

Exploring the implementation of the school-based mental health program for adolescents in Indonesia: A mixed-methods study

Riastuti Kusuma Wardani*, Seung Chun Paek, Sauwakon Ratanawijitrasin, and Darunee Phukhao

Department of Society and Health, Faculty of Social Sciences and Humanities, Mahidol University, Thailand

DOI: <https://doi.org/10.36685/phi.v9i4.751>

Received: 6 October 2023 | Revised: 7 November 2023 | Accepted: 7 December 2023

Corresponding author:

Riastuti Kusuma Wardani

Department of Society and Health, Faculty of Social Sciences and Humanities, Mahidol University, Thailand

Email: riastutikw@gmail.com

Copyright: © 2023 the Author(s). This is an open-access article distributed under the terms of the Creative Commons Attribution Non-Commercial License, which permits unrestricted non-commercial use, distribution, and reproduction in any medium provided the original work is properly cited.

Abstract

Background: Mental health issues among adolescents have become a public concern in Indonesia. The Indonesian government introduced the School-Based Mental Health (SBMH) program in 2017 and has implemented it in all public junior high schools in Jakarta. However, there is a relative scarcity of evidence regarding how schools have implemented the SBMH.

Objective: This study aimed to explore the SBMH program and its implementation in public junior high schools.

Methods: Mixed methods were employed in 12 public junior high schools (6 from East Jakarta and 6 from West Jakarta) using a purposive sampling method from May 6 to August 30, 2021. Descriptive statistics and content analysis were applied to the data analysis.

Results: The main inhibiting factor for the implementation of the SBMH program was the school curriculum. Schools that received the Health School Award had more trained teachers to facilitate the SBMH program compared to schools without the award. Consequently, schools with the award successfully implemented regular mental health education in the classroom, screening, and counseling for students with mental health issues more effectively than schools without the award.

Conclusion: The government should gradually strengthen resources to facilitate the SBMH program in the long term. In the short and medium term, the government should develop a collaboration network by supporting external mental health providers, professionals, and counselors.

Keywords: mental health; program; schools; adolescent; Indonesia

Background

Adolescence is the key period of physical and emotional developments (Center for Reproductive Health, 2022; Erikson, 1993; Lansford & Banati, 2018). The phase is particularly important for the mental health because the majority of persons with mental and substance use disorders (MSUDs) started in their childhood or adolescence, and many of them have chronic or recurring history (Chadda, 2018; Kessler et al., 2007). Consequently, depression and anxiety, which are common mental

issues among adolescents, have become the major public health concerns globally (United Nations Children's Fund, 2021a; World Health Organization, 2018).

According to the World Health Organization, in 2019, one in every seven adolescents aged 10–19 years old in the world (approximately 14% of the entire adolescent population aged 10–19 years old) suffered either depression or anxiety (United Nations Children's Fund, 2021b). These mental conditions

can negatively impact social lives of adolescents and cause huge social costs against the society (Lansford & Banati, 2018; Pinchoff et al., 2021).

The school mental health programs as the effective intervention to address mental health issues of adolescents have been implemented in many countries (Harini et al., 2021; United Nations Children's Fund, 2021a). The policies vary widely across countries in terms of their specific requirements. Nonetheless, three basic requirements are commonly found: 1) providing regular mental health education; 2) screening and monitoring adolescents with mental health issues, and 3) providing mental health counseling to those with mental health issues as needed (Nishio et al., 2020; World Health Organization, 1998). There are many studies from other countries which have proven the positive effects of school mental health program on anxiety, depression, and negative behaviors among adolescents (Askell-Williams et al., 2013; Ferlie & Shortell, 2001; Yang et al., 2018).

Indonesia is not an exception in this case. Although there are no official statistics in Indonesia, which are comparable to the global statistics, several studies have indicated the rapid increase in mental health issues among adolescents. Specifically, according to the report of UNICEF in 2021, the prevalence of general depression or anxiety among adolescents aged 10–19 years old increased almost four times, from approximately 9.2% in 2018 to approximately 43% in 2021 (Borualogo & Casas, 2022; Sulistiowati et al., 2019; United Nations Children's Fund, 2021b). Another study showed that approximately 5% of adolescents aged 13–17 years old suffered from mental health issues including depression or anxiety in 2015 (World Health Organization, 2015). It increased to 34.9% during the pandemic in 2021 (Center for Reproductive Health, 2022).

In response to the mental health issues among adolescents, the Indonesian government also introduced the school-based mental health program (SBMH) (Kementerian Kesehatan Republik Indonesia, 2018). Since then the program has been implemented in all public junior high schools in Jakarta (Gustina, 2017). It has three activities i.e. education, screening, and counseling (Kementerian Kesehatan Republik Indonesia, 2018; Kementerian Pendidikan dan Kebudayaan Indonesia, 2016).

Some research was previously conducted to describe the mental health interventions in schools in Indonesia (Alfianto et al., 2019; Amalianingsih & Herdi, 2021; Apriyanti, 2021; Fitria & Maulidia, 2018; Fitriani et al., 2022; Hanurawan, 2012; Kuswadi, 2019; Murdhiono & Wiyani, 2019; Putri et al., 2018; Romadhon, 2016; Sasmita, 2018; Yuniar & Darmawati, 2017). However, to the best of our knowledge, the implementation of SBMH has been understudied. Therefore, the current study is aimed at exploring the SBMH program and the enabling and inhibiting factors of its implementation in public junior high schools.

Methods

Study Design

The mixed methods study was conducted in public junior high schools in East and West Jakarta cities. Quantitative methods were used to describe enabling and inhibiting factors related to the implementation of the SBMH program by interviewing informants including teachers, school counselors, principals and vice principals. Qualitative methods, multiple case-studies were applied to explore enabling and inhibiting factors the implementation of the SBMH program by interviewing informants i.e., students (Yin, 2009). By concurrently gathering quantitative and qualitative data, combining the data, comparing the results, and elucidating any inconsistencies in the results, the study employed a convergent design (Creswell, 2020).

Setting

Jakarta province was reported to have the highest proportion of adolescents with mental health issues in Indonesia. Moreover, East and West Jakarta cities were reported with the lowest and the highest proportions of adolescents with mental health issues, respectively. Using a purposive sampling method, 12 public junior high schools were chosen, 6 from East Jakarta and 6 from West Jakarta. Among them, 3 schools each in East and West Jakarta cities received the Healthy School Award. The Award is annually given to schools successfully complied with the SBMH program. In this study, private and Islamic schools were excluded since they have their own mental health programs. The data, both quantitative and qualitative, was collected at the same time, from May 6th to August 30th, 2021.

Samples/Participants

Samples for quantitative data were taken using purposive sampling techniques (Curtis & Drennan, 2013). The inclusion criteria were that the respondents work in public junior high schools and have experience in the implementation of school mental health programs (2018–2020). The exclusion criteria were the respondent's contract or outsourcing employment. Five (5) respondents were selected in each school including 1 school principal and 1 vice school principal with management responsibility for the SBMH program, 2 teachers providing mental health education, and 1 mental health counsellor delivering mental health counselling and screening. Accordingly, 60 respondents were selected, in which 30 were

schools with the Award and 30 were without the Award.

Regarding qualitative data, samples were also taken by purposive sampling (Creswell, 2020; Yin, 2009). Three ninth-grade students receiving all 3 services of the SBMH program were purposively selected from each school as informants. They had an experience of 1) receiving mental health education in class, 2) being screened for mental health issues, and 3) receiving counselling by a mental health counsellor in school. Accordingly, a total of 36 students were selected, 18 were from schools with the Awards and 18 were from schools without the Awards (Table 1).

Table 1 Number of respondents

Design	Sample Categories	Number of Respondents in Public Junior High Schools with the Healthy School Award			Number of Respondents in Public Junior High Schools without the Healthy School Award		
		East Jakarta	West Jakarta	Total	East Jakarta	West Jakarta	Total
Quantitative	Principal	3	3	6	3	3	6
	Vice of Principal	3	3	6	3	3	6
	Teacher	6	6	12	6	6	12
	School Counselor	3	3	6	3	3	6
Total		15	15	30	15	15	30
Qualitative	Students	9	9	18	9	9	18
Total		9	9	18	9	9	18

Instrument

This study used the same variables for both quantitative and qualitative data analysis. The quantitative data used questionnaires through the google form. Regarding dependent variable, the SBMH program was measured as a dichotomous variable (yes versus no). The schools currently implemented all three services of the SBMH program (i.e., regular mental health education in class, screening, and counselling of mental health issues), were categorized into the “yes” group. If schools did not implement any of the 3 services, they were categorized into the “no” group.

Regarding independent variables, four inhibiting and enabling factors associated with the implementation of the SBMH program were selected: (1) mental health activities in the curriculum; (2) collaboration with mental health providers; (3) coordination with

the health school team; and (4) improving the teachers' skills. All independent variables were measured as dichotomous variables (yes versus no). Specifically, if schools offered mental health activities (e.g., mental health education in class, screening, and counselling) in the curriculum, had collaboration with mental health providers (e.g., collaborate for the SBMH activities with PUSKESMAS [Public Health Centers], Psychology or Psychiatry, Faculty of Counselling Education, and Faculty of Psychology or Psychiatry), had coordination with the health school team (e.g., coordination with school committee, principal, health counsellor, student organization, teachers by routine meeting), and offered education to improve the teacher's mental health skills (e.g., Public Health Centers trained mental health skills for teachers), they were classified into the “yes” group. Otherwise, they were categorized into the “no” group.

The semi-structured interview guide was used to collect the qualitative data. Information from the students regarding receiving mental health education, mental health screening, and mental health problem intervention, as well as the enabler and barrier factors to receiving it, was explored by using the interview guides.

Data Collection

Quantitative data were collected using a 20-minute-long structured questionnaire through the Google form with the 60 respondents. The questionnaire was developed by referring to the guidance developed by the Indonesian Ministry of Health and Ministry of Education. Specifically, the Health Information Book for Junior High School Students, the Document of Strategies for Preventing and Controlling Mental Health Issues, and the Counseling Book at the Level of Junior High School were utilized. We acquired the email addresses and WhatsApp numbers of the 60 respondents under their agreement in the consent form. Then the questionnaire was sent to the email addresses and WhatsApp numbers as well. **Table 1** presents a summary of the sample for the quantitative analysis.

Qualitative data were collected using semi-structured interview questions through a face-to-face online interview with the 36 students. The qualitative questions were developed by using the same references with the questionnaire for the quantitative data. Six research assistants who have a background in public health knowledge with experience of qualitative data collection assisted us to collect the data. Training was provided for 3 days prior to the data collection and focused on how to probe the students' information. We and the assistants interviewed the students one by one, and each interview took approximately 45 minutes.

Data Analysis

Quantitative analysis aimed to examine the SBMH program implementation in terms of the dependent (i.e., the SBMH program) and independent variables (i.e., inhibiting and enabling factors related to the SBMH program implementation) between schools with and without Health School Award. Specifically, descriptive statistics were conducted to present the frequencies and percentages of the study sample and variables by using software.

Qualitative analysis has the same purpose with the quantitative analysis (i.e., explore the SBMH program, and inhibiting and enabling factors of the implementation between the schools with and without the Health School Award). Specifically, content analysis was applied in the study using Microsoft Excel. The transcripts of 36 interviews (18 from schools with the Healthy School Award and 18 from schools without the Award) were examined to identify the text relating to the purpose. Sections of the text related to SBMH program, and inhibiting and enabling elements were integrated into one text to constitute a topic area. This text was separated into 268 meaning units, which were then reduced, abstracted, and coded. During the condensing and coding processes, the context as a whole was taken into account. The codes were classified into 11 categories, and 35 subcategories based on differences and similarities between schools with the Award and schools without it.

The quantitative and qualitative results were merged to answer the same questions. The data were combined for triangulation and to confirm the qualitative findings from the interviews using quantitative data. This was demonstrated in the discussion part to demonstrate the extent to which the data converges.

Validity and Reliability

The questionnaire was used as a pre-test at two Jakarta schools that were not part of the main study. The validity test conducted the test per item of questions by using Pearson correlation and significance (2-tailed). A valid question is whether the Pearson correlation is positive and significant (2-tailed) < 0.05 . Six questions of dependent variables (the outcomes of SBMH program implementation) were invalid (>0.05), then the question was re-arranged. Similar to the validity test, the reliability test also conducted the test per item using questions by Alpha Cronbach's 0.60 considered acceptable or valid for exploratory purposes.

Triangulation is defined as the strategy (test) to improve the validity and reliability of research or evaluation of findings. Quantitative and qualitative methods were employed in this study. The triangulation is conducted by comparing the quantitative and qualitative data to check if there were any different information and found the main category of the theme in the schools.

Ethical Considerations

This study was approved by the Committee for Research Ethics (Social Sciences) in the faculty of social sciences and humanities Mahidol University (2021/044/1904), and the faculty of health sciences' ethics committee in Jakarta Islamic State University Syarif Hidayatullah (Un.01/F.10/KP.01.1/KE.SP/02.08.013/2021).

Results

The School Based Mental Health (SBMH) Program Between Schools

The SBMH program are mental health education at class, screening for mental health problems, and counselling for mental health problems. Among the schools with the award, 27 schools (90%) provided classroom mental health education. Meanwhile,

among those without the award, 25 schools (83.3%) provided classroom mental health education -- lower than that at schools with the award. Among the awarded schools, 18 schools (60%) provided screening for mental health problems. This is higher for the schools without the award (46.7%). Regarding counselling for mental health problems, percentage of schools without the award was higher than those with the award. There were 22 schools with the award (73.3%) providing counseling, while only 26 for the schools without the award (86.7%). It is because, the number of students with emotional and mental problems was greater at the schools without the Award (70% schools) than those at schools with the Award (40% schools) as show in **Table 2**. In sum, all the three services (classroom mental health education, screening for mental health difficulties, and counseling for mental health problems) in both categories were not applied 100%.

Table 2 Distribution of the SBMH program implementation between the school groups with and without healthy school award

SBMH	School with Healthy School Award (n=30)			School without Healthy School Award (n=30)		
	Implementation Status	n	%	Implementation Status	n	%
Mental health education in class	No	3	10.0	No	5	16.7
	Yes	27	90.0	Yes	25	83.3
	Total	30	100	Total	30	100
Screening for mental health difficulties	No	12	40.0	No	16	53.3
	Yes	18	60.0	Yes	14	46.7
	Total	30	100	Total	30	100
Counseling of mental health problems	No	8	26.7	No	4	13.3
	Yes	22	73.3	Yes	26	86.7
	Total	30	100	Total	30	100

The factors inhibiting and enabling schools to implement the SBMH program. Regarding mental health activities in the curriculum, schools with the award (70%) and schools without the award (73.3%) were found to inhibit the implementation instead of enabling it (30% at schools with the award and 26.7% at those without the award). Collaboration with mental health services was found enabled SBMH program implementation at schools without award (53.5%) and at schools with award (60%) rather than impeded it (46.7% at schools without award and 40% at schools with award). Coordination with the healthy school team was found to support SBMH program implementation at schools with awards (60%) and at schools without awards (56.7%) rather than impeded it (43.3%at schools

without awards and 40%at schools with awards). Mental health skills training for teachers was found to impede implementation at schools without award 63.3% and at schools with award 56.7% rather than support it (43.3% at schools with award and 36.7% at schools without award) as show in **Table 3**.

Collaboration with mental health services and coordination with health school teams were found high in percentage in supporting schools to implement SBMH program. On the other hand, mental health activities in curriculum, and mental health skills training for teachers were found high in percentage in impeding schools to implement SBMH program.

The Inhibiting and Enabling Factors of the SBMH Program Implementation between Schools

Table 3 Distributions of the inhibiting and enabling factors of the SBMH program implementation between the school group with and without the healthy school award

Variables		School with Healthy School Award Status (n=30)		School without Healthy School Award Status (n=30)	
		Respondents (n)	Percentage (%)	Respondents (n)	Percentage (%)
Mental health activities in the curriculum	Inhibiting	21	70	22	73.3
	Enabling	9	30	8	26.7
	Total	30	100	30	100
Collaboration with mental health providers/professionals/external counsellor	Inhibiting	12	40	14	46.7
	Enabling	18	60	16	53.3
	Total	30	100	30	100
Coordination with school health team	Inhibiting	13	43.3	12	40
	Enabling	17	56.7	18	60
	Total	30	100	30	100
Teachers' mental health skills training	Inhibiting	17	56.7	19	63.3
	Enabling	13	43.3	11	36.7
	Total	30	100	30	100

The School Based Mental Health (SBMH) Program Between Schools

Table 4 Categories and sub-categories of SBMH program implementation to the schools with and without healthy school award

Categories	Sub-Categories	
	Schools with the Award	School without the Award
Online mental health education	Guidance and Counseling Subject	Guidance and Counseling Subject
	In every mandatory subject	
	In extracurricular activities	
Student's mental and emotional problem screening	Not available due to bad Internet connection	Not available, the schools only delivered the mandatory subjects
	Gform questionnaire from Guidance and Counseling teacher in the Guidance and Counseling Subject	Gform questionnaire from Guidance and Counseling teacher in the Guidance and Counseling Subject
	Gform Questionnaire from Teachers of Mandatory subjects	
Counseling on mental health issues for students	Available but difficult opened the Gform link	Not available
	Online counseling through online application by classroom teacher	Online counseling through online application by guidance and counseling teacher
	Meeting the teacher directly	
	In Guidance and Counseling Class	
	No counseling activities	No counseling activities

Based on interviews with students of schools with the award, most students received mental health service like Mental Health Education by online class during general subject or special class on guidance and counseling. Although they have bad internet connections, the students still got Education on how to manage their mental health, especially during the Pandemic. But in the schools without award, the student only received mental health education in Guidance and Counseling class by online. The

schools prioritized mandatory subjects than others. Further, the screening of mental health issues in the schools with Award, most students have experienced mental health problem screening through Guidance and Counseling class by related teachers. Questionnaire with questions related to students' mental condition like 'What do you feel?', 'Are you so afraid?', 'Did you ever tremble?', 'Did you ever hard to sleep?', 'Not good to eat?', Etc. The questionnaires were provided in the form of Gform

that, in fact, sometimes hard to open by students. Here is some of the quotes made by students:
 "... Guidance and Counseling teacher often gave us quizzes questioning our mental condition..." (S1:A1, A2, A3, A5, A7)

Meanwhile, students at schools without the awards did not receive any mental health screening services.
 "I never received any health screening during studying here" (S2: A5, A7, A9, A14, A17)

Furthermore, counseling on mental health was mostly obtained by students of the school with award by online, either by counselor teacher or classroom teacher, or by offline. It was similar to the students at

school without award, but the students only received it from the counselor teacher and any students did not receive it.
 "if I have any problems, I tell it to Guidance and Counseling teacher by using WhatsApp..." (S2: A3, A9, A13, A15, A16)

Students of the school with award explained that they have received mental health education service in their classes (like life skill education), mental health problem screening, and mental health problem counseling from their schools. Whereas for students of school without award, they have not received any services as those received by students of schools with the Award. It occurred because they focused more on mandatory subjects than others.

The Inhibiting and Enabling Factors of the SBMH Program Implementation between Schools

Table 5 Categories and sub-categories of inhibiting factors and supporting factors for SBMH program implementation in the schools with and without healthy school award

Categories	Sub-Categories	
	School with Healthy School Award	School without Healthy School Award
Mental health activities in curriculum inhibiting the SBMH program	Unconducive the classroom situations	Unconducive the classroom situations There is no mental health program the school provides slightly the counsellor teacher (1 or 2 teachers) for all levels
	students peer group	Students' negative perceptions
	Students' negative perceptions	Students do not like the subject
No collaboration inhibiting the SBMH Program	-	No coordination between school, teachers and external counselors
Less coordination to manage mental health programs inhibits the SBMH Program.	the schedule and length of time for the counselling	the length of time for the counselling
Teachers have no mental health skills	Fierce teachers	A low number of teachers Fierce teachers
Mental health in curriculum supporting the implementation of SBMH	As school subjects, as school extracurricular	As school subjects, as school extracurricular
	students need the mental health program	students need the mental health program
	Peer group (classmates)	Peer group (classmates)
Collaboration with the external counsellor supporting the implementation of SBMH	Collaboration with University, public health center, District Health and Education Office Collaboration with Parents	No have collaboration
Coordination to manage the mental health intervention supporting the implementation of SBMH	Between teachers knew the student's condition (Meeting between them)	Between teachers knew the student's condition (Meeting between them)
	Parents involvement	-
Teachers' skills supporting the implementation of SBMH	a good explainer, and as a counsellor	a good explainer

Based on interviews with students of schools with the award, mental health activity in the curriculum was found to be inhibiting factors due to negative perceptions of the SBMH program and the lack of peer support. Meanwhile, the lower number of counselor teachers (1-2 teachers for all levels) was explained by the students at schools without the award. Uninteresting activities related to mental health, like guidance and counseling, also became inhibiting factors for mental health activity in the curriculum.

"It's a boring subject; actually, I don't like it because it's mandatory, so I must follow it." (S1: A7, A16; S2: A3, A8, A9)

Based on interviews with students of schools with the Award, since the schools had collaboration with any university with the psychology department, guidance and counseling, puskesmas, education service office, and health service office, as well as parents and students, the SBMH program was still implemented. A different condition was found in students of schools without the award, in which the students explained that there was no collaboration with any counselor outside the schools; only the guidance and counseling teacher handled it.

Less coordination with the healthy school team was found in schools with and without the Award. Both students of schools with and without the Award explained that unclear schedule and duration for counseling as well as vicious teachers became inhibiting factors for them to accept any required mental health service. However, students of schools with the Award explained that there was coordination among teachers since the teachers knew their student's academic and non-academic conditions. Parent involvement was also found from interviews with students.

"I must follow what the homeroom teacher and counselor teacher said. They would ask me to come to the counseling room and do the counseling to solve my problems, sometimes with my parents too." (S1: A1, A2, A3, A11)

Such factor supported SBMH program to be implemented although in the Pandemic. And it was not found in students of schools without the Award.

"It was only one hour, and it was not routine." (S2: A7, A8, A17, A19)

Teachers with less mental health skill or counselor, added with online teaching and learning process became inhibiting factor for students to obtain SBMH program, especially for schools without the award. Different for schools with the award, their students explained that, although by online, their teachers still could deliver counseling services and the services were easy to understand. Therefore, teacher's skill supported SBMH program.

Finally, it can be concluded that mental health activity in the curriculum, school collaboration with mental health services, healthy school team coordination, and mental health skill training can be inhibiting and supporting factors for the SBMH program in both school categories. For schools with the award, such factors supported more on the implementation of the SBMH program since it was already routinely conducted before the pandemic.

Discussion

This study aimed to explore enabling and inhibiting factors related to the implementation of the SBMH program in 12 public junior high schools of Jakarta. It describes the SBMH program including its implementation and any inhibiting and supporting factors. A comprehensive mental health program should be part of a comprehensive school health program as well. Primary prevention and health promotion (level I and level II) programs consist of promoting Psychosocial Competence such as life-skill education and mental health education such as what included in general health education of the curriculum and those applied to the student and the parents, the secondary prevention (level III) and tertiary prevention (level IV) programs for psychosocial and mental health problems consist of identifications such as screening of students' mental health and Interventions such as school-based health centers, crisis intervention, and referral resources (Hendren et al., 1994). Based on the quantitative and qualitative results, both categories of schools have implemented the primary prevention and health promotion (level I and level II), the secondary prevention (level III) and tertiary prevention (level IV) programs. But, during the Pandemic, most the schools were not deliver all services to the students. Schools were still implementing SBMH programs comprehensively because they were able to adapt using Internet

technologies like Google Apps and other social media. It is similar to the other countries such as US, and Singapore; during the epidemic, SBMH was crucial for detecting and treating children's mental illness. With a decrease in access to outside services, SBMH was able to continue because of the utilization of telehealth and other cutting-edge strategies (Alleyne et al., 2021; Renjan & Fung, 2020).

According to the previous research, students of the junior high schools and the senior high schools in Indonesia suffered mental and emotional problems during the pandemic (Addini et al., 2022). National Survey on Indonesian Teenager's Mental Health of 2022 shows that 15.5 million of the teenagers (34.9%) experienced mental health issues in the last 12 months and 2.45 million of the teenagers (5.5%) experienced mental issues in the last 12 months. And, only 2.0% of them who obtained Counseling Services (Center for Reproductive Health, 2022).

Schools are educational institutions targeted for effective mental health programs/interventions (Glasgow et al., 2006; Guerra et al., 2019; Hendren et al., 1994; Proctor et al., 2011; Veltro et al., 2015; Wolpert et al., 2015). Technical support and guidance from government agencies related to mental health programs in schools are strategy possible to improve the implementation of the program (D'Angelo et al., 2017; Williams et al., 2018; Wolpert et al., 2015). Based on the research conducted by Jing Xiao, et al (Xiao et al., 2020) and also research conducted by Li et al (Li & Leung, 2020), more than 40% of the students intended to utilize online counseling service to assist in improving and to reduce any mental health problems suffered by such students. The results show that any depressed student who thinks that his/her previous experience with counseling was effective will have more possibility to use the online counseling service in future.

The SBMH implementation to Public Junior High Schools (SMPN) in Jakarta is determined by supporting and inhibiting factors of the program implementation. Shortel developed a framework for improving the quality of health care through change strategies at various levels which are the individual level, group or team level, organizational level, and the larger system/environment level (Ferlie & Shortell, 2001; Shortell, 2004). Strategy implementation is a way for health

programs/interventions to be implemented and successfully achieve program objectives. Each level influences the other to produce quality health services. If there is a level of strategy that is problematic or does not work then the other levels will be affected too (Ferlie & Shortell, 2001; Powell, 2014).

At broader level, there is a policy of integrating the school health effort program. The previous studies found that a Comprehensive School Health Effort program is the strategy for the success of schools in implementing mental health program (Veltro et al., 2015; Weist et al., 2017). Mental health activities in the compulsory curriculum and extra-curricular (Scouting, Adolescent Red Cross, School Health Unit) are implemented by schools with the award so that teachers, guidance and counseling teachers, budgets and equipment used for program implementation are included into routine school activities. In contrast to schools without the award, most schools in this group separate school health programs from compulsory school programs. The schools need to adjust it to the policy. At organizational level, collaboration with mental health services/external counselors is the strategies to support schools provide mental health services for students, and facilitate the teachers to improve their mental health skills (Alleyne et al., 2021; Hendren et al., 1994). The forms of collaboration carried out vary depending on the needs of the school (Kementerian Kesehatan Republik Indonesia, 2018; Wolpert et al., 2015). But schools also have difficulty in collaborating with health care providers who have mental health services because not all Public Health Centers have them (Center for Reproductive Health, 2022). Support from outside the school for assistance in the provision of mental health services helps schools apply comprehensive health services (Ferlie & Shortell, 2001; Wolpert et al., 2015).

Furthermore, comprehensive mental health services in schools are provided by the team through a program management coordination strategy with the healthy school team (Ferlie & Shortell, 2001). Previous studies found that the lack of teachers and school staff who have expertise in mental health (individual levels change) can be an obstacle for schools to coordinate and implement the program (group levels change), especially in public schools (Askeff-Williams et al., 2013; Weist et al., 2017; Wolpert et al., 2015). Teams are powerful levers to

make a change (Ferlie & Shortell, 2001). Mental health skills training for teachers is essential to support program integrity (Emerson et al., 2020; Vroom et al., 2020). Based on the previous studies, the quality of health services is influenced by the skills or expertise of the service provider (Askeff-Williams & Cefai, 2014; Askeff-Williams et al., 2013; D'Angelo et al., 2017). Mentoring after training and the existence of clear technical guidelines make it easier for teachers to implement mental health programs in schools (Ingersoll & Strong, 2011; Scherer, 1999). Teachers feel confident in providing mental health services after being given training (Graham et al., 2011; Jorm et al., 2010). In addition, teachers also go some problems to use the technology. Therefore, the government needs to organize teacher training for the use of internet technology with TOT (Training of Trainers) as the technique to improve teachers' skills (Askeff-Williams & Cefai, 2014). The government also needs to consider developing a strategy in the form of a mental health application for internet-based schools that is easy for teachers to use (Renjan & Fung, 2020).

Policy implication, the government needs to develop technical policies that make it easier for schools to implement them with adherence to the target of implementation according to the policy. In addition, technical policies are developed by synchronizing and adjusting them with regulations that apply to schools, such as the School Health Regulation, School Counseling Guidance Regulations, Standard of Curriculum, and Child-Friendly School Regulation. Strategies for the campaign, assistance, and tiered supervision need to be developed as an effort to develop the teams of healthy schools and to improve the quality of mental health services in schools by using technology. The development of internet-based mental health service applications for schools is needed. Collaboration with internet providers is also a necessity to facilitate school activities including mental health service activities.

Quantitative and qualitative methods applied in different respondents provide a clearer picture of the intervention programs actually available in schools. Qualitative methods provide an explanation regarding the results obtained in a descriptive-quantitative manner (Creswell, 2020). The use of qualitative methods is aimed at students as targets of the intervention program who receive mental

health services provided by schools. However, the use of two methods with two kinds of respondents, consisting of program implementers and targets in 2 different categories of school, is sufficient to explain how the SBMH program was implemented in an organizational context (Creswell, 2020). By following previous research using different methods, cross-sectional, and measuring the perspective of program implementers and recipients providing results might be describing the real implementation of the program (Askeff-Williams et al., 2013).

Conclusion

Not all schools implemented SBMH like classroom, screening, and counseling mental health issues at school. Mental health activities in curriculum and teachers' skills become inhibiting factor for the schools to implement SBMH program. Collaboration between schools and mental health service providers as well as coordination between healthy school teams were supporting the schools to implement programs. Therefore, schools can optimize implementation of collaboration with mental health service providers and coordination between healthy school teams. Local government needs to provide health facilities with mental health services and equipment and experts as case references, knowledge, and skills to support schools. Central Government needs to include mental health contents in national education curriculum. Development of easy and accessible online application for SBMH to students, teachers, and parents is really required during or post-Pandemic in this digital era.

Declaration Conflicting Interest

The authors have no conflicts of interest to declare.

Funding

Ministry of Religious Affairs, Republic of Indonesia.

Acknowledgment

Thanks to counselor teachers in West and East Jakarta of Public Junior High Schools who have assisted in the data collection and validation process.

Author Contribution

Conceptualization: RKW, SCP; Data curation: RKW; Formal analysis: RKW, SCP; Funding acquisition: RKW; Investigation: RKW; Methodology: all authors; Project administration: RKW; Resources: RKW; Software: RKW; Supervision: all authors; Validation: all authors; Visualization: RKW; Writing—original draft: all authors; Writing—review & editing: RKW, SCP.

Author Biography

Riastuti Kusuma Wardani is a Student at Department of Society and Health, Faculty of Social Sciences and Humanities, Mahidol University, Thailand.

Seung Chun Paek is a Lecturer at Department of Society and Health, Faculty of Social Sciences and Humanities, Mahidol University, Thailand.

Sauwakon Ratanawijitrasin is a Lecturer at Department of Society and Health, Faculty of Social Sciences and Humanities, Mahidol University, Thailand.

Darunee Phukhao is a Lecturer at Department of Society and Health, Faculty of Social Sciences and Humanities, Mahidol University, Thailand.

References

- Addini, S. E., Syahidah, B. D., Putri, B. A., & Setyowibowo, H. (2022). Kesehatan mental siswa SMP-SMA Indonesia selama masa pandemi dan faktor penyebabnya. *Psychopolytan: Jurnal Psikologi*, 5(2), 107-116.
- Alfianto, A., Safitri, A., & Keperawatan, I. (2019). Self-efficacy of students with early psychotic symptoms in seeking help through mental school health efforts. *Jurnal Ilmu Kesehatan*, 3(1), 7-11.
- Alleyne, S., Pruitt, D. B., & Hoover, S. H. (2021). School's out: what happened to School-Based Mental Health Services (SBMHS) in the COVID-19 era? *Journal of the American Academy of Child and Adolescent Psychiatry*, 60(10), S10. <http://doi.org/10.1016/J.JAAC.2021.07.056>
- Amalianingsih, R., & Herdi, H. (2021). Studi literatur: faktor pendukung dan penghambat dalam penyelenggaraan program bimbingan dan konseling di sekolah menengah kejuruan. *Jurnal Bimbingan dan Konseling Terapan*, 5(1), 50-56. <http://doi.org/10.30598/jbkt.v5i1.1071>
- Apriyanti, T. (2021). Optimalisasi layanan bimbingan dan konseling. *Didaktika Aulia*, 1(1), 57-74.
- Askill-Williams, H., & Cefai, C. (2014). Australian and Maltese teachers' perspectives about their capabilities for mental health promotion in school settings. *Teaching and Teacher Education*, 40, 61-72. <http://doi.org/10.1016/j.tate.2014.02.003>
- Askill-Williams, H., Dix, K. L., Lawson, M. J., & Slee, P. T. (2013). Quality of implementation of a school mental health initiative and changes over time in students' social and emotional competencies. *School Effectiveness and School Improvement*, 24(3), 357-381. <http://doi.org/10.1080/09243453.2012.692697>
- Borualogo, I. S., & Casas, F. (2022). Subjective well-being of children and adolescents during the COVID-19 pandemic in Indonesia: Two data collections. *Current Psychology*, 1-13. <http://doi.org/10.1007/s12144-022-03346-x>
- Center for Reproductive Health. (2022). National Adolescent Mental Health Survey (I-NAMHS) Report. <https://www.geastudy.org/all-reports/indonesia-national-adolescent-mental-health-surveys-namhs>
- Chadda, R. K. (2018). Youth & mental health: Challenges ahead. *The Indian Journal of Medical Research*, 148(4), 359. <http://doi.org/10.4103/ijmr.IJMR>
- Creswell, J. W. (2020). *Educational research: Planning, conducting, and evaluating quantitative and qualitative research*. Pearson Higher Ed.
- Curtis, E. A., & Drennan, J. (2013). *Quantitative Health Research, Quantitative Health Research*. New York: McGraw-Hill Inc.
- D'Angelo, G., Pullmann, M. D., & Lyon, A. R. (2017). Community engagement strategies for implementation of a policy supporting evidence-based practices: a case study of Washington state. *Administration and Policy in Mental Health and Mental Health Services Research*, 44, 6-15. <http://doi.org/10.1007/s10488-015-0664-7>
- Emerson, L.-M., De Diaz, N. N., Sherwood, A., Waters, A., & Farrell, L. (2020). Mindfulness interventions in schools: Integrity and feasibility of implementation. *International Journal of Behavioral Development*, 44(1), 62-75.
- Erikson, E. H. (1993). *Childhood and society*. WW Norton & Company. <http://doi.org/10.1007/s10856-007-0140-3>
- Ferlie, E. B., & Shortell, S. M. (2001). Improving the quality of health care in the United Kingdom and the United States: a framework for change. *The Milbank Quarterly*, 79(2), 281-315. <http://doi.org/10.1111/1468-0009.00206>
- Fitria, Y., & Maulidia, R. (2018). Hubungan antara dukungan sosial keluarga dengan kesehatan jiwa remaja di SMPN kota malang. <https://repository.unej.ac.id/handle/123456789/104550>
- Fitriani, E., Neviyarni, N., Mudjiran, M., & Nirwana, H. (2022). Problematika layanan bimbingan dan konseling di sekolah. *Naradidik: Journal of Education and Pedagogy*, 1(3), 174-180. <http://doi.org/10.24036/nara.v1i3.69>
- Glasgow, R. E., Klesges, L. M., Dzewaltowski, D. A., Estabrooks, P. A., & Vogt, T. M. (2006). Evaluating the impact of health promotion programs: using the RE-AIM framework to form summary measures for decision making involving complex issues. *Health Education Research*, 21(5), 688-694. <http://doi.org/10.1093/her/cyl081>
- Graham, A., Phelps, R., Maddison, C., & Fitzgerald, R. (2011). Supporting children's mental health in schools: Teacher views. *Teachers and Teaching*, 17(4), 479-496.
- Guerra, L. A., Rajan, S., & Roberts, K. J. (2019). The implementation of mental health policies and practices in schools: An examination of school and state factors. *Journal of School Health*, 89(4), 328-338. <http://doi.org/10.1111/josh.12738>
- Gustina. (2017). *Transformation of School Health Programs*. Jakarta: Direktorat Kesehatan Keluarga.
- Hanurawan, F. (2012). Strategi pengembangan kesehatan mental di lingkungan sekolah. *Jurnal Bimbingan Dan*

- Konseling*, 14(2), 93. <http://doi.org/10.12928/psiko-pedagogia.v1i1.2572>
- Harini, P., Kurnia, A., Yuanah, S., & Kaloeti, V. (2021). Intervensi kesehatan mental pada pelajar saat pandemi covid-19: Studi literatur sistematis. *Proceeding of Inter-Islamic University Conference on Psychology*.
- Hendren, R., Birrell Weisen, R., & Orley, J. H. (1994). *Mental health programmes in schools*. Geneva: World Health Organization
- Ingersoll, R. M., & Strong, M. (2011). The impact of induction and mentoring programs for beginning teachers: A critical review of the research. *Review of Educational Research*, 81(2), 201-233.
- Jorm, A. F., Kitchener, B. A., Sawyer, M. G., Scales, H., & Cvetkovski, S. (2010). Mental health first aid training for high school teachers: a cluster randomized trial. *BMC Psychiatry*, 10(1), 1-12.
- Kementerian Kesehatan Republik Indonesia. (2018). *Kebijakan, Program, dan Tindakan Direktorat Pencegahan dan Pengendalian Masalah Kesehatan Jiwa dan NAPZA*. Jakarta: Kementerian Kesehatan Republik Indonesia
- Kementerian Pendidikan dan Kebudayaan Indonesia. (2016). *Pedoman Pelaksanaan Konseling dan Bimbingan di SMP, Ditjen Guru dan Tenaga Kependidikan Kemendikbud*. Jakarta: Kementerian Pendidikan dan Kebudayaan Indonesia.
- Kessler, R. C., Amminger, G. P., Aguilar-Gaxiola, S., Alonso, J., Lee, S., & Üstün, T. B. (2007). Age of onset of mental disorders: a review of recent literature. *Current Opinion in Psychiatry*, 20(4), 359-364. <http://doi.org/10.1097/YCO.0b013e32816ebc8c>
- Kuswadi, E. (2019). Peran lingkungan sekolah dalam pengembangan mental siswa. *EL-BANAT: Jurnal Pemikiran Dan Pendidikan Islam*, 9(1), 62-78. <http://doi.org/10.54180/elbanat.2019.9.1.62-78>.
- Lansford, J. E., & Banati, P. (2018). *Handbook of adolescent development research and its impact on global policy*. Oxford University Press.
- Li, T. M., & Leung, C. S. (2020). Exploring student mental health and intention to use online counseling in Hong Kong during the COVID-19 pandemic. *Psychiatry and Clinical Neurosciences*, 74(10), 564. <http://doi.org/10.1111/pcn.13117>
- Murdhiono, W. R., & Wiyani, C. (2019). *Manajemen stres sebagai upaya mengelola stres Siswa SMP Negeri 2 Ngemplak Sleman Yogyakarta*. Prosiding Seminar Nasional Multidisiplin Ilmu.
- Nishio, A., Kakimoto, M., Bermardo, T. M. S., & Kobayashi, J. (2020). Current situation and comparison of school mental health in ASEAN countries. *Pediatrics International*, 62(4), 438-443. <http://doi.org/10.1111/ped.14137>
- Pinchoff, J., Friesen, E. L., Kangwana, B., Mbushi, F., Muluve, E., Ngo, T. D., & Austrian, K. (2021). How has COVID-19-related income loss and household stress affected adolescent mental health in Kenya? *Journal of Adolescent Health*, 69(5), 713-720. <http://doi.org/10.1016/J.JADOHEALTH.2021.07.023>
- Powell, B. J. (2014). *A mixed methods multiple case study of implementation as usual in children's social service organizations*. Washington University in St. Louis. <https://doi.org/10.1186/1748-5908-8-92>
- Proctor, E., Silmere, H., Raghavan, R., Hovmand, P., Aarons, G., Bunger, A., Griffey, R., & Hensley, M. (2011). Outcomes for implementation research: conceptual distinctions, measurement challenges, and research agenda. *Administration and Policy in Mental Health and Mental Health Services Research*, 38, 65-76. <http://doi.org/10.1007/s10488-010-0319-7>.
- Putri, R., Hastuti, T., & Nurhuda, N. (2018). Analisis pelaksanaan bimbingan dan konseling (studi kasus pada mata pelajaran ekonomi kelas X IPS SMAN 1 Peranap Kabupaten Indragiri Hulu). *PEKA*, 6(1), 31-37.
- Renjan, V., & Fung, D. S. (2020). Debate: COVID-19 to the under 19—a Singapore school mental health response. *Child and Adolescent Mental Health*, 25(4), 260-262. <http://doi.org/10.1111/camh.12426>
- Romadhon, A. F. (2016). Faktor-faktor yang mempengaruhi minat dan motivasi memanfaatkan layanan bimbingan dan konseling. *Jurnal Riset Mahasiswa Bimbingan Dan Konseling*, 5(12).
- Sasmita, H. (2018). Peningkatan kesehatan jiwa remaja melalui Usaha Kesehatan Jiwa Sekolah (UKJS) di SMU 12 Kota Padang. *Menara Ilmu*, 12(6).
- Scherer, M. (1999). *A better beginning: Supporting and mentoring new teachers*. ASCD.
- Shortell, S. M. (2004). Increasing value: a research agenda for addressing the managerial and organizational challenges facing health care delivery in the United States. *Medical Care Research and Review*, 61(3_suppl), 12S-30S. <http://doi.org/10.1177/1077558704266768>
- Sulistiawati, N. M. D., Keliat, B. A., Wardani, I. Y., Aldam, S. F. S., Triana, R., & Florensa, M. V. A. (2019). Comprehending mental health in Indonesian adolescents through mental, emotional, and social well-being. *Comprehensive Child and Adolescent Nursing*, 42(sup1), 277-283. <http://doi.org/10.1080/24694193.2019.1594460>
- United Nations Children's Fund. (2021a). Life in lockdown: Child and adolescent mental health and well-being in the time of COVID-19. <https://www.unicef-irc.org/publications/pdf/Life-in-Lockdown.pdf>
- United Nations Children's Fund. (2021b). The State of The World's Children 2021: On My Mind- Promoting, Protecting and Caring for Children's Mental Health. <https://www.unicef.org/indonesia/id/laporan/state-worlds-children-2021>
- Veltro, F., Ialenti, V., Iannone, C., Bonanni, E., & Morales García, M. A. (2015). Promoting the psychological well-being of Italian youth: A pilot study of a high school mental health program. *Health Promotion Practice*, 16(2), 169-175. <http://doi.org/10.1177/1524839914533965>

- Vroom, E. B., Massey, O. T., Yampolskaya, S., & Levin, B. L. (2020). The impact of implementation fidelity on student outcomes in the life skills training program. *School Mental Health, 12*, 113-123.
- Weist, M. D., Bruns, E. J., Whitaker, K., Wei, Y., Kutcher, S., Larsen, T., Holsen, I., Cooper, J. L., Geroski, A., & Short, K. H. (2017). School mental health promotion and intervention: Experiences from four nations. *School Psychology International, 38*(4), 343-362. <http://doi.org/10.1177/0143034317695379>
- Williams, C. K., Strickland, A. L., Riggs, N. R., Dyett, A. R., Gibson, Z. R., & Pulskamp, A. D. (2018). Colorado healthy schools smart source: Testing the association between collaboration with community mental health centers and tier 2 implementation. *School Mental Health, 10*, 163-172. <http://doi.org/10.1007/s12310-018-9247-6>
- Wolpert, M., Humphrey, N., Deighton, J., Patalay, P., Fugard, A. J. B., Fonagy, P., Belsky, J., & Panos, V. (2015). An evaluation of the implementation and impact of England's mandated school-based mental health initiative in elementary schools. *School Psychology Review, 44*(1), 117-138.
- World Health Organization. (1998). *Mental Health Promotion for School children*. Geneva: World Health Organization.
- World Health Organization. (2015). *Global School-based Student Health Survey Indonesia*. Geneva: World Health Organization.
- World Health Organization. (2018). Mental Health Atlas. <https://www.who.int/ncds/surveillance/gshs/datasets/en/>
- Xiao, J., Jiang, Y., Zhang, Y., Gu, X., Ma, W., Zhuang, B., Zhou, Z., Sang, L., Luo, Y., & Lian, Y. (2020). The impact of psychology interventions on changing mental health status and sleep quality in university students during the COVID-19 pandemic. *MedRxiv*, 2020.2009.2001.20186411. <https://doi.org/10.1101/2020.09.01.20186411>
- Yang, C., Bear, G. G., & May, H. (2018). Multilevel associations between school-wide social-emotional learning approach and student engagement across elementary, middle, and high schools. *School Psychology Review, 47*(1), 45-61. <http://doi.org/10.17105/SPR-2017-0003.V47-1>
- Yin, R. K. (2009). *Case study research: Design and methods* (Vol. 5). Sage.
- Yuniar, D., & Darmawati, I. (2017). Dukungan keluarga berhubungan dengan kecerdasan emosional remaja. *Jurnal Keperawatan Komprehensif (Comprehensive Nursing Journal), 3*(1), 9-17.

Cite this article as: Wardani, R. K., Paek, S. C., Ratanawijitrasin, S., & Phukhao, D. (2023). Exploring the implementation of the school-based mental health program for adolescents in Indonesia: A mixed-methods study. *Public Health of Indonesia, 9*(4), 164-176. <https://doi.org/10.36685/phi.v9i4.751>