	77 (54.2%)	142	

P Peer environment was significantly associated with psychosocial problems ($p = 0.009$).

Table 8. Association between academic achievement and psychosocial problems

Academic Achievement	Psychosocial Problems		Total	p-value
	Yes	No		
High	39 (39.8%)	59 (60.2%)	98	0.008*
Low	26 (59.1%)	18 (40.9%)	44	
Total	65 (45.8%)	77 (54.2%)	142	

Academic achievement was significantly associated with psychosocial problems ($p = 0.008$).

Table 9. Multivariable logistic regression analysis

Variable	B	Sig	Exp (B)	95% CI
Family Environment	-2.377	0.000	0.093	0.037-0.231
School Environment	-0.520	0.531	0.594	0.117-3.029
Peer Environment	-0.085	0.915	1.089	0.229-5.173
Academic Achievement	-0.739	0.086	0.477	0.205-1.111

Table 9 presents the full adjusted multivariable logistic regression model. Family environment was significantly associated with psychosocial problems (OR = 0.093; 95% CI: 0.037–0.231; $p = 0.001$). Adolescents with a positive family environment had 0.093 times the odds of screening positive for psychosocial problems compared with those with a negative family environment, which served as the reference category, after adjustment for the other variables included in the model.

DISCUSSION

Principal Findings

Bivariate analyses identified associations between psychosocial problems and family environment, school environment, peer relationships, and academic achievement, whereas only family environment remained statistically significant in the multivariable model. Family economic status and family status were not significantly associated with psychosocial problems. This suggests that structural factors such as economic background and family composition alone may not account for adolescents' psychosocial well-being; social support, self-efficacy, and resilience may modify these associations.

In contrast, family environment was significantly associated with psychosocial problems, highlighting the importance of family dynamics rather than family structure alone. Supportive, harmonious, and communicative family environments may be associated with better adolescent mental health, whereas conflictual or unsupportive conditions may be associated with greater psychosocial vulnerability.

Academic achievement was also significantly associated with psychosocial problems. Academic success may support self-confidence, motivation, and a positive self-concept, whereas psychosocial difficulties may affect concentration, motivation, and educational outcomes. Because this study was cross-sectional, the direction of this association cannot be determined.

Overall, the findings support a multidimensional perspective on adolescent psychosocial health in which individual, family, school, and social environmental factors interact. Preventive efforts should therefore strengthen supportive family environments, academic support, resilience, and social support rather than focus only on socioeconomic or demographic factors.

Comparison with Existing Evidence

Table 3 shows that family economic status was not significantly associated with psychosocial problems among adolescents at MTs Al-Washliyah 42 Sipispis. This finding is consistent with previous studies suggesting that socioeconomic conditions and family structure alone do not necessarily directly determine adolescents' mental health outcomes ([12,13](#)). Beyond family-related factors, the school environment represents an important context that may influence adolescents' psychosocial well-being. The school environment encompasses the overall school climate, students' sense of safety and comfort during the learning process, student–teacher relationships, academic demands, and the support provided by the school. A positive and supportive school environment may foster a sense of safety, strengthen students' school connectedness, and help adolescents cope with various stressors. Conversely, an unfavourable school climate, excessive academic demands, bullying, and inadequate support from teachers and school authorities may increase psychological stress and vulnerability to psychosocial problems ([14](#)).

In contrast to the school environment, peer relationships primarily involve the quality of interpersonal interactions and social dynamics among adolescents. Peer relationships may exert a substantial influence because adolescents tend to spend considerable amounts of time with their peers and engage in frequent social interactions within peer groups. Consequently, positive and negative experiences in peer relationships may have a direct impact on their psychosocial well-being. Peer support and acceptance may help adolescents cope with stress and promote psychological well-being, whereas interpersonal conflict, social rejection, peer pressure, and bullying may increase their vulnerability to psychosocial problems.

Nevertheless, other studies have reported that economic crises and financial hardship are consistently associated with depression and anxiety, as well as higher rates of self-harm and suicide risk among children and adolescents ([15](#)). Similarly, a recent meta-analysis by ([16](#)) found a weak but significant negative association between family socioeconomic status and depressive symptoms among children and adolescents. However, the strength of this association may vary depending on the sociocultural context and the level of national economic development. In the present study, the absence of a significant association between family economic status and psychosocial problems may indicate that economic conditions are not the sole determinant of psychosocial well-being in the population studied. Other factors that are more proximal to adolescents' everyday experiences, including the school environment and peer relationships, may also contribute to their psychosocial well-being. The discrepancy between the present findings and previous evidence may be attributable to differences in participant characteristics and in the measurement of socioeconomic and psychosocial variables.

A previous systematic review ([17](#)) found that adolescents from families with low socioeconomic status had a greater risk of mental health problems. However, social support and enhanced self-efficacy may mitigate this risk. These findings suggest that economic conditions are not the sole determinant of adolescent psychosocial development. Reported ([18](#)) a negative association between family socioeconomic status and depressive symptoms among children and adolescents. Similarly found

that lower familial socioeconomic status was associated with greater mental health problems among adolescents. In the present study, 61% of adolescents were classified as having low family economic status and 39% as having high family economic status. However, family economic status was not significantly associated with psychosocial problems. This finding may reflect the multifactorial nature of adolescent psychosocial health, in which family, school, peer, and academic factors may interact to influence psychosocial outcomes (19,20).

Family status, as presented in Table 4, was not significantly associated with psychosocial problems among adolescents at MTs Al-Washliyah 42 Sipispis. Reported a significant association between family structure and adolescent mental health, with better mental health among adolescents from intact families ($p < 0.001$) (21). Demonstrated that adolescent mental health problems can involve emotional, behavioral, and peer difficulties, and that combining parent and adolescent reports improves the detection of psychiatric disorders in adolescents (22). This finding differs from studies reporting better mental health among children in intact families than among those in non-intact families (23).

Previous research has described several approaches to supporting the mental health of children and adolescents, including open communication, emotional education, participation in social activities, and access to high-quality mental health services (24–26). Teaching children and adolescents strategies for emotional regulation and coping may support their psychological well-being. Social support, positive family relationships, and supportive social environments may also contribute to better mental health outcomes (27,28). At MTs Al-Washliyah 42 Sipispis, 81.0% of students reportedly lived with both parents, 2.8% did not have both parents, and 16.2% were orphans. These findings suggest that psychosocial problems are not determined solely by whether adolescents live with both parents. Social and emotional support may also contribute to adolescents' psychosocial well-being. Adolescents in non-intact family circumstances may maintain good psychosocial health when they receive emotional support from extended family, peers, or schools (15).

Family environment was significantly associated with psychosocial problems (Table 5). Family harmony may support adolescent mental well-being and adaptation, whereas a non-harmonious family environment may contribute to stress among adolescents (19). Several studies have also emphasised the family environment as an important determinant of adolescent mental health. Previous research found that better family functioning was associated with better mental health among adolescents. Adolescents with major depressive disorder reported lower levels of family flexibility, cohesion, communication, and satisfaction with family life than healthy adolescents, suggesting that poorer family functioning may increase vulnerability to adolescent depression. Supportive family interactions may help adolescents cope with external adversities and may reduce the risk of depressive symptoms (20). Among adolescents at MTs Al-Washliyah 42 Sipispis, 64% were classified as having a positive family environment, characterised by support during problems, comfort in discussing concerns, support for decision-making, harmonious relationships, and attention to academic progress.

In the multivariable model, the family environment was the only factor that remained statistically significant ($p = 0.001$; OR = 0.093; Table 9). This finding highlights the importance of identifying psychosocial risk factors beyond academic performance alone. Similarly emphasized the importance of early detection and universal school-based mental health screening, as behavioral and emotional problems may remain unrecognized when academic performance is used as the sole indicator of mental health risk (17). Academic achievement was significantly associated with psychosocial problems in the bivariate analysis (Table 8). Academic achievement may support self-confidence, motivation, and a positive self-concept, whereas psychosocial difficulties may adversely affect concentration, motivation, and educational outcomes. Previous studies have found higher levels of stress and depressive symptoms among adolescents with lower academic achievement than among those with better performance. Previous research has shown that behavioral and emotional problems among adolescents may be associated with difficulties in school functioning, including problems with concentration, task management, peer interaction, and academic performance. Socioeconomic adversity may further contribute to emotional and behavioral difficulties and poorer educational functioning among children and adolescents (13). Positive parent–adolescent communication may support adolescents' social and emotional development by providing emotional support and guidance and helping them develop appropriate social skills and emotional control (21).

Adverse family experiences during childhood may be associated with later psychological difficulties in adolescence, while coping, emotion regulation, and social support may influence adolescents' ability to respond to stressors and maintain mental well-being (2,22,23). Intrapersonal resources may also play an important role in adolescent mental health. Found that greater differentiation of self, reflecting autonomy, identity, and emotional regulation, was associated with fewer mental health problems and partially mediated the relationship between family environment and adolescent mental health. Further showed that adolescent depression symptoms were associated with higher depression symptoms and perceived stress, as well as lower social support, in young adulthood (24,25). Exposure to adverse childhood experiences may also shape long-term mental health outcomes through psychosocial mechanisms such as coping, emotion regulation, and social support (26).

Academic achievement is unlikely to be the sole determinant of adolescent psychosocial well-being, as individual characteristics and social support may also contribute to adolescents' adjustment and mental health. Academic self-concept is positively associated with academic achievement and may also enhance students' learning motivation. Adolescents with a positive academic self-concept may approach academic tasks with greater self-confidence and are more likely to engage effectively in their learning activities (1,15,24).

Limitations

This study was conducted in a single school, which may limit the generalisability of the findings. In addition, adolescent psychosocial problems are multifactorial, and potentially relevant variables such as resilience, parenting, and peer support

were not examined comprehensively. The cross-sectional design also precludes conclusions about causality or the direction of the observed associations.

Implications and Future Research

Future studies should use longitudinal designs and larger samples from multiple schools to improve generalisability. They should also examine resilience, parenting, and peer support as potential determinants of adolescent psychosocial problems and evaluate interventions designed to prevent or reduce these problems.

CONCLUSION

Among 142 adolescents, 65 (45.8%) screened positive for psychosocial problems. Family environment was the only factor that remained statistically significant in the multivariable model ($p = 0.001$; OR = 0.093; 95% CI: 0.037–0.231). These findings support family- and school-based psychosocial screening and support strategies for adolescents.

DECLARATIONS

Author contributions: AS contributed to the conceptualization of the study, research design, critical review of the scientific content, and preparation of the initial manuscript. II contributed to data collection, data analysis, and study oversight. AP contributed to methodology development, validation of the research instruments, interpretation of the findings, and manuscript revision. MES contributed to study oversight, data analysis, critical evaluation of the study findings, and manuscript revision. RNS contributed to ensuring the manuscript's compliance with scientific publication standards.

Conflicts of interest: The authors declare no personal or professional conflicts of interest that could have influenced the conduct, analysis, interpretation, or reporting of this study.

Declaration of Generative AI And AI-Assisted Technologies in the Writing Process: The authors acknowledge the use of AI-assisted language-editing software (Grammarly) solely for grammar correction and enhancement of linguistic clarity. The Grammarly version/build was not available at the time of manuscript preparation. No generative artificial intelligence was used for scientific content development, including study design, data collection, statistical analysis, interpretation of results, or manuscript preparation. The authors take full responsibility for the accuracy, integrity, and originality of this work.

Source of Funding Statements: This research was funded by the Institute for Research and Community Service (LPPM) of Universitas Sari Mutiara Indonesia under Grant Number 264/E/LPPM USM-Indonesia/III/2026.

Acknowledgments: The authors gratefully acknowledge the school administration and teachers of MTs Al-Washliyah 42 Sipispis for their support, permission, facilitation, and cooperation throughout the study. The authors also sincerely thank all parents and students who participated as respondents and contributed to the successful completion of data collection. The authors further express their appreciation to the Rector of Universitas Sari Mutiara Indonesia for providing institutional support, opportunities for academic development, and research funding.

REFERENCES

- Buchanan C, Romer D, Wray-Lake L, Butler-Barnes S. Editorial: Adolescent storm and stress: a 21st century evaluation. *Front Psychol.* 2023; 14:1257641. <https://doi.org/10.3389/fpsyg.2023.1257641>
- Salmela-Aro K, Upadaya K, Vinni-Laakso J, Hietajärvi L. Adolescents' longitudinal school engagement and burnout before and during COVID-19: the role of socio-emotional skills. *J Res Adolesc.* 2021;31(3):796–807. <https://doi.org/10.1111/jora.12654>
- Pandia V, Noviandhari A, Amelia I, Hidayat G, Fadlyana E, Dhamayanti M. Association of mental health problems and socio-demographic factors among adolescents in Indonesia. *Glob Pediatr Health.* 2021; 8:2333794X211042223. <https://doi.org/10.1177/2333794X211042223>
- Kebijakan Pembangunan Kesehatan KKRI. *Survei Kesehatan Indonesia 2023 dalam angka.* Jakarta: Kementerian Kesehatan Republik Indonesia; 2024.
- Fajarsari D, Purwanti S, Sari A. Hubungan lingkungan dan aktifitas akademik dengan tingkat stres pada remaja. *Ensiklopedia J.* 2023;5(2):230–5. <https://doi.org/10.33559/eoj.v5i2.1503>
- Jellinek M, Murphy J, Little M, Pagano M, Comer D, Kelleher K. Use of the Pediatric Symptom Checklist to screen for psychosocial problems in pediatric primary care: a national feasibility study. *Arch Pediatr Adolesc Med.* 1999;153(3):254–60. <https://doi.org/10.1001/archpedi.153.3.254>
- Zhang J, Duan X, Yan Y, Tan Y, Wu T, Xie Y. Family functioning and adolescent mental health: the mediating role of bullying victimization and resilience. *Behav Sci (Basel).* 2024;14(8):664. <https://doi.org/10.3390/bs14080664>
- Tharaldsen K, Tvedt M, Caravita S, Bru E. Academic stress: links with emotional problems and motivational climate among upper secondary school students. *Scand J Educ Res.* 2023;67(7):1137–50. <https://doi.org/10.1080/00313831.2022.2116480>
- Sood A, Sharma D, Sharma M, Dey R. Prevalence and repercussions of stress and mental health issues on primary and middle school students: a bibliometric analysis. *Front Psychiatry.* 2024; 15:1369605. <https://doi.org/10.3389/fpsyg.2024.1369605>
- Kazuo A, de Castro R, Nardi A, Quagliato L. Mental health screening in schools: prevalence, challenge and impact on the early identification of disorders in children and adolescents. *J Bras Psiquiatr.* 2025;74. <https://doi.org/10.1590/0047-2085-2024-0064>
- Behere A, Basnet P, Campbell P. Effects of family structure on mental health of children: a preliminary study. *Indian J Psychol Med.* 2017;39(4):457–63. <https://doi.org/10.4103/0253-7176.211767>
- Fadly D, Islawati. Tantangan bagi perkembangan psikososial anak dan remaja di era pendidikan modern: studi literatur. *Venn J Sustain Innov Educ Math Nat Sci.* 2024;3(2). <https://doi.org/10.53696/venn.v3i2.156>

13. Feghali R, El-Hachem C, Bakhos G, Zarzour M, Bou Khalil R. The impact of economic crisis on the mental health of children and adolescents: a systematic review. *Asian J Psychiatr.* 2025;110:104613. <https://doi.org/10.1016/j.ajp.2025.104613>
14. Niu Y, Guo X, Cai H, Luo L. The relation between family socioeconomic status and depressive symptoms among children and adolescents in mainland China: a meta-analysis. *Front Public Health.* 2024; 11:1292411. <https://doi.org/10.3389/fpubh.2023.1292411>
15. Maurer J, Meyrose A, Kaman A, Mauz E, Ravens-Sieberer U, Reiss F. Socioeconomic status, protective factors, and mental health problems in transition from adolescence to emerging adulthood: results of the longitudinal BELLA study. *Child Psychiatry Hum Dev.* 2025;56(3):649–60. <https://doi.org/10.1007/s10578-023-01582-1>
16. Zhou S, Zhang L, Wang L, Guo Z, Wang J, Chen J. Prevalence and socio-demographic correlates of psychological health problems in Chinese adolescents during the outbreak of COVID-19. *Eur Child Adolesc Psychiatry.* 2020;29(6):749–58. <https://doi.org/10.1007/s00787-020-01541-4>
17. Kim J, Kim D, Kamphaus R. Early detection of mental health through universal screening at schools. *Ga Educ Res.* 2022;19(1): Article 4. <https://doi.org/10.20429/ger.2022.190104>
18. Kuhn C, Aebi M, Jakobsen H, Banaschewski T, Poustka L, Grimmer Y. Effective mental health screening in adolescents: should we collect data from youth, parents or both? *Child Psychiatry Hum Dev.* 2017;48(3):385–92. <https://doi.org/10.1007/s10578-016-0665-0>
19. Lyu N, Xue Q, Li X, Yan S, Chen M, Hou H. The role of family environment and parental factors: a person-oriented study of adolescents' psychological distress and help-seeking patterns. *Child Adolesc Psychiatry Ment Health.* 2025;19(1):134. <https://doi.org/10.1186/s13034-025-00986-2>
20. Urbańska-Grosz J, Sitek E, Pakalska A, Pietraszczyk-Kędziora B, Skwarska K, Walkiewicz M. Family functioning, maternal depression, and adolescent cognitive flexibility and its associations with adolescent depression: a cross-sectional study. *Children (Basel).* 2024;11(1):131. <https://doi.org/10.3390/children11010131>
21. Larasati K, Marheni A. Hubungan antara komunikasi interpersonal orangtua-remaja dengan keterampilan sosial remaja. *J Psikol Udayana.* 2019;6(1):88–95. <https://doi.org/10.24843/JPU.2019.v06.i01.p09>
22. Vovchenko O. The influence of family upbringing on the formation of self-esteem of adolescents with developmental disabilities. *Sci Bull Mukachevo State Univ Ser Pedagogy Psychol.* 2021;7(4):9–19. [https://doi.org/10.52534/msu-pg.7\(4\).2021.9-19](https://doi.org/10.52534/msu-pg.7(4).2021.9-19)
23. Amseke F, Daik M, Liu D. Dukungan sosial orang tua, konsep diri dan motivasi berprestasi mahasiswa di masa pandemi COVID-19. *J Muara Ilmu Sos Humaniora Seni.* 2021;5(1):241–50. <https://doi.org/10.24912/jmishumsen.v5i1.9957.2021>
24. Irfan R, Zahra S, Saleem S. Family environment and adolescent mental health: unpacking the mediating role of differentiation of self. *J Prof Appl Psychol.* 2025;6(4):524–35. <https://doi.org/10.52053/jpap.v6i4.456>
25. Psychogiou L, Navarro M, Orri M, Côté S, Ahun M. Childhood and adolescent depression symptoms and young adult mental health and psychosocial outcomes. *JAMA Netw Open.* 2024;7(8): e2425987. <https://doi.org/10.1001/jamanetworkopen.2024.25987>
26. Panagou C, MacBeth A. Deconstructing pathways to resilience: a systematic review of associations between psychosocial mechanisms and transdiagnostic adult mental health outcomes in the context of adverse childhood experiences. *Clin Psychol Psychother.* 2022;29(5):1626–54. <https://doi.org/10.1002/cpp.2732>
27. Wang L, Yu Z. Gender-moderated effects of academic self-concept on achievement, motivation, performance, and self-efficacy: a systematic review. *Front Psychol.* 2023; 14:1136141. <https://doi.org/10.3389/fpsyg.2023.1136141>
28. Riaz H, Shah S, Tariq A. Impact of academic self-concept and self-regulated learning on academic achievement of students. *Res J Soc Sci Econ Rev.* 2022;3(2):18–26. [https://doi.org/10.36902/rjsser-vol3-iss2-2022\(18-26\)](https://doi.org/10.36902/rjsser-vol3-iss2-2022(18-26))



COPYRIGHT & LICENSING

Copyright © 2026 Media Publikasi Promosi Kesehatan Indonesia

This work is licensed under a [Creative Commons Attribution-ShareAlike 4.0 International License](https://creativecommons.org/licenses/by-sa/4.0/).