

MEDIA RELEASE

Date of Issue: 19 September 2024

Excessive social media use, body image concerns and being cyberbullied are significantly linked to mental health symptoms among youths.

1. About 1 in 3 young people (30.6%) aged between 15 and 35 years in Singapore reported experiencing severe or extremely severe symptoms of depression, anxiety and/or stress. Those who experienced cyberbullying, had moderate to severe concerns about their body shape or spent more than three hours daily on social media were more likely to report these symptoms.
2. Among those who reported having severe or extremely severe mental health symptoms, about 2 in 3 (69.1%) sought help via informal or formal mental health support and/or services. Young people with higher levels of resilience, perceived social support, and self-esteem were less likely to experience severe or extremely severe symptoms of depression, anxiety and/or stress.
3. These are among the first tranche of findings from the National Youth Mental Health Study (NYMHS) initiated in 2022 to assess the state of mental health among the Singapore resident population aged 15 – 35 years. The nationwide epidemiological study established the prevalence of severe symptoms of depression, anxiety, stress, along with their associated factors including cyberbullying, body shape concerns, and excessive social media use, as well as the treatment gap and sources of support among young people here. It is important to note that the severe or extremely severe mental health symptoms reported in this study do not necessarily indicate a mental disorder.
4. The NYMHS was spearheaded by the National Healthcare Group's Institute of Mental Health (IMH) in collaboration with the Ministry of Health (MOH), CHAT (Centre of Excellence for Youth Mental Health) and NUS Saw Swee Hock School of Public Health (SSHSPH). It involved face-to-face interviews with 2,600 young people between October 2022 and June 2023. The participants completed a compilation of short scales and questionnaires that collected self-reported information on their sociodemographic background, mental health and well-being, general feelings about themselves, experiences in school or workplace, social support, and lifestyle behaviours. The results generated from this study are representative of the youth population in Singapore. [*Please see Annex A for details on how the study was conducted and scales used.*]
5. "Navigating the complexities of youth is challenging enough, but young people today are grappling with unique issues that previous generations did not. For instance, social media exposes them to constant comparisons, intensifying concerns about body image. The anonymity of the online world has also given rise to cyberbullying, which adds a new dimension of harassment that can be relentless and far-reaching. Such factors can negatively impact mental health and our

study has provided crucial data on how excessive social media use, body shape concerns and cyberbullying are linked to severe and extremely severe symptoms of anxiety and depression among young people,” says A/Prof Swapna Verma, Chairman, Medical Board, IMH, and co-principal investigator of the study.

6. “Not all individuals with severe or extremely severe symptoms of depression or anxiety have a clinical condition, but being in such states for a prolonged period of time can be detrimental to their well-being,” she adds. “The NYMHS has ascertained the impact of some common issues young people face these days and identified groups who are experiencing considerable symptoms and at high risk of further problems. This will enable policymakers and service providers to develop more targeted approaches in addressing their needs. Early identification of issues and intervention support can help to prevent those at risk from developing mental illnesses.”

KEY FINDINGS ON MENTAL HEALTH SYMPTOMS

Symptoms of Depression

7. Of those aged 15 – 35 years, 14.9%, or about 1 in 7 youths, reported having severe or extremely severe symptoms of depression in the past week before the survey was conducted. Such symptoms include feeling sad, empty and a lack of interest and pleasure in activities, most of the time.
8. Those aged 20 – 24 years (vs. 30 – 35 years), single (vs. married), unemployed (vs. employed), and having vocational (vs. university) education were more likely to have had severe or extremely severe symptoms of depression.

Symptoms of Anxiety

9. Anxiety was the most common mental health problem experienced by young people in Singapore. About 27.0%, or about 1 in 4 youths, reported having severe or extremely severe symptoms of anxiety in the past week prior to the survey. This includes feeling worried, tense and restless most of the time.
10. Young people aged 15 – 24 years (vs. 30 – 35 years), females (vs. males), single (vs. married), having junior college or vocational (vs. university) education, and having monthly household income below S\$5,000 (vs. S\$10,000 – S\$19,999) were more likely to have experienced severe or extremely severe symptoms of anxiety.

Symptoms of Stress

11. About 12.9% of youths in Singapore reported experiencing severe to extremely severe levels of stress in the past week prior to the survey. Symptoms include being unable to relax or feeling upset or irritable most of the time.
12. Those aged 15 – 24 years (vs. 30 – 35 years), and those who were unemployed (vs. employed) were more likely to experience severe or extremely severe levels of stress.

FACTORS LINKED TO MENTAL HEALTH SYMPTOMS

Excessive social media use

13. Excessive social media use, as assessed in this study, refers to spending more than three hours on social media platforms daily. About 27.0%, or approximately 1 in 4 youths, reported engaging in excessive social media use.
14. Young people below 30 years of age (vs. 30 – 35 years age) and females (vs. males) were more likely to engage in excessive social media usage. Young people with excessive social media usage were 1.5, 1.3 and 1.6 times more likely to have had severe or extremely severe symptoms of depression, anxiety and stress, respectively.

Body shape concerns

15. Body shape concerns were defined in the NYMHS as having negative body image and excessive concerns about one's body shape that are typically associated with eating disorders. About 20.2%, or 1 in 5, of young people in the population reported having moderate to severe body shape concerns.
16. Youths aged 20 – 24 years and 25 – 29 years (vs. 30 – 35 years), and females (vs. males) were more likely to experience body shape concerns. Young people who had moderate to severe body image concerns were 4.9, 4.3, and 4.5 times more likely to have experienced severe or extremely severe symptoms of depression, anxiety and stress, respectively. Young people who had moderate to severe body image concerns were also 2.6 times more likely to have been cyberbullied than those without such concerns.

Cyberbullying

17. About 21.0% or 1 in 5 youths reported having been cyberbullied, i.e., encountering threats, harassment, or mean, aggressive or rude messages online. The prevalence was similar across the different age groups and gender.
18. Young people who had experienced cyberbullying were approximately twice as likely to have had severe or extremely severe symptoms of depression, anxiety or stress, compared with those who had not.

Other factors

19. Apart from excessive social media use, body shape concerns and cyberbullying, other factors such as vaping, smoking and adverse childhood experiences (ACEs) were also found to be associated with severe or extremely severe symptoms of depression or anxiety.

PROTECTIVE FACTORS AND SOURCES OF HELP

20. The study found that higher levels of resilience, perceived social support, and self-esteem were significantly associated with lower likelihood of severe or extremely severe symptoms of depression, anxiety and stress among youths.
21. Among youths with severe or extremely severe symptoms of depression, anxiety and/or stress, about 2 in 3 (69.1%) sought informal help (e.g. family and friends, or self-help measures) and/or professional help (e.g. medical services, school-based care/services, social services or telephone helplines) for their mental health problems.
22. Those who sought help may have used more than one source. The top three sources of help were family and friends (57.9%), self-help measures and resources (31.1%), and medical services (20.1%).
23. Among the youths who reported mental health issues but chose not to seek help, the three most common reasons were the perception that specialists would not be able to help them, being worried about what other people may think if they sought treatment, and being worried about privacy, confidentiality or being left with a permanent record.
24. “Our findings have substantial implications for developing and improving youth services in Singapore. The identification of significant associated factors, such as excessive social media use, body shape concerns, and cyberbullying, emphasises the importance of integrating preventive measures into schools and youth services. Furthermore, all three factors may be potentially linked to each other. The time young people spend on social media could also be related to cyberbullying and the two may either independently or together cause body shape concerns. Our study, like many others, shows that excessive social media use is a public health concern and has tremendous impact on youth mental health. It is important that young people, parents, educators pay attention to these issues, recognise signs of distress early and develop healthy boundaries,” says A/Prof Mythily Subramaniam, Assistant Chairman, Medical Board (Research), IMH, and co-principal investigator of the study.

- END -

About the Institute of Mental Health (IMH)

The Institute of Mental Health (IMH), a member of the National Healthcare Group, is the only tertiary psychiatric care institution in Singapore. Located on the sprawling 23-hectare campus of Buangkok Green Medical Park in the north-eastern part of Singapore, IMH offers a multidisciplinary and comprehensive range of psychiatric, rehabilitative and therapy services in hospital-based and community-based settings. The 2,000-bedded hospital aims to meet the needs of three groups of patients – children and adolescents (aged below 19 years), adults and the elderly. Besides providing clinical services, IMH dedicates resources to carry out mental health promotion and raise mental

health literacy. IMH also leads in mental health research and training the next generation of mental health professionals in Singapore. For more information, please visit www.imh.com.sg.

Follow us on

[Facebook](#) | [LinkedIn](#) | [Instagram](#) | [YouTube](#)

ABOUT THE NATIONAL YOUTH MENTAL HEALTH STUDY (NYMHS)

The study was undertaken by a multi-disciplinary team led by the Institute of Mental Health (IMH) and is a collaborative effort between four centres – IMH, CHAT, Ministry of Health (MOH) and Saw Swee Hock School of Public Health, National University of Singapore. The three-year study was funded by the MOH, Singapore. The project was led by A/Prof Swapna Verma, Chairman, Medical Board and A/Prof Mythily Subramaniam, Assistant Chairman, Medical Board (Research) from IMH.

How NYMHS was conducted

A total of 2,600 Singapore Citizens and Permanent Residents aged 15 – 35 years were interviewed between October 2022 to June 2023. Respondents were identified by trained recruiters and interviewers from an authorised survey company via street intercepts and door knocks during recruitment drives conducted in the local community. Respondents were approached either through a household-level sampling using randomly generated postal codes or through street intercepts to get the hard-to-reach group (e.g., youths in the National Service and those in the first year of higher education). Respondents completed a set of questionnaires and scales on their own, using tablets provided by the interviewer.

Scales and questionnaires used in NYMHS

Several scales and questionnaires were used to collect data on a range of youth-centric aspects and behaviours. They include the following:

S/N	Constructs and Questionnaires Used	Examples of Questionnaire Items
1.	<p>For anxiety, depression and stress symptoms</p> <p>The Depression Anxiety and Stress Scales (DASS-21) is a set of three self-report scales designed to measure emotional states of depression, anxiety and stress experienced by an individual in the past week.</p> <p>The depression scale assesses dysphoria, hopelessness, devaluation of life, self-deprecation, lack of interest/involvement, anhedonia and inertia. The anxiety scale assesses autonomic arousal, skeletal muscle effects, situational anxiety, and subjective experience of anxious effect. The stress scale is sensitive to levels of chronic non-specific arousal, and assesses difficulty relaxing, nervous arousal, and being easily upset / agitated, irritable / over-reactive and impatient.</p> <p>While this is not a clinical diagnosis, a scale such as the DASS-21 can lead to a useful assessment of disturbance and identify individuals who are experiencing considerable symptoms and at high risk of further problems.</p>	<p>Examples of scale items:</p> <ul style="list-style-type: none"> ▪ I couldn't seem to experience any positive feeling at all. ▪ I felt scared without any good reason. ▪ I found it difficult to work up the initiative to do things. ▪ I found myself getting agitated. <p>Respondents were asked to indicate how much the statements apply to them using a scale from 0 – 'Did not apply to me at all' to 3 – 'Applied to me very much or most of the time'.</p>
2.	<p>For social media use</p> <p>The questionnaire collected information on patterns of social media use among young people. Respondents were also asked to indicate how much time they spent on social</p>	<p>Examples of the scale items</p> <ul style="list-style-type: none"> ▪ When you use social media sites or apps how much time in total do you spend using them on a typical day?

S/N	Constructs and Questionnaires Used	Examples of Questionnaire Items
	media sites or apps on a typical day. Respondents selected options from less than 30 minutes to over 7 hours a day.	
3.	<p>For cyberbullying</p> <p>The questionnaire collected information on unpleasant experiences young people might have had online, including on social media sites or apps in the past year prior to the study.</p>	<p>Examples of the scale items</p> <ul style="list-style-type: none"> ▪ Have you received unwanted or nasty emails, texts or messages which were meant to hurt you? ▪ Has someone posted nasty things about you on social media sites or apps in order to hurt you?
4.	<p>For body shape concerns</p> <p>The Body Shape Questionnaire (BSQ8C) is a widely used scale to collect information about preoccupations of body shape and weight, and their association with self-esteem.</p> <p>Respondents were asked how they have been feeling about their appearance in the past 4 weeks prior to the study on a 6-point scale from 1 – “Never” to 6 – “Always”.</p>	<p>Examples of the scale items</p> <ul style="list-style-type: none"> ▪ Have you felt excessively large and rounded? ▪ Have you been particularly self-conscious about your shape when in the company of other people? ▪ Has seeing your reflection (e.g. in a mirror or shop window) made you feel bad about your shape?

DESCRIPTION OF MENTAL HEALTH CONDITIONS AND KEY TERMS

Depression

Symptoms of depression or depressed mood includes profound feelings of sadness, emptiness, worthlessness, and hopelessness. Associated with this, is a range of other disturbances like loss of interest in activities and loss of pleasure in almost all activities, sleep disturbances (either not being able to sleep well or sleeping too much), loss of appetite with consequent loss of weight although in atypical cases, there might be overeating. Significant impairment in functioning is brought on by difficulty concentrating, loss of energy, tiredness and listlessness. The depressed person may have suicidal thoughts or intentions which might lead to suicidal attempts or even actual suicide.

Anxiety

Symptoms of anxiety refer to feelings of excessive worry that is difficult to control. These feelings may or may not be related to specific events or objects. They are often accompanied by other symptoms like restlessness, fatigue, irritability, and or disturbed sleep. Chronic anxiety can be recurrent in nature, impair family life, and reduce social adjustment and functioning. Anxiety symptoms may worsen over a period and may not be noticed until they are significant enough to cause problems with functioning.

Stress

Stress is a state of worry or mental tension caused by a difficult situation. Stress is a natural reaction to adversity but if it reaches an unhealthy level, it results in reduced functioning. Signs of stress include a combination of physical symptoms (e.g., headaches, stomach upset), emotional distress (e.g., anxiety, feelings of being overwhelmed), cognitive signs (e.g., poor concentration, impaired decision-making), and behavioural issues (e.g., crying, withdrawal). There are multiple sources of stress for youths, of which academic and work-related stress may be the largest contributor.

Cyberbullying

Cyberbullying is a form of bullying that uses technology and occurs over digital platforms such as text messaging and, more commonly, via social media. Some examples of cyberbullying include posting harmful and false content about others, sharing private information to humiliate someone, and impersonating others via account forgery to fraudulently present the behaviour of others. Experience of cyberbullying is associated with adverse mental health and physical health outcomes (e.g., anxiety, depression, sleep problems) and poorer social and functioning outcomes (e.g., lower income, having few friends).

Body shape concerns

The need to achieve a perceived ideal body image is common among youths. It is often fueled by unrealistic body shape ideals portrayed in the mass media, particularly on social media. Preoccupation with body shape increases the likelihood of a person engaging in unhealthy dieting or over-exercising to achieve the ideal. Having body shape concerns or dissatisfaction has been found to be associated with depression, anxiety, and other mental health problems such as eating disorders.

Excessive social media use

Social media use is often associated with mental health problems in adolescence and youth. Problems such as depressive and anxiety symptoms, bullying, attention and sleep problems are linked with excessive and harmful social media use. Adolescents who spend more than three hours per day using social media are believed to be at heightened risk for mental health problems, particularly mood and anxiety disorders.

Adverse childhood experiences

Adverse childhood experiences (ACEs) refer to stressful or traumatic childhood events that occur to an individual from birth till age 18, and result in harm or potential harm to the child. These include growing up in a household with recurrent physical, emotional, or sexual abuse; physical or emotional neglect; parental separation or divorce. Poorer physical and psychological health outcomes and engagement in risky behaviours, such as substance use, are linked to ACEs.

Daily smoking and vaping

Smoking initiation occurs predominantly among young people. Substantial health and economic costs are associated with long-term smoking. Furthermore, the increasing number of youths using e-cigarettes or vapes is a worrying trend worldwide. Vaping is often associated with excess healthcare utilisation and expenditure.

RESEARCHERS INVOLVED IN THE NATIONAL YOUTH MENTAL HEALTH STUDY

Co-Principal Investigators

- A/Prof Swapna Verma, Institute of Mental Health
- A/Prof Mythily Subramaniam, Institute of Mental Health

Co-Investigators

- Prof Chong Siow Ann, Institute of Mental Health
- Dr Charmaine Tang, Institute of Mental Health
- Dr Janhavi Ajit Vaingankar, Institute of Mental Health
- Dr Edimansyah Abdin, Institute of Mental Health
- Ms Lee Yi Ping, Institute of Mental Health
- Mr Chua Boon Yiang, Institute of Mental Health
- Ms Chloe Ang, Institute of Mental Health
- Ms Saleha Shafie, Institute of Mental Health
- Asst. Prof Lee Jeong Kyu, NUS Saw Swee Hock School of Public Health