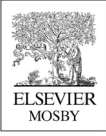




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Treating Adolescent Anxiety and Depression in Primary Care Considering Pandemic Mental Health Fallout



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Keywords

- Adolescent • Depression • Anxiety • Evidence-based • Interventions
- Mental health • Primary care • Pandemic

Key points

- A longstanding, worsening epidemic of adolescent depression and anxiety was made significantly worse by the COVID-19 Pandemic, causing functional impairment in teens and caregiver strain.
- Published evidence-based guidelines and toolkits to treat adolescent depression and anxiety are not being routinely implemented in pediatric primary care practices.
- Pediatric primary care practitioners must embrace adolescent mental wellness and make practice changes to meet the needs of their patients and fill in mental health treatment gaps.
- Pediatric primary care practitioners must identify and break down barriers to mental health treatment and commit to help combat the National Children's Mental Health Emergency.
- Pediatric primary care practitioners must advocate for policies, programs, and funding to improve the mental health of their patients.

OVERVIEW

Pediatric mental health describes the emotional, cognitive, and social well-being of children, as reflected by the achievement of developmental milestones, formation of relationships, and ability to cope with adversity. Pediatric mental illness occurs when children are unable to think, act, and feel in an

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age-appropriate manner, which interferes with functioning at home, school, and in social settings [1].

Mental health challenges are common in children and adolescents, affecting up to 20% of the pediatric population, and are often unrecognized and untreated [2–8]. The prevalence of anxiety and depression increases with age from childhood into adolescence [8], and the rates of each disorder have been increasing. In 2009, 26.9% of high school students experienced persistent sadness or hopelessness and that rate increased to 36.7% in 2019. The lifetime prevalence of adolescent anxiety is 31.9% with 8.3% experiencing severe impairment [5]. The reported prevalence of pediatric mental health disorders is likely underrepresented since children and parents are often unwilling to report mental health concerns or unaware that their symptoms are treatable [5,9].

The National Association of Pediatric Nurse Practitioners (NAPNAP), the American Academy of Pediatrics (AAP), and the American Board of Pediatrics (ABP) prioritized integrating emotional and behavioral assessment and treatment into routine pediatric care as a strategy to help solve the youth mental health provider shortage [10–12].

Beginning in March of 2020, COVID-19 pandemic-induced stressors intensified an underlying epidemic of underrecognized and undertreated pediatric mental illness and brought it into the spotlight [13]. Uncertainty, loss, isolation, disruptions to social connections, and restricted access to school-based resources led to widespread fear and sadness [14]. Global disruptions and challenges caused by the pandemic created “an overall strain on hope, resilience, and perseverance.” [15] Reports of increased pediatric emergency room visits and boarding for psychiatric complaints including suicidality gained national attention and a call to action [14,16–19]. The increase in pediatric mental illness led to the declaration of “A National Emergency in Children’s Mental Health” by children’s health advocacy organizations on October 19, 2021 [20].

The pandemic raised awareness that adverse childhood events and social determinants of health (SDOH) lead to poor mental and physical health outcomes [13,21–23], and underscored the importance of providing trauma-informed care and early identification and treatment of mental health challenges [14,23].

Stressful events are known to trigger behavioral reactions in children and adolescents [15]. Isolation and loneliness, two known risk factors for pediatric depression and anxiety, were ubiquitous during pandemic lockdowns [24]. Adolescents as a group were severely affected by the COVID-19 crisis, which resulted in increased fear, sadness, aggression, irritability, and substance use [14,15].

Studies showed that during the first few months of the COVID-19 pandemic, a quarter of high school students reported a decline in mental health, and several months later only 33% of high school students “were able to cope with their sources of stress, which include strained mental health and peer relationships.” [24].

The COVID-19 Pandemic created an opportunity to destigmatize mental health through a universal experience of depression and anxiety [25]. Pandemic

relief funds were allocated to address the pediatric mental health crisis and dismantle barriers to mental health care through awareness, education, telehealth, and collaboration initiatives [26,27]. The goal of these programs is to overcome logistical and financial barriers to care (Fig. 1) and reduce the stigma of mental illness [27]. Despite research disproving myths and the high prevalence of mental illness, stigma remains one of the most difficult barriers to overcome, hindering the identification and treatment of mental health disorders [28–30]. Improving the proficiency of pediatric primary care providers treating mental illness will require identifying and overcoming barriers, practice preparation, training, and coordination, and the process will be different for every practitioner [10,12,31].

Components of impactful and evidence-based practice improvements include (Fig. 2)

- Needs assessment
- Staff education
- Mental health emergency plan
- Increased screening
- Collaboration
- Interventions
- Follow-up
- Practitioner education
- Advocacy

NEEDS ASSESSMENT

Each practitioner should take an inventory of their strengths and weaknesses, and recognize barriers they face that interfere with their ability to confidently treat mental health concerns [12,31]. The AAP published a Mental Health Toolkit in 2021 which includes a comprehensive Mental Health Practice



Fig. 1. Barriers to care and opportunities for improvement. (Data from Green CM, Foy JM, Earls MF and Committee on Psychosocial Aspects of Child and Family Health, Mental Health Leadership Work Group. Achieving the Pediatric Mental Health Competencies. Pediatrics. 2019;144(5) doi <https://doi.org/10.1542/peds.2019-2758>; and Marian F. Earls MF, Foy JM, Green CM. Mental health toolkit addressing mental health concerns in pediatrics: a practical resource toolkit for clinicians, 2nd Edition. Itasca, IL. American Academy of Pediatrics; 2021).

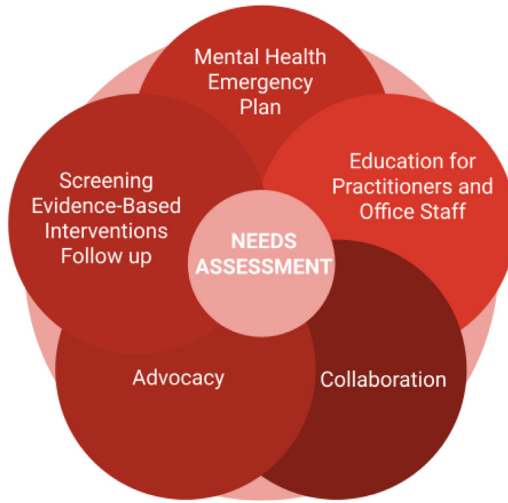


Fig. 2. Key Components of the Primary Care Workflow to improve mental health practice. (Data from Refs [10,12,15,31–38,41,42]).

Readiness Inventory for providers who are interested in transforming their practice to better meet the mental health care needs of their patients [31].

STAFF EDUCATION

Throughout the COVID-19 pandemic, everyone including parents, children, staff members, and providers experienced unprecedented stress [32]. Pediatric primary care offices should be safe spaces where employees understand their role in supporting the mental health of the youth they serve. Practitioners should encourage self-care techniques for their staff, increase awareness about the importance of mental health, and inspire a cultural transformation to become a practice that embraces mental wellness [10,12,31–38].

Using a crisis lens, pediatric office staff should routinely ask parents how they are coping with stress [39]. The nursing and medical staff should incorporate an assessment of signs of mental health challenges and mental wellness counseling into every patient encounter [10,21,32,39]. It is important that the office staff is involved in planning new protocols, understands the importance of proposed interventions, and is adequately trained before the implementation of new procedures to prevent the frustration and resentment that frequently accompany change [40].

MENTAL HEALTH EMERGENCY PLAN

There should be a mental health emergency plan in place in the event that a patient reports suicidal ideation [31,41]. Patients must be assessed and referred appropriately, by contacting 911, the mobile response team, the suicide phone or text number or a community mental health specialist. Practitioners must be comfortable

addressing suicide safety planning, including counseling on restricting access to lethal means, warning signs, and educating youth and caregivers about the importance of at-risk patients engaging with a trusted adult [31,41]. Practitioners should frequently follow-up with at-risk patients to build and maintain a therapeutic relationship and serially assess changes in risk [3,31,41]. The AAP mental health toolkit includes a Practice Preparations and Triage for Psychiatric Emergencies worksheet to help offices prepare for psychiatric emergencies [31].

SCREENING

Mental health screening should take place at every well, sick, and follow-up visit due to the increased incidence of mental distress [12]. (Fig. 3) Framing mental wellness as a continuum instead of focusing on diagnosing mental health disorders may normalize the conversation and help patients and practitioners overcome negative thoughts and feelings associated with mental illness [25,29,30,42]. In addition to mental health screening, providers should screen for adverse childhood experiences (ACES) and SDOH with validated tools [13]. Early identification and management of mental health symptoms will help patients and families avoid long-term consequences of untreated mental illness, and alleviate the ripple effect of untreated mental illness including lost productivity and strain on caregivers [36].

Routine screening is already being conducted at well visits by many practices [43]. Increasing screening to every visit and seamlessly following up positive initial broad symptom screens with symptom-specific screens is a technique that nursing staff can implement so practitioners have a baseline of information prior to starting each patient encounter [31,44].

There are several freely available, evidence-based, validated behavioral screening tools available. For infants and children five and under, age-specific



Fig. 3. Approach to increased mental health screening in primary care. (Data from Refs [12,15,21,31]).

SWYC screening scales are used to screen for general behavioral and developmental concerns [31,32,45]. For children ages 18 and 24 months, the M-CHAT-R/F autism screening tool is used [32,33,46]. For older children and adolescents, the Pediatric Symptom Checklist is a freely available and validated broad-based screening tool with a parent version for youth 6 to 18 years (PSC-35) and a self-report version for youth 11 to 18 years (PSY-35), and use subscales to look for internalizing, externalizing and behavioral concerns [32,33,47].

When broad-based screening tools are positive, symptom-specific screening tools should be administered. After a broad symptom screen indicates the presence of a depressive disorder, (and during well visits for adolescents ages 12–18) a validated depression screen such as the PHQ-9, modified for adolescents, should be given [32,33,48]. When a depression screen is positive for suicidality, it should be promptly followed by a validated suicide screen such as the Columbia-Suicide Severity Rating Scale (C-SSRS) Screener with triage for primary care settings [12,32,33,49]. When fear and avoidance behaviors are noted on an initial screen, The SCARED screen helps differentiate the severity and classification of anxiety symptoms [32,33,50]. When a patient screens positive for a disorder, the practitioner must interview the patient and family to further explore the severity of symptoms and functional impact and to initiate a plan of care [32,33].

Incorporating formal screening into each patient encounter creates logistical challenges. The AAP offers assistance through the Screening Technical Assistance and Resource (STAR) program to support practitioners establish routine screening procedures [44].

COLLABORATION

Collaborative care initiatives between child and adolescent psychiatrists and pediatric primary care practitioners have been shown to successfully increase access to youth mental health care and improve the competence and confidence of primary care providers in managing mental illness [51–56]. Many states implemented pediatric behavioral health collaboratives, modeled after the successful Massachusetts initiative to encourage pediatric providers to consult and co-manage patients with mental health experts [10,51–56]. Pediatric primary care practitioners should participate in collaborative models to improve mental health outcomes [57]. Referral to mental health specialists will always be an essential part of pediatric primary care. In addition to becoming more adept at identifying mental health concerns and managing mild to moderate symptoms, it is essential for pediatric providers to be familiar with specialists in their community and knowledgeable about the specific services they provide.

INTERVENTIONS

In addition to collaborative care models, several other primary care-based interventions have been shown to improve mental health outcomes in pediatrics (Fig. 4). The most robust evidence supports the use of

- Cognitive behavioral therapy (CBT)

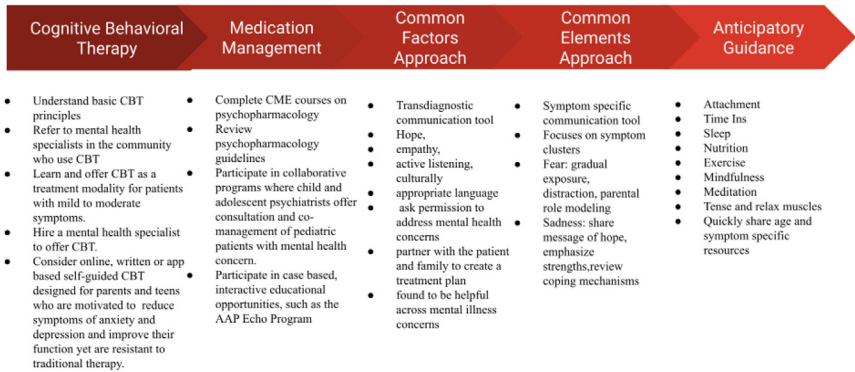


Fig. 4. Overview of primary care adolescent anxiety and depression interventions. (Data from Refs [12,21,28,31]).

- Medication management
- CBT plus medication management [31].

This is a strong evidence-based showing these interventions reduce symptoms of anxiety and depression and improve functioning [31]. Many pediatric practitioners are not comfortable offering these interventions and will require additional training and collaboration prior to routine implementation [57–59].

Basic anticipatory guidance when counseling families about mental wellness during primary care visits should include stressing the importance of the following to protect mental health:

- Attachment
- Time-ins
- Adequate Sleep
- Nutrition
- Exercise [10,12].

It is also important to incorporate the following messages into primary care visits when communicating with children and families about mental health concerns [10,12].

- Protective factors
- Risk factors
- Strengths
- Validation
- Hope
- Reflective Listening
- Follow-up questions
- Mindfulness
- Gratitude
- Meditation
- Relaxation

- Tense/Relax Muscles

The AAP recommends using the evidence-based transdiagnostic Common Factors Approach to communicate with families to facilitate a therapeutic alliance and offer basic elements of therapy shown to be effective for a variety of mental health symptoms. This is a brief intervention focusing on hope, empathy, active listening, culturally appropriate language, asking permission to address mental health concerns, and partnering with the patient and family to create a treatment plan [31]. The AAP created the mnemonic HELP to summarize the components of the Common Factors Approach and recommends using this technique to offer basic psychoeducation across symptoms and to help close a visit and plan follow-up care [31].

The symptom-specific Common Elements Approach is another evidence-based communication tool recommended by the AAP [31]. This tool focuses on symptom clusters such as fear or sadness to guide communication. For anxiety concerns, this technique includes education about anxiety, gradual exposure, distraction techniques, and parental role modeling. For depressive concerns, this includes a message of hope, an inventory of strengths, and a review of coping skills and problem-solving techniques [31].

Evidence-based parenting classes should be discussed with families who struggle to manage children with challenging behaviors. The Triple P and Incredible Years programs are available online and have been shown to be effective at increasing parental competencies and reducing challenging behavior [60–62]. The California evidence-based clearinghouse for child welfare information and resources for child welfare professionals created an online tool for evaluating parenting resources and includes the evidence base as part of the evaluation [63]. This interactive tool is useful for pediatric providers to guide parents who require assistance in building specific skills and overcoming a variety of parenting challenges toward evidence-based courses [63].

Sharing resources such as websites and books that are supported by evidence increases a family's involvement and investment in maximizing their mental wellness. Practitioners should become familiar with resources and have the ability to locate and distribute them during patient visits [12,31,32]. Organizing quick texts and electronic links to resources or a paper-based inventory by age and symptoms is a technique that can save time during visits.

Practitioners should be knowledgeable about online courses that may be useful for families facing mental health challenges. The National Alliance on Mental Illness offers a free 6-part self-guided course for caregivers of children and adolescents showing symptoms of mental illness and has been shown to improve family functioning [64,65]. There are self-directed CBT-based online programs such as My Anxiety Plan for Children and Teens and Creating Opportunities for Personal Empowerment (COPE) available for adolescents who are motivated to decrease their symptoms and impairment [66,67].

Practitioners should educate themselves about digital therapeutics (Dtx) designed to deliver behavioral health treatments through technology devices.

This technology is emerging as a way to potentially increase access to pediatric mental health care, and practitioners should stay current on research and development in this area. There are over 10,000 mobile mental health apps available for download and pediatric patients are using them [68,69]. Pediatric providers are compelled to become familiar with these products and assist their patients in making informed decisions about how to evaluate them [68,69].

The mobile mental health app evaluation tools the APA's APP Advisor and the Mobile App Rating Scale (MARS) enable practitioners to help patients make informed decisions about using these resources [68,69]. The first CBT-based, prescription digital therapeutic product aimed at treating adolescent depression, LIMBIX Spark announced its intention to seek FDA approval at the October 2021 AAP Conference and began negotiating reimbursement rates with insurance companies [70,71].

PRACTITIONER EDUCATION

Pediatric practitioners should seek educational opportunities to increase their competence and confidence in pediatric mental health treatments.

- The *Reach Institute* offers a variety of workshops and a 3-day fellowship program for pediatric providers that teach evidence-based mental health therapies [12,32,72].
- The *Ohio State University's KySS Child and Adolescent Mental Health Online Fellowship* is a program designed to train primary care pediatric providers in treating mental illness. This forum offers twelve online, self-paced modules that outline evidence-based treatments for children and teens facing mental health challenges [12,32,73].
- The *AAP* offers collaborative workshops where pediatric primary care providers and mental health specialists meet over a period of weeks or months and review didactic information about the child and mental health topics and break into small groups to discuss cases. This format allows pediatric providers to learn from each other and increase their comfort level in mental illness identification and treatment.

FOLLOW-UP

Following up with patients who have mental health concerns allows providers to strengthen the therapeutic relationship and track symptom progression over time [31,32]. The AAP Mental Health Care Algorithm recommends that all children with behavioral health concerns or positive screenings should be placed on a practice registry, to be followed over time, and offered transdiagnostic and symptom-specific treatments within the pediatric practice, which have been shown to help reduce symptoms of mental health disorders in children [37].

ADVOCACY

Pediatric primary care practitioners are natural advocates for pediatric mental healthcare. Advocacy efforts are underway in many areas including but not limited to:

- Collaborative care programs
- Increased funding for pediatric mental health care
- Improved and novel reimbursement arrangements
- Increased mental health training for current and future practitioners
- Programs to reduce the stigma of mental illness
- Streamlined billing policies
- Increased communication between providers [10,12,42].

Involvement with local and national organizations devoted to improving the health of children is a logical first step in advocacy for practitioners who are passionate about children's health [10,12,42].

CONCLUSION

Guidelines from The National Association of Pediatric Nurse Practitioners and the American Academy of Pediatrics stress the importance of focusing on mental health promotion and screening, implementing evidence-based interventions, increasing knowledge of mental health interventions, collaborating, and advocating for essential child mental health elements to be incorporated into pediatric primary care. This requires time, coordination, and commitment. Responding to the National Children's Mental Health Emergency starts with each pediatric practitioner making a change.

As David Satcher, the former U.S. Surgeon General noted in 1999 a statement that remains true today and must be addressed by every pediatric health care provider.

Promoting mental health for all Americans will require scientific know-how but, even more importantly, a societal resolve that we will make the needed investment. The investment does not call for massive budgets; rather, it calls for the willingness of each of us to educate ourselves and others about mental health and mental illness, and thus to confront the attitudes, fear, and misunderstanding that remain as barriers before us [74].

Our nation's children can no longer wait for us to gradually overcome barriers to mental health treatment. Impactful changes must be made now before the crisis worsens. Children's lives are at stake and they are depending on us to protect them.

CLINICS CARE POINTS

- Embrace pediatric mental health.
- Implement screening for pediatric mental health concerns during every patient encounter.
- Increase knowledge of evidence-based pediatric mental health treatments and incorporate them into primary care.
- Collaborate with Child and Adolescent Psychiatrists.
- Advocate for initiatives to support pediatric mental health.

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Disclosure

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