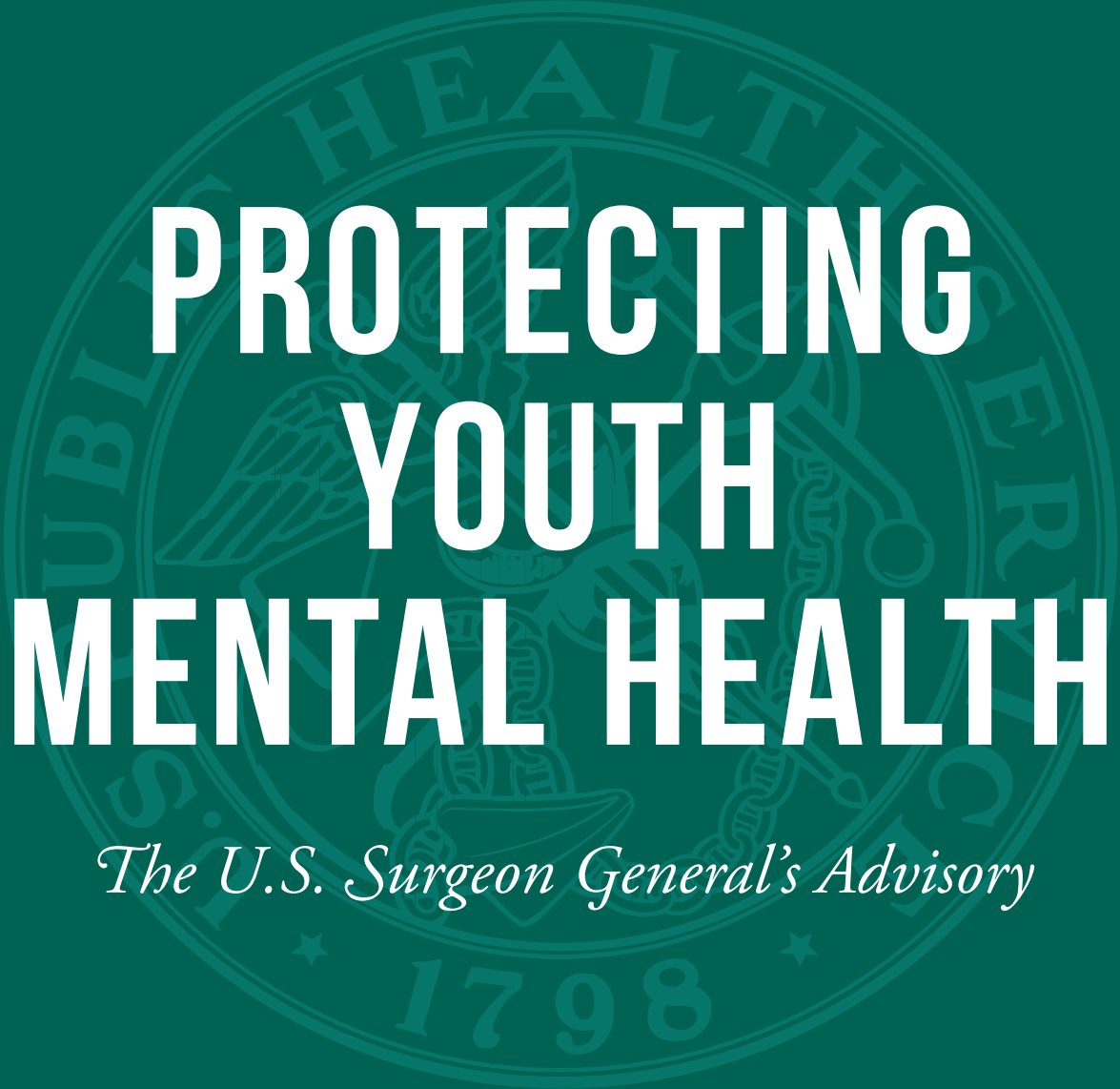




PROTECTING YOUTH MENTAL HEALTH

The U.S. Surgeon General's Advisory

2021

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INTRODUCTION FROM THE SURGEON GENERAL



Every child’s path to adulthood—reaching developmental and emotional milestones, learning healthy social skills, and dealing with problems—is different and difficult. Many face added challenges along the way, often beyond their control. There’s no map, and the road is never straight.

But the challenges today’s generation of young people face are unprecedented and uniquely hard to navigate. And the effect these challenges have had on their mental health is devastating.

Recent national surveys of young people have shown alarming increases in the prevalence of certain mental health challenges—in 2019, one in three high school students and half of female students [reported](#) persistent feelings of sadness or hopelessness, an overall increase of 40% from 2009. We know that mental health is shaped by many factors, from our genes and brain chemistry to our relationships with family and friends, neighborhood conditions, and larger social forces and policies. We also know that, too often, young people are bombarded with messages through the media and popular culture that erode their sense of self-worth—telling them they are not good looking enough, popular enough, smart enough, or rich enough. That comes as progress on legitimate, and distressing, issues like climate change, income inequality, racial injustice, the opioid epidemic, and gun violence feels too slow.

And while technology platforms have improved our lives in important ways, increasing our ability to build new communities, deliver resources, and access information, we know that, for many people, they can also have adverse effects. When not deployed responsibly and safely, these tools can pit us against each other, reinforce negative behaviors like bullying and exclusion, and undermine the safe and supportive environments young people need and deserve.

All of that was true even before the COVID-19 pandemic dramatically altered young peoples' experiences at home, at school, and in the community. The pandemic era's unfathomable number of deaths, pervasive sense of fear, economic instability, and forced physical distancing from loved ones, friends, and communities have exacerbated the unprecedented stresses young people already faced.

It would be a tragedy if we beat back one public health crisis only to allow another to grow in its place. That's why I am issuing this Surgeon General's Advisory. Mental health challenges in children, adolescents, and young adults are real, and they are widespread. But most importantly, they are treatable, and often preventable. This Advisory shows us how.

To be sure, this isn't an issue we can fix overnight or with a single prescription. Ensuring healthy children and families will take an all-of-society effort, including policy, institutional, and individual changes in how we view and prioritize mental health. This Advisory provides actionable recommendations for young people and their families, schools and health care systems, technology and media companies, employers, community organizations, and governments alike.

Our obligation to act is not just medical—it's moral. I believe that, coming out of the COVID-19 pandemic, we have an unprecedented opportunity as a country to rebuild in a way that refocuses our identity and common values, puts people first, and strengthens our connections to each other.

If we seize this moment, step up for our children and their families in their moment of need, and lead with inclusion, kindness, and respect, we can lay the foundation for a healthier, more resilient, and more fulfilled nation.

A handwritten signature in black ink, reading "Vivek Murthy". The signature is fluid and cursive, with the first name "Vivek" and last name "Murthy" clearly distinguishable.

Vivek H. Murthy, M.D., M.B.A.
Vice Admiral, U.S. Public Health Service
Surgeon General of the United States

ABOUT THE ADVISORY

A Surgeon General’s Advisory is a public statement that calls the American people’s attention to an urgent public health issue and provides recommendations for how it should be addressed. Advisories are reserved for significant public health challenges that need the nation’s immediate awareness and action.

This Advisory offers recommendations for supporting the mental health of children, adolescents, and young adults. While many of these recommendations apply to **individuals**, the reality is that people have widely varying degrees of control over their circumstances. As a result, not all recommendations will be feasible for everyone.

That’s why systemic change is essential. The Advisory includes essential recommendations for the **institutions** that surround young people and shape their day-to-day lives—schools, community organizations, health care systems, technology companies, media, funders and foundations, employers, and government. They all have an important role to play in supporting the mental health of children and youth.

For additional background and to read other Surgeon General’s Advisories, visit [SurgeonGeneral.gov](https://www.surgeongeneral.gov).

BACKGROUND

Youth Mental Health Prior to the COVID-19 Pandemic

Mental health affects every aspect of our lives: how we feel about ourselves and the world; solve problems, cope with stress, and overcome challenges; build relationships and connect with others; and perform in school, at work, and throughout life. Mental health encompasses our emotional, psychological, and social wellbeing, and is an essential component of overall health.¹ As described in the 1999 Surgeon General’s Report on Mental Health, it is the “springboard of thinking and communication skills, learning, emotional growth, resilience and self-esteem.”²

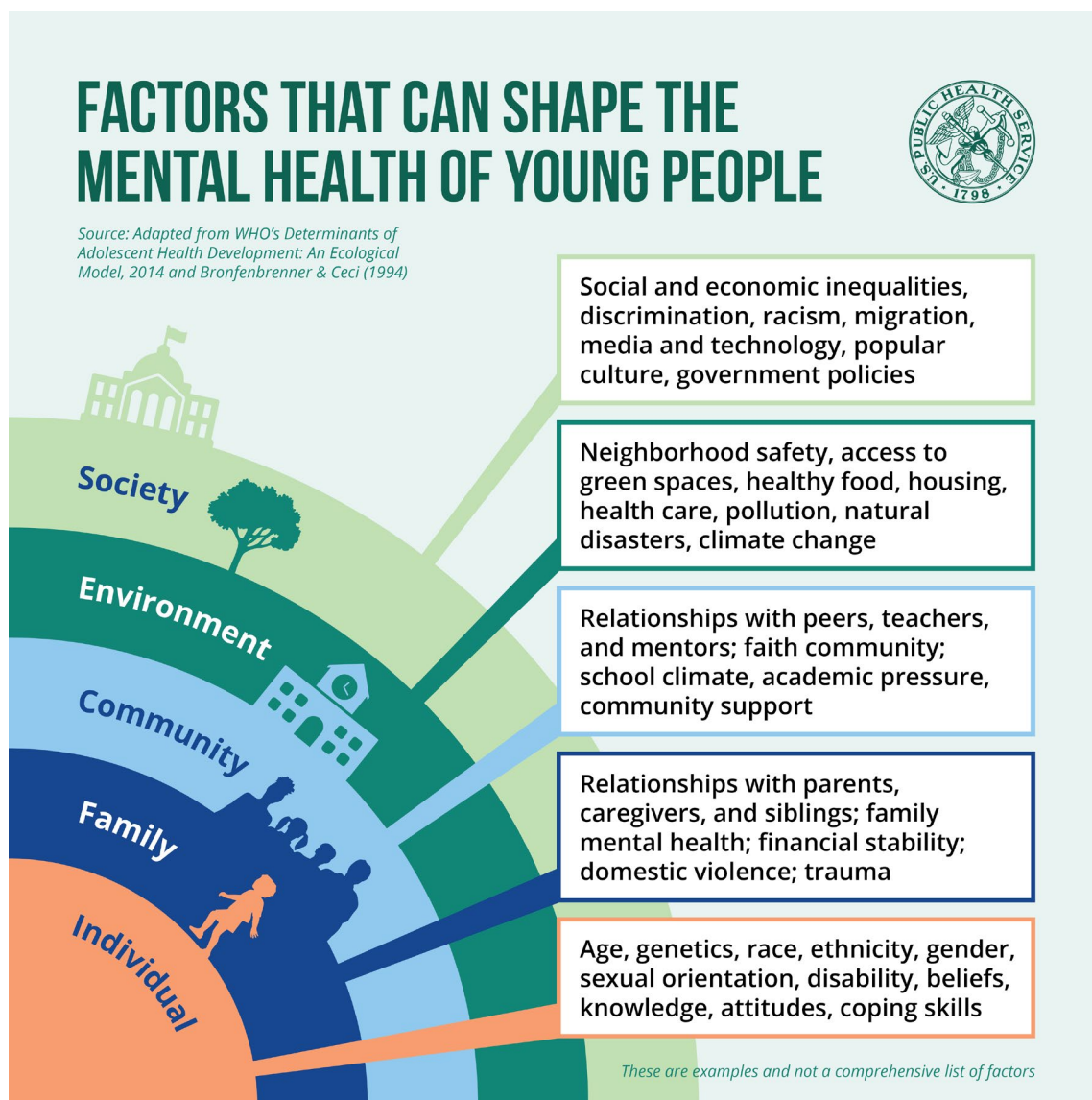
Mental health challenges can be difficult to define, diagnose, and address, partly because it isn’t always clear when an issue is serious enough to warrant intervention.² All of us, at all ages, occasionally experience fear, worry, sadness, or distress. In most cases, these symptoms are short-lived and don’t affect our ability to function. But, at other times, symptoms can cause serious difficulties with daily functioning and affect our relationships with others, as in the case of conditions such as anxiety disorders, major depressive disorder, schizophrenia, bipolar disorder, and eating disorders, among others.³

Mental health conditions can be shaped by **biological factors**, including genes and brain chemistry, and **environmental factors**, including life experiences. Some mental health disorders seem to cluster in families, but they are often shaped by multiple genes, and whether an individual develops symptoms can be further modified by their experiences and surrounding environment.^{4, 5} Environmental factors can range from exposure to alcohol or drugs during pregnancy, to birth complications, to discrimination and racism, to adverse childhood experiences (ACEs) such as abuse, neglect, exposure to community violence, and living in under-resourced or racially segregated neighborhoods.^{6, 7, 8, 9, 10, 11, 12} ACEs can undermine a child’s sense of safety, stability, bonding, and wellbeing.¹³ Moreover, ACEs may lead to the development of toxic stress. Toxic stress can cause long lasting changes, including disrupting brain development and increasing the risk for mental health conditions and other health problems such as obesity, heart disease, and diabetes, both during and beyond childhood as well as for future generations.^{12, 14}

Biological and environmental factors can also be interrelated, making it difficult to isolate unique “causes” of mental health challenges. For example, if a child is genetically predisposed to depression, they might be more affected by experiences such as bullying than other children.^{15, 16}

Figure 1 (next page) includes a longer list of factors that shape the mental health of young people.

FIGURE 1



Even before the COVID-19 pandemic, mental health challenges were the leading cause of disability and poor life outcomes in young people, with up to 1 in 5 children ages 3 to 17 in the US with a reported mental, emotional, developmental, or behavioral disorder.¹⁷ In 2016, of the 7.7 million children with treatable mental health disorder, about half did not receive adequate treatment.¹⁸

Unfortunately, in recent years, national surveys of youth have shown major increases in certain mental health symptoms, including depressive symptoms and suicidal ideation. From 2009 to 2019, the proportion of high school students reporting persistent feelings of sadness or hopelessness increased by 40%; the share seriously considering attempting suicide increased by 36%; and the share creating a suicide plan increased by 44%.¹⁹ Between 2011 and 2015, youth psychiatric visits to emergency departments for depression, anxiety, and behavioral challenges increased by 28%.²⁰ Between 2007 and 2018, suicide rates among youth ages 10-24 in the US increased by 57%.²¹ Early estimates from the National Center for Health Statistics suggest there were tragically more than 6,600 deaths by suicide among the 10-24 age group in 2020.²²

Scientists have proposed various hypotheses to explain these trends. While some believe that the trends in reporting of mental health challenges are partly due to young people becoming more willing to openly discuss mental health concerns,²³ other researchers point to the growing use of digital media,^{24, 25, 26} increasing academic pressure,^{27, 28, 29} limited access to mental health care,^{18, 30} health risk behaviors such as alcohol and drug use,³¹ and broader stressors such as the 2008 financial crisis, rising income inequality, racism, gun violence, and climate change.^{32, 33, 34, 35}

It's also important to acknowledge that the prevalence of mental health challenges varies across subpopulations. For instance, girls are much more likely to be diagnosed with anxiety, depression, or an eating disorder, while boys are more likely to die by suicide or be diagnosed with a behavior disorder, such as attention deficit hyperactivity disorder (ADHD).^{36, 37, 38} In recent years, suicide rates among Black children (below age 13) have been increasing rapidly, with Black children nearly twice as likely to die by suicide than White children.³⁹ Moreover, socioeconomically disadvantaged children and adolescents—for instance, those growing up in poverty—are two to three times more likely to develop mental health conditions than peers with higher socioeconomic status.⁴⁰

The COVID-19 Pandemic's Impact on the Mental Health of Children and Youth

During the pandemic, children, adolescents, and young adults have faced unprecedented challenges. The COVID-19 pandemic has dramatically changed their world, including how they attend school, interact with friends, and receive health care. They missed first days of school, months or even years of in-person schooling, graduation ceremonies, sports competitions, playdates, and time with relatives. They and their family may have lost access to mental health care, social services, income, food, or housing.⁴¹ They may have had COVID-19 themselves, suffered from long COVID symptoms, or lost a loved one to the disease—it's estimated that as of June 2021, more than 140,000 children in the US had lost a parent or grandparent caregiver to COVID-19.⁴²

Since the pandemic began, rates of psychological distress among young people, including symptoms of anxiety, depression, and other mental health disorders, have increased. Recent research covering 80,000 youth globally found that depressive and anxiety symptoms doubled during the pandemic, with 25% of youth experiencing depressive symptoms and 20% experiencing anxiety symptoms.⁴³ Negative emotions or behaviors such as impulsivity and irritability—associated with conditions such as ADHD—appear to have moderately increased.⁴⁴ Early clinical data are also concerning: In early 2021, emergency department visits in the United States for suspected suicide attempts were 51% higher for adolescent girls and 4% higher for adolescent boys compared to the same time period in early 2019.⁴⁵ Moreover, pandemic-related measures reduced in-person interactions among children, friends, social supports, and professionals such as teachers, school counselors, pediatricians, and child welfare workers. This made it harder to recognize signs of child abuse, mental health concerns, and other challenges.⁴⁶

During the pandemic, young people also experienced other challenges that may have affected their mental and emotional wellbeing: the national reckoning over the deaths of Black Americans at the hands of police officers, including the murder of George Floyd; COVID-related violence against Asian Americans; gun violence; an increasingly polarized political dialogue; growing concerns about climate change; and emotionally-charged misinformation.^{47, 48, 49, 50, 51}

Although the pandemic's long-term impact on children and young people is not fully understood, there is some cause for optimism. According to more than 50 years of research, increases in distress symptoms are common during disasters, but most people cope well and do not go on to develop mental health disorders.⁵² Several measures of distress that increased early in the pandemic appear to have returned to pre-pandemic levels by mid-2020.^{53, 54} Some other measures of wellbeing, such as rates of life satisfaction and loneliness, remained largely unchanged throughout the first year of the pandemic.^{53, 55} And while data on youth suicide rates are limited, early evidence does not show significant increases.^{56, 57}

In addition, some young people thrived during the pandemic: They got more sleep, spent more quality time with family, experienced less academic stress and bullying, had more flexible schedules, and improved their coping skills.^{44, 58, 59, 60} Many young people are resilient, able to bounce back from difficult experiences such as stress, adversity, and trauma.⁶¹

That said, the pandemic is ongoing, with nearly 1,000 Americans dying per day as of early December 2021.⁶² And many millions of children and youth have faced and continue to face major challenges. Importantly, the pandemic's negative impacts, such as illness and death in families and disruptions in school and social life, disproportionately impacted those who were vulnerable to begin with and widened disparities.⁶³ For additional details, see Boxes 1 and 2. **Box 1** discusses **risk factors** contributing to children's mental health symptoms during the pandemic. **Box 2** discusses **demographic groups** at greater risk of developing mental health problems during the pandemic.

BOX 1

RISK FACTORS CONTRIBUTING TO YOUTH MENTAL HEALTH SYMPTOMS DURING THE PANDEMIC

Note: Not a comprehensive list of risk factors

Having **mental health challenges** before the pandemic^{61, 64}

Living in an **urban area** or an **area with more severe COVID-19 outbreaks**⁶⁵

Having parents or caregivers who were **frontline workers**⁶⁶

Having parents or caregivers at elevated risk of **burnout** (for example, due to parenting demands)^{67, 68}

Being **worried about COVID-19**⁶⁴

Experiencing **disruptions in routine**, such as not seeing friends or going to school in person^{69, 70, 71}

Experiencing more **adverse childhood experiences (ACEs)** such as abuse, neglect, community violence, and discrimination^{72, 73, 74}

Experiencing more **financial instability, food shortages, or housing instability**^{75, 76}

Experiencing **trauma**, such as losing a family member or caregiver to COVID-19⁷⁷

GROUPS AT HIGHER RISK OF MENTAL HEALTH CHALLENGES DURING THE PANDEMIC

Note: Not a comprehensive list of groups or risk factors

Youth with intellectual and developmental disabilities (IDDs), who found it especially difficult to manage disruptions to school and services such as special education, counseling, occupational, and speech therapies^{78, 79, 80, 81, 82}

Racial and ethnic minority youth,⁸³ including:

- **American Indian and Alaska Native youth**, many of whom faced challenges staying connected with friends and attending school due to limited internet access⁸⁴
- **Black youth**, who were more likely than other youth to lose a parent or caregiver to COVID-19⁴²
- **Latino youth**, who reported high rates of loneliness and poor or decreased mental health during the pandemic^{85, 86}
- **Asian American, Native Hawaiian, and Pacific Islander youth**, who reported increased stress due to COVID-19-related hate and harassment^{87, 88}

LGBTQ+ youth, who lost access to school-based services and were sometimes confined to homes where they were not supported or accepted^{89, 90}

Low-income youth, who faced economic, educational, and social disruptions (for example, losing access to free school lunches)⁹¹

Youth in rural areas, who faced additional challenges in participating in school or accessing mental health services (for example, due to limited internet connectivity)⁹²

Youth in immigrant households, who faced language and technology barriers to accessing health care services and education⁹³

Special youth populations, including youth involved with the juvenile justice, or child welfare systems, as well as runaway youth and youth experiencing homelessness^{61, 94, 95, 96}

Additional considerations:

- **Youth with multiple risk factors.** Many young people are part of more than one at-risk group, which can put them at even higher risk of mental health challenges. For example, children with IDD who lost a parent to COVID-19, or Black children from low-income families, may require additional support to address multiple risk factors.⁹⁷
- **Discrimination in the health care system.** Some groups of youth and their families, such as people of color, immigrants, LGBTQ+ people, and people with disabilities, may be more hesitant to engage with the health care system (including mental health services) due to current and past experiences with discrimination.^{97, 98, 99}
- **Risks of COVID-19 to children with mental health conditions.** Children with mood disorders, such as depression and bipolar disorder, as well as schizophrenia spectrum disorders, are at elevated risk of severe COVID-19 illness.^{100, 101, 102}

WE CAN TAKE ACTION

The good news is that, throughout the pandemic, many people have recognized the unprecedented need to support youth mental health and wellbeing and have taken action to do so. Many young people found ways to cope with disruption and stay connected.¹⁰³ Families helped children adjust to remote learning.¹⁰⁴ Educators and school staff supported their students while facing unprecedented challenges themselves.¹⁰⁵ Health care professionals rapidly shifted to telehealth.¹⁰⁶ Community organizations stepped in to protect at-risk youth.¹⁰⁷ Employers helped employees adapt to remote work environments.¹⁰⁸ And governments invested trillions of dollars to mitigate financial hardship for families, support COVID-19 testing and vaccination, provide health care and other social services, and support the safe reopening of schools, among other policies.^{109, 110, 111}

But there is much more to be done, and each of us has a role to play. Supporting the mental health of children and youth will require a whole-of-society effort to address longstanding challenges, strengthen the resilience of young people, support their families and communities, and mitigate the pandemic's mental health impacts. Here is what we must do:

- **Recognize that mental health is an essential part of overall health.** Mental health conditions are real, common, and treatable, and people experiencing mental health challenges deserve support, compassion, and care, not stigma and shame. Mental health is no less important than physical health. And that must be reflected in our how we communicate about and prioritize mental health.
- **Empower youth and their families to recognize, manage, and learn from difficult emotions.** For youth, this includes building strong relationships with peers and supportive adults, practicing techniques to manage emotions, taking care of body and mind, being attentive to use of social media and technology, and seeking help when needed. For families and caregivers, this means addressing their own mental health and substance use conditions, being positive role models for children, promoting positive relationships between children and others as well as with social media and technology, and learning to identify and address challenges early. Youth and families should know that asking for help is a sign of strength.
- **Ensure that every child has access to high-quality, affordable, and culturally competent mental health care.** Care should be tailored to children's developmental stages and health needs, and available in primary care practices, schools, and other community-based settings. It's particularly important to intervene early, so that emerging symptoms don't turn into crises.

- **Support the mental health of children and youth in educational, community, and childcare settings.** This includes creating positive, safe, and affirming educational environments, expanding programming that promotes healthy development (such as social and emotional learning), and providing a continuum of supports to meet the social, emotional, behavioral, and mental health needs of children and youth. To achieve this, we must also expand and support the early childhood and education workforce.
- **Address the economic and social barriers that contribute to poor mental health for young people, families, and caregivers.** Priorities should include reducing child poverty and ensuring access to quality childcare, early childhood services, and education; healthy food; affordable health care; stable housing; and safe neighborhoods.^{112, 113}
- **Increase timely data collection and research to identify and respond to youth mental health needs more rapidly.** The country needs an integrated, real-time data infrastructure for understanding youth mental health trends. More research is also needed on the relationship between technology and mental health, and technology companies should be more transparent with their data and algorithmic processes to enable this research. We also need to better understand the needs of at-risk youth, including youth facing multiple risk factors. Governments and other stakeholders should engage directly with young people to understand trends and design effective solutions.

WHAT YOUNG PEOPLE CAN DO

Since many of the challenges young people face are outside of their control, we need a whole-of-society effort to support children's mental health and wellbeing from birth to adulthood. That said, below are important steps children and young people themselves can take to protect, improve, and advocate for their mental health and that of their family, friends, and neighbors:

- **Remember that mental health challenges are real, common, and treatable.** Struggling with your mental health does not mean you are broken or that you did something wrong. Mental health is shaped by many factors, including biology and life experiences, and there are many ways mental health challenges can be addressed.
- **Ask for help.** Find trusted adults, friends, or family members to talk to about stressful situations. For example, if you or someone you know is being bullied, tell a trusted adult. If you are struggling to manage negative emotions, reach out to a school nurse or counselor, a teacher, a parent or caregiver, a coach, a faith leader, or someone else you look up to and trust. Look into therapy or counseling resources to get support when something causes distress and interferes with your life. Reaching out to others can be hard and takes courage, but it is worth the effort and reminds us we are not alone.
- **Invest in healthy relationships.** Social connection is a powerful buffer to stress and a source of wellbeing. But too often in our fast-paced lives, quality time with people gets crowded out. Make space in your life for the people you love. Spend time with others regularly, in-person and virtually.¹¹⁴ Find people who support and care about you and have open and honest conversations with them about your feelings. Get involved in group activities, such as recreation and outdoor activities, after-school programs, and mentorship programs.¹¹⁵
- **Find ways to serve.** Volunteering in your community and helping others can be a great way to connect with people, build a sense of purpose, and develop your own sense of self-worth.¹¹⁶ Helping others when you are the one struggling can seem counterintuitive. But service is a powerful antidote to isolation, and it reminds us that we have value to add to the world.
- **Learn and practice techniques to manage stress and other difficult emotions.** Try to recognize situations that may be emotionally challenging for you, and come up with strategies to manage those emotions. For example, if you find it stressful to look at COVID-related news, try to check the news less often, take a break for a day or a week at a time, keep notifications off throughout the day, and avoid looking at negative stories before bed.⁵¹

- **Take care of your body and mind.** Stick to a schedule, eat well, stay physically active, get quality sleep, stay hydrated, and spend time outside.^{117, 118, 119} And avoid substances that can ultimately make you feel tired, down, or depressed, such as alcohol, marijuana, vaping, and tobacco.¹²⁰
- **Be intentional about your use of social media, video games, and other technologies.** Here are some questions to help guide your technology use: How much time are you spending online? Is it taking away from healthy offline activities, like exercising, seeing friends, reading, and sleeping? What content are you consuming, and how does it make you feel? Are you online because you want to be, or because you feel like you have to be?
- **Be a source of support for others.** Talk to your family and friends about mental health, listen and be a source of support to them, and connect them to the right resources.¹²¹ Advocate for and contribute your ideas at the local, state, or national levels. For example, look into joining Youth Advisory Councils or mental health peer support programs in your community.¹²²

RESOURCES FOR YOUNG PEOPLE

If you're in crisis, get immediate help: Call the National Suicide Prevention Lifeline at 1-800-273-8255, [chat](#) with trained counselors 24/7, or get help in [other ways](#) through the Lifeline

How Right Now (Centers for Disease Control and Prevention): Resources for coping with negative emotions and stress, talking to loved ones, and finding inspiration

Youth Engaged 4 Change: Opportunities for youth to make a difference in their lives and in the world around them

Supporting Emotional Wellbeing in Children and Youth (National Academies of Medicine): Tools for children, teens, and parents to learn how to cope with challenges

Mental Health Resource Center (JED Foundation): Information about common emotional health issues and how to overcome challenges

Youth Wellbeing Initiatives (National Council for Mental Wellbeing): Collection of initiatives to improve mental wellbeing in youth and young adults

Kids, Teens, and Young Adults (National Alliance on Mental Illness): Resources for young people to get mental health support

One Mind PsyberGuide: A guide to navigating mental health apps and digital technologies

FindTreatment.gov (SAMHSA): Information on substance use and mental health treatment

Trevor Project: Suicide prevention and crisis intervention resources for LGBTQ+ young people

AAKOMA Mental Health Resources (The AAKOMA Project): Resources to support the mental health of youth of color and their caregivers

Mental Health for Immigrants (Informed Immigrant): Tips for managing the mental health of yourself and others

WHAT FAMILY MEMBERS AND CAREGIVERS CAN DO

Families and caregivers play a critical role in providing the safe, stable, and nurturing environments and relationships young people need to thrive. Below are recommendations for how families and caregivers can engage with children and youth on mental health topics, help them become more resilient, and address emerging mental health challenges:

- **Be the best role model you can be for young people by taking care of your own mental and physical health.** Young people often learn behaviors and habits from what they see around them. You can model good habits by talking to children about the importance of mental health, seeking help when you need it, and showing positive ways you deal with stress so children learn from you. Additional ways to take care of your own mental health include taking breaks, getting enough sleep, exercising, eating balanced meals, maintaining regular routines, obtaining health insurance coverage, staying connected with family and friends, and taking time to unplug from technology or social media.¹²³
- **Help children and youth develop strong, safe, and stable relationships with you and other supportive adults.** Research shows that the most important thing a child needs to be resilient is a stable and committed relationship with a supportive adult.¹²⁴ Spend time with children on activities that are meaningful to them, show them love and acceptance, praise them for the things they do well, listen to them, and communicate openly about their feelings. Encourage children to ask for help and connect them with other adults who can serve as mentors.¹²⁵
- **Encourage children and youth to build healthy social relationships with peers.** This can be done through self-directed play and structured activities such as school, after school programs, sports, and volunteering.¹²⁶ Since peers can play a major role (both positive and negative) in children's development, it's important to help children learn how to deal with peer pressure. Have open conversations with your child about their values and teach them to be confident and comfortable in expressing their needs and boundaries.
- **Do your best to provide children and youth with a supportive, stable, and predictable home and neighborhood environment.** A lot may be outside of your control, and there will be trial and error as you figure out what works best for your child. That said, try to help children stick to a regular and predictable daily schedule, such as regular dinnertime and bedtime.^{117, 126, 127} Be thoughtful about whether and how to discuss stressful topics such as financial and marital problems. The American Psychological Association offers [tips](#) on how to talk with your child about difficult topics.¹²⁸ It's also important to minimize children's exposure to violence, which puts them at risk of mental health and substance use challenges.¹²⁹

- **Try to minimize negative influences and behaviors in young people's lives.** Talk to children early about the risks of alcohol and other drugs, both short-term (such as car crashes and other accidents) and long-term (such as reduced cognitive abilities). The earlier a child or adolescent begins using substances, the greater their chances of developing substance use problems.¹³¹ Mental health and substance use problems can also occur at the same time. For example, some young people struggling with stress or difficult feelings turn to alcohol or drug use.¹³² And alcohol and other drugs can also affect mental health, for example by altering mood or energy levels.¹³³
- **Ensure children and youth have regular check-ups with a pediatrician, family doctor, or other health care professional.** Health care professionals can help you monitor your children's health, give you advice on how to prevent problems, and diagnose and treat physical and mental illnesses. Obtaining health insurance coverage for your children can help. To learn more about enrolling in Medicaid, the Children's Health Insurance Program (CHIP), or a Marketplace plan, go to [HealthCare.gov](https://www.healthcare.gov) or [InsureKidsNow.gov](https://www.insurekidsnow.gov).
- **Look out for warning signs of distress, and seek help when needed.** Signs of distress in children can show up in a number of ways, such as irritability, anger, withdrawal, and other changes in their thoughts, appearance, performance at school, sleeping or eating patterns, or other behaviors.)¹³⁴ If you notice concerning changes in your child, let them know you're there and ready to support them however they need. Don't be afraid to ask for help by talking to a doctor, nurse, or other professional or looking into other available resources in your community. For example, schools often have counseling services and additional accommodations (e.g., for students enrolled in special education programs).
- **Minimize children's access to means of self-harm, including firearms and prescription medications.** Dispose of unused or expired prescriptions and keep medications out of reach for children and youth. If you choose to keep firearms in the home, ensure that they are stored safely: unloaded and locked up (e.g., in a lock box or safe). Having firearms in the home increases the likelihood of firearm-related death.^{135, 136} In fact, firearms are by far the most lethal means of suicide: 90% of attempted suicides with a firearm result in death, compared to less than 10% of attempted suicides overall.¹³⁷
- **Be attentive to how children and youth spend time online.** Digital technology can help young people connect with friends and family, learn about current events, express themselves, and access telehealth and other resources.¹³⁸ At the same time, children can have negative experiences online, such as being bullied, finding harmful information, and negatively comparing themselves to others.¹³⁹ **Box 3** has a list of questions you can ask yourself about your child's use of technology.
- **Be a voice for mental health in your community.** There are many ways to do this, from talking openly with friends and family about the importance of mental health, to going to school board meetings or a town hall, to volunteering with an advocacy group, to promoting greater funding and awareness of mental health programs in schools and local organizations, such as churches, libraries, parks and recreation, or sports teams.

TECHNOLOGY AND YOUTH MENTAL HEALTH: QUESTIONS FOR FAMILIES TO CONSIDER

Time

- How much time is my child spending online? Is it taking away from healthy offline activities, such as exercising, seeing friends, reading, and sleeping?
- Are there healthy limits I can set on my child's use of technology, such as limiting screen time to specific times of the day or week, or limiting certain kinds of uses?

Content

- Am I aware of what devices and content my child has access to?
- Is my child getting something meaningful and constructive out of content they are looking at, creating, or sharing? How do I know?
- Are there healthier ways my child could engage online? (Examples: Finding meal recipes, researching options for a family outing, video chatting with a relative, etc.)
- Is being online riskier for my child than for some other children? For example, does my child have a mental health condition that might make them react more strongly to certain kinds of stressful or emotional content?

Impact

- How does my child feel about the time they spend online?
- Is my child engaging because they want to, or because they feel like they have to?
- How can I create space for open conversations with my child about their experiences online?
- How do I feel about my own use of technology? Can I be a better role model for my child?

RESOURCES FOR FAMILIES

Children's Mental Health and **COVID-19 Parental Resources Kit** (CDC): Resources for supporting children's social, emotional, and mental health

HealthyChildren.org (American Academy of Pediatrics): Parenting tips and other resources

What's On Your Mind? (UNICEF): Guide for talking to children about mental health

Family Resource Center (Child Mind Institute): Family resources on child mental health, including **Media Guidelines for Kids of All Ages**

NetSmartz (National Center for Missing and Exploited Children): Online platform to teach children online safety in age-appropriate ways

Parents' Ultimate Guides (Common Sense Media): Information about the safety of current media and technology trends and apps for your children

HealthCare.gov or **InsureKidsNow.gov**: Information on enrolling in health insurance coverage

MentalHealth.gov: What to look for, how to talk about mental health, and how to get help

Aging and Disability Networks (ACL): Connect with advocacy and caregiver resources

WHAT EDUCATORS, SCHOOL STAFF, AND SCHOOL DISTRICTS CAN DO

The experiences children and young people have at school have a major impact on their mental health. At school, children can learn new knowledge and skills, develop close relationships with peers and supportive adults, and find a sense of purpose, fulfillment, and belonging. They can also find help to manage mental health challenges. On the other hand, children can also have highly negative experiences at school, such as being bullied, facing academic stress, or missing out on educational opportunities (for example, due to under-resourced schools). Mental health challenges can reveal themselves in a variety of ways at school, such as in a student having trouble concentrating in class, being withdrawn, acting out, or struggling to make friends. In light of these factors, below are recommendations for how schools, educators, and staff can support the mental health of all students:

- **Create positive, safe, and affirming school environments.** This could include developing and enforcing anti-bullying policies, training students and staff on how to prevent harm (e.g., implementing bystander interventions for staff and students), being proactive about talking to students and families about mental health, and using inclusive language and behaviors.^{140, 141} Where feasible, school districts should also consider structural changes, such as a later start to the school day, that support students' wellbeing.^{142, 143}
- **Expand social and emotional learning programs and other evidence-based approaches that promote healthy development.** Examples of social, emotional, and behavioral learning programs include Sources of Strength, The Good Behavior Game, Life Skills Training, Check-In/Check-Out, and PATHS.^{144, 145, 146, 147} Examples of other approaches include positive behavioral interventions and supports and digital media literacy education.
- **Learn how to recognize signs of changes in mental and physical health among students, including trauma and behavior changes. Take appropriate action when needed.**¹⁴⁸ Educators are often the first to notice if a student is struggling or behaving differently than usual (for example, withdrawing from normal activities or acting out). And educators are well-positioned to connect students to school counselors, nurses, or administrators who can further support students, including by providing or connecting students with services.¹⁴⁹
- **Provide a continuum of supports to meet student mental health needs, including evidence-based prevention practices and trauma-informed mental health care.** Tiered supports should include coordination mechanisms to get students the right care at the right time.¹⁵⁰ For example, the Project AWARE (Advancing Wellness and Resilience in Education) program provides funds for state, local, and tribal governments to build school-provider partnerships and coordinate resources to support prevention, screening, early intervention, and mental health treatment for youth in school-based settings.¹⁵¹ School districts could also improve the sharing of knowledge and best practices.

For example, districts could dedicate staff at the district level to implementing evidence-based programs across multiple schools). Districts could also implement mental health literacy training for school personnel (e.g., [Mental Health Awareness Training](#), [QPR training](#)).

- **Expand the school-based mental health workforce.**¹⁵² This includes using federal, state, and local resources to hire and train additional staff, such as school counselors, nurses, social workers, and school psychologists, including dedicated staff to support students with disabilities. For example, a lack of school counselors makes it harder to support children experiencing mental health challenges. The American School Counselor Association (ASCA) recommends 1 counselor for every 250 students, compared to a national average of 1 counselor for every 424 students (with significant variation by state).¹⁵³ The American Rescue Plan's Elementary and Secondary School Emergency Relief funds can be used for this purpose and for other strategies outlined in this document.¹⁵⁴
- **Support the mental health of all school personnel.** Opportunities include establishing realistic workloads and student-to-staff ratios, providing competitive wages and benefits (including health insurance with affordable mental health coverage), regularly assessing staff wellbeing, and integrating wellness into professional development.¹⁵⁵ In addition to directly benefitting school staff, these measures will also help school personnel maintain their own empathy, compassion, and ability to create positive environments for students.¹⁵⁶
- **Promote enrolling and retaining eligible children in Medicaid, CHIP, or a Marketplace plan, so that children have health coverage that includes behavioral health services.** The Connecting Kids to Coverage National Campaign also has [outreach resources](#) for schools, providers, and community-based organizations to use to encourage parents and caregivers to enroll in Medicaid and CHIP to access important mental health benefits. Families can be directed to [HealthCare.gov](#) or [InsureKidsNow.gov](#). Schools can use Medicaid funds to support enrollment activities and mental health services.¹⁵⁷
- **Protect and prioritize students with higher needs and those at higher risk of mental health challenges,** such as students with disabilities, personal or family mental health challenges, or other risk factors (e.g., adverse childhood experiences, trauma, poverty).¹⁵⁸

RESOURCES FOR EDUCATORS, SCHOOL STAFF, AND SCHOOL DISTRICTS

[Supporting Child and Student Social, Emotional, Behavioral, and Mental Health Needs](#) (Dept. of Education): Guidance for schools, school districts, and education departments

[National Center for School Mental Health](#): Resources to promote a positive school climate

[StopBullying.gov](#): Learn about what bullying is, who is at risk, and how you can help

[Turnaround for Children Toolbox](#): Tools to drive change towards a more equitable, whole-child approach to school

[Design Principles for Schools](#): Framework for redesigning schools with a focus on supporting students' learning and social and emotional development

[Safe Schools Fit Toolkit](#) (National Center for Healthy Safe Children): Resources and guides to build safe and healthy schools

[Mental Health Technology Transfer Center Network](#): School mental health resources

WHAT HEALTH CARE ORGANIZATIONS AND HEALTH PROFESSIONALS CAN DO

Our health care system today is not set up to optimally support the mental health and wellbeing of children and youth. In addition to changing government policy (see recommendations for Governments on page 33), we must reimagine how health care organizations and health professionals prevent, identify, and address mental health challenges. Below are some steps health care organizations and health professionals can take:

- **Recognize that the best treatment is prevention of mental health challenges. Implement trauma-informed care (TIC) principles and other prevention strategies to improve care for all youth, especially those with a history of adversity.** In addition to working in the clinic, for example to educate families on their role in healthy child development, health care professionals should work with other sectors (e.g., schools, child care, justice, social services, public health) on prevention strategies. For instance, health care professionals can refer patients to resources such as economic supports, school enrichment programs, and legal supports.¹²
- **Routinely screen children for mental health challenges and risk factors, including adverse childhood experiences (ACEs).**¹⁵⁹ Screenings can be done in primary care, schools, emergency departments, and other settings. For example, primary care providers can conduct screenings during well-visit appointments, annual physicals, or routine vaccinations using principles of trauma-informed care. Screenings should account for the diverse ways in which mental health challenges can manifest, such as changes in physical health, sleep patterns, and behaviors. It's critical that screening services link to appropriate follow-up care. The American Academy of Pediatrics offers [tools and resources](#) for screening processes. California's ACEs Aware initiative offers [ACEs screening tools](#) for children, adolescents, and young adults.
- **Identify and address the mental health needs of parents, caregivers, and other family members.** The mental health of children and youth is closely linked to the mental health and wellbeing of their families. Screening parents and caregivers for depression, intimate partner violence, substance use, and other challenges can be combined with broader assessments of food insecurity, housing instability, and other social determinants of health.¹⁶⁰
- **Combine the efforts of clinical staff with those of trusted community partners and child-serving systems (e.g., child welfare, juvenile justice).** For example, hospital-based violence intervention programs (HVIPs) identify patients at risk of repeat violent injury and link them to hospital- and community-based resources to address risk factors for violence.^{161, 162, 163, 164} Another example initiative is school-hospital partnerships, such as behavioral health urgent care clinics supported by schools.¹⁶⁵ New payment and delivery models, such as the Centers for Medicare & Medicaid Services Innovation Center's Integrated Care for Kids (InCK) Model, can be used to support the mental health-related needs of children across settings.¹⁶⁶

- **Build multidisciplinary teams to implement services that are tailored to the needs of children and their families.** Enlist children and families as partners and engage them in all stages of decision-making, from screening to treatment.¹⁶⁷ Recognize that a variety of cultural and other factors shape whether children and families are able or willing to seek mental health services. Accordingly, services should be culturally appropriate, offered in multiple languages (including ASL), and delivered by a diverse mental health workforce. Additionally, **support the wellbeing of mental health workers and community leaders**, building their capacity to support youth and their families.

RESOURCES FOR HEALTH CARE ORGANIZATIONS AND HEALTH PROFESSIONALS

Mental Health Initiatives (American Academy of Pediatrics): Information and guidance on supporting the healthy mental development of children, adolescents, and families. For example, see [here](#) for information on developing age-appropriate screening processes.

HealthySteps Model (Zero to Three): A primary care model that brings together child development experts, specialists, and pediatric primary care providers to promote healthy child development

Evidence-Based Practices Resource Center (Substance Abuse and Mental Health Services Administration): Information to incorporate evidence-based practices into communities and clinical settings

Behavioral Health Integration Compendium (American Medical Association): Steps for integrating behavioral health care into a clinical practice

Telemental Health Resource Center (Western Regional Children's Advocacy Center): Information and tools to set up telehealth programs for mental health

ACEs Screening Tools (California's ACEs Aware Initiative): Offers tools to screen children, adolescents, and adults for ACEs

Trauma Screening Tools (Childhood Trauma Toolkit, Centre for Addiction and Mental Health): ACEs questionnaire and developmental trauma symptom screening checklist

WHAT MEDIA ORGANIZATIONS, ENTERTAINMENT COMPANIES, AND JOURNALISTS CAN DO

Note: See next section for recommendations specific to technology platforms such as social media companies.

Media organizations, entertainment companies, and journalists can have a powerful impact on young people. In some cases, this impact can be positive. For example, television programs can keep children and adolescents informed about current events and teach them valuable lessons.¹⁶⁸ On the other hand, false, misleading, or exaggerated media narratives can perpetuate misconceptions and stigma against people with mental health or substance use problems.^{169, 170} In addition, media coverage of traumatic events, such as bombings and natural disasters, can contribute to psychological distress among consumers.^{171, 172, 173, 174, 175} Particularly in times of global crisis, such as the COVID-19 pandemic, people can come away from news stories feeling anxious and powerless.¹⁷⁶ Below are steps media organizations can take to protect the mental health of viewers while staying true to their role in informing the public:

- **Recognize the impact media coverage of negative events can have on the public's mental health.** The solution isn't to hide or downplay negative news, but rather to avoid misleading consumers, and to be more attentive to how stories are framed. Example best practices include:
 - Being **fact-based** in reporting and avoiding language that shocks, provokes, or creates a sense of panic.
 - Being more **cautious** about showing distressing content, particularly graphic images or video, without context or warnings for viewers. Help viewers **decide** whether they want to engage with the content.¹⁷⁷
 - Giving audiences **context**, including highlighting uncertainties and conflicting reports. When discussing preliminary research—such as papers that have not yet been peer-reviewed—outlets should be forthright about the preliminary nature of the findings, get independent experts to weigh in, and identify areas of uncertainty.
 - Offering the public ways to make a **positive difference** (for example, ways to donate funds or supplies to victims of a natural disaster).
 - Including **positive messages and stories of hope and healing** (particularly when covering pandemics, natural disasters, and incidents of mass violence).

- **Normalize stories about mental health and mental illness across all forms of media, taking care to avoid harmful stereotypes, promote scientifically accurate information, and include stories of help, hope, and healing.** Example best practices¹⁷⁸ include:
 - Avoiding harmful **stereotypes** about mental illness, such as the idea that people who have a mental illness are prone to violence or that mental illness causes violence. Research shows this is not the case.¹⁷⁹
 - Avoiding **demeaning language** (e.g., “crazy,” “psycho,” “looney,” “wacko,” “nut,” “junkie”). This includes using **person-centered language**, or language that focuses on the person rather than a disease label.¹⁸⁰ For example, instead of referring to someone as a “schizophrenic,” refer to them as a “person living with schizophrenia.”
 - Include stories of people seeking **help**, getting **treatment**, and successfully **recovering**. These can also include examples of people getting help from friends, family neighbors, or even strangers (not just mental health professionals).¹⁸¹
 - Direct consumers to **mental health resources** (as part of any mental health-related TV episode, movie, news story, podcast, or other media).
 - Craft more **authentic stories** by consulting with subject matter experts and people with personal experience of mental illness or mental health challenges.
- **Whenever depicting suicide or suicidal ideation, adhere to best practices such as the [National Recommendations for Depicting Suicide](#).**¹⁸² For example:
 - Convey that suicide is complex and often caused by multiple factors, not a single event.
 - Show that help is available. For example, in TV shows or movies, show characters reaching out to health professionals, talking to supportive peers, friends, or family, or calling or texting a crisis hotline.

RESOURCES FOR MEDIA ORGANIZATIONS, ENTERTAINMENT COMPANIES, AND JOURNALISTS

[Mental Health Media Guide](#): A guide to mental health storytelling developed by a coalition of mental health experts and entertainment industry leaders

[National Center on Disability and Journalism Resources](#): Effective, sensitive ways to talk about disability in the media

[National Recommendations for Depicting Suicide](#) (National Action Alliance): Guidance for content creators to tell more balanced and authentic stories involving suicide

WHAT SOCIAL MEDIA, VIDEO GAMING, AND OTHER TECHNOLOGY COMPANIES CAN DO

Over the past two decades, more and more of our lives have moved onto social media platforms and other digital public spaces. The COVID-19 pandemic has rapidly accelerated this trend. During the pandemic, the time teenagers spent in front of screens for activities not related to school more than doubled, from 3.8 to 7.7 hours per day.¹⁸³ In 2020, 81% of 14- to 22-year-olds said they used social media either “daily” or “almost constantly.”¹³⁸

In these digital public spaces, which privately owned and tend to be run for profit, there can be tension between what’s best for the technology company and what’s best for the individual user or for society. Business models are often built around maximizing user engagement as opposed to safeguarding users’ health and ensuring that users engage with one another in safe and healthy ways.^{184, 185} **This translates to technology companies focusing on maximizing time spent, not time well spent.**

In recent years, there has been growing concern about the impact of digital technologies, particularly social media, on the mental health and wellbeing of children and young people.^{186, 187, 188} Part of the challenge with research on this topic is that digital technology involves a vast range of devices, platforms, products, and activities, so it’s hard to generalize. Researchers also have limited access to data to inform potential research.

Many researchers argue that digital technologies can expose children to bullying, contribute to obesity and eating disorders, trade off with sleep, encourage children to negatively compare themselves to others, and lead to depression, anxiety, and self-harm.^{139, 187, 189, 190, 191, 192} Several studies have linked time spent on social media to mental health challenges such as anxiety and depression.^{26, 193, 194, 195, 196, 197} Meanwhile, others have cast doubt on the idea that technology or social media use is a major factor in youth wellbeing.^{198, 199, 200, 201, 202, 203}

Importantly, the impact of technology almost certainly varies from person to person, and it also matters what technology is being used and how.²⁰⁴ **So, even if technology doesn’t harm young people on average, certain kinds of online activities likely do harm some young people.** For example, some research has linked “passive” social media use (such as scrolling through posts and auto-play video) to declines in wellbeing (versus more “active” use such as commenting on posts or recording videos).²⁰⁵

There can also be benefits to certain online activities, such as connecting meaningfully with friends and family, learning a new skill, or accessing health care, and these also vary from person to person.²⁰⁶ For example, LGBTQ+ young people may be more vulnerable than other young people to cyberbullying but also more likely to consider social media important for feeling less alone, expressing themselves, finding inspiration, and getting support.^{138, 207}

There is a clear need to better understand the impact of technologies such as social media on different kinds of users, and to address the harms to users most at risk. We need more research using strong data and research methods, such as longitudinal and experimental designs, behavioral (as opposed to self-reported) measures of time spent online and types of content engaged with, as well as data on subgroups of users (e.g., boys vs. girls).^{208, 209}

Most importantly, technology companies must step up and take responsibility for creating a safe digital environment for children and youth. Today, most companies are not transparent about the impact of their products, which prevents parents and young people from making informed decisions and researchers from identifying problems and solutions. At a minimum, the public and researchers deserve much more transparency. More broadly, below are specific recommendations for how these companies can prioritize the wellbeing of users above monetizing those users for profit:

- **Prioritize user health and wellbeing at all stages of product development.**²¹⁰
 - **Elevate user safety, health, and wellbeing in the culture and leadership of technology companies.** Senior technology executives should acknowledge that their products can harm some young people and take material and measurable steps to prevent and mitigate these harms, even at the expense of engagement, scale, and profit. Leaders should be accountable for creating a safe, accessible, and inclusive digital environment for their users and designing safe products.
 - **Assess and address risks to users at the front end of product development.** Build products and services using a precautionary approach that focuses on making them safe for youth before they are deployed. Company employees at all levels, especially those involved in product development, should be expected to prioritize user health and wellbeing in their day-to-day work. For example, consider how to align performance incentives for product developers to measures of user wellbeing. Develop consistent procedures for receiving input on proposed products from youth, parents, health and youth development professionals, and civil society, for example through advisory groups. Create ways for employees to voice concerns about products without fear of retaliation.
 - **Continually measure the impact of products on user health and wellbeing and share data with the public.** Supplement traditional product success metrics, such as monthly active users, with dedicated metrics for user health and wellbeing. In addition to relying on user-reported data (e.g., surveys), consider using behavioral data (e.g., analysis of user inputs such as typed keywords). Make results publicly available. Take corrective action to address harms.
 - **Recognize that the impact of platforms and products can vary from user to user, and proactively ensure that products designed for adults are also safe for children and adolescents.** Consider many kinds of users, including users of different ages and developmental stages, when developing new products and features. Talk to those users and collect data to identify subgroups who may be harmed by certain products or ways of engaging. Use this data to inform product design and research.

- **Be transparent and allow for independent researchers and the public to study the impact of company products on user health and wellbeing.**
 - **Allow users to provide informative data about their online experience to independent researchers.** This should be a fully consented process that allows users to individually request personal data about their use to transfer to researchers (e.g., timestamps of when and how long use takes place; type of content seen and engaged with; whether, when, and how interactions with others took place). Companies should also allow third-party researchers to request data on behalf of users if evidence of full user consent is provided and facilitate the automated transfer of data to third-party researchers (e.g., through application programming interfaces or APIs).
 - **Directly provide researchers with data to enable understanding of (a) subgroups of users most at risk of harm and (b) algorithmic design and operation.** Data on algorithmic design and operation should be of sufficient granularity to allow researchers to understand when, why, and how users are shown different types of content.
 - **Partner with researchers and experts to analyze the mental health impacts of new products and features in advance of rollout. Regularly publish findings.** Where possible, design evaluations in ways that enable causal inference (for example, using randomized interventions).
 - **Allow a broad range of researchers to access data and previous research instead of providing access to a privileged few.** Make research results publicly available and do not bind researchers to non-disclosure agreements. Avoid conflicts of interest that cast doubt on researchers' independence.
- **Build user-friendly tools that help children and adolescents engage online in healthy ways.**
 - **Take a holistic approach to designing online spaces hospitable to young people.** For example, support the creation of **industry-wide safety standards for online health and wellbeing**, in partnership with civil society groups. Just as we have safety standards for offline activities, such as driving, we should also consider standards for online activities.^{211, 212} Private organizations, such as video game companies, have already begun sharing best practices and developing a common framework for protecting users.²¹³
 - **Limit children's exposure to harmful online content.** This can involve a mix of limiting access for younger users, reducing content amplification, prohibiting data collection of and targeted advertising to children, ensuring privacy settings are maximized by default, removing content quickly if it violates company policies, tightening age verification requirements and audits, enabling independent algorithm audits, and imposing consequences for users found to be circumventing age restrictions or other policies.²²⁷ Companies should conduct research to evaluate whether these measures work. For example, children today can easily get around age limits by claiming to be older than they really are. To address this, some companies have required users to upload an ID and a selfie to verify identity and age (without storing the underlying ID or selfie data).²¹⁴

- **Give users opportunities to control their online activity, including by opting out of content they may find harmful.** For example, some companies have built in “frictions,” such as notifications that remind people to take breaks and limit screen time.²¹⁵ Other examples of frictions could include banning “auto-play” functions on videos or limiting scrolling capabilities for youth users. Also consider allowing users to opt out of content they believe may harm their mental health, such as ads involving violence, alcohol, or gambling, or content related to eating disorders.²¹⁶
- **Develop products that actively safeguard and promote mental health and wellbeing.** New technologies create opportunities to reach large numbers of youth with educational interventions, such as directing youth to mental health tips and resources.²¹⁷ There are also emerging digital technologies—often referred to as “digital therapeutics”—that prevent, manage, and treat health conditions. More and more of these technologies are gaining clinical validation and regulatory approval.^{218, 219}
- **Promote equitable access to technology that supports the wellbeing of children and youth.** For example, donate digital technology and remote services (e.g., internet access) to under-resourced populations.

RESOURCES FOR SOCIAL MEDIA, VIDEO GAMING, AND OTHER TECHNOLOGY COMPANIES

Safety by Design (Australia’s eSafety Commissioner): Ways technology companies can minimize online threats and harms before they occur

Toolkit For Technologists (Center for Humane Technology): Principles to help create value-driven and humane technology environments

The Children’s Code (UK’s Information Commissioner): Standards for online services to protect children’s safety, rights, and privacy online

The Unseen Teen (Data & Society): A report with challenges and recommendations on improving digital wellbeing for adolescent users

The U.S. Access Board: U.S. federal agency providing technical assistance for content creators and developers

WHAT COMMUNITY ORGANIZATIONS CAN DO

Thousands of community organizations are doing heroic work every day to support the mental health of children and young people. While different groups address different parts of the problem, serve different youth populations, and implement different solutions, all community organizations can keep the following recommendations in mind as they continue their work:

- **Educate the public about the importance of mental health, and reduce negative stereotypes, bias, and stigma around mental illness.** Community groups can play a key role in fostering open dialogue about mental health at the local level and correcting misconceptions and biases. For example, community groups can partner with trusted messengers such as faith leaders and health care professionals to speak to community members about youth mental health needs. It's particularly important to address misconceptions in populations that have an outsized influence over young people, such as families, educators, health care professionals, juvenile justice officials, online influencers, and the media.
- **Implement evidence-based programs that promote healthy development, support children, youth, and their families, and increase their resilience.** Examples include youth enrichment programs (e.g., mentoring, after-school programs), skill-based parenting and family relationship approaches, and other efforts that address social determinants of youth health such as poverty, exposure to trauma, and lack of access to education and health care. A few respected programs include The Incredible Years,²²⁰ Strengthening Families,²²⁰ The Martinsburg Initiative,²²¹ and the Drug-Free Communities (DFC) Support Program.²²²
- **Ensure that programs rigorously evaluate mental health-related outcomes.** For example, track outcomes around anxiety, depression, and suicide (including ideation, plans, and attempts), as well as around upstream risk and protective factors (e.g., social connectedness, coping skills, economic supports).²²³
- **Address the unique mental health needs of at-risk youth, such as racial and ethnic minorities, LGBTQ+ youth, and youth with disabilities.** Youth-serving organizations should think intentionally about how and to whom program services are offered. For example, actively recruit and engage populations who have historically been prevented from equal access to opportunities and may benefit the most from services. Engage with youth to understand what unique barriers prevent them from accessing mental health services. Recruit program staff directly from communities being served. Build program staff capacity to recognize personal biases, as well as structural challenges in these communities. For example, provide training on cultural and linguistic competence and related topics.

- **Elevate the voices of children, young people, and their families.** Youth are experts on their own lives, so it is important to engage youth in community-based mental health efforts. Explore [youth advisory councils](#) and other ways to involve young people in all phases of programming, from ideation to implementation. Gather feedback to understand what is and isn't working. Include youth and families directly in delivering services, for example by creating [peer support programs](#).

RESOURCES FOR COMMUNITY ORGANIZATIONS

Having conversations in your community

(MentalHealth.gov): Provides a toolkit to help communities and groups plan and facilitate dialogues about mental health.

Preventing Adverse Childhood Experiences

(ACEs) (CDC): Guidance to equip communities with the best available evidence for the prevention of ACEs

A Comprehensive Technical Package for the Prevention of Youth Violence and

Associated Risk Behaviors (CDC): Strategies to help communities sharpen their focus on prevention activities to stop youth violence and its consequences

Preventing Suicide: A Technical Package of Policy, Programs, and Practices

(CDC): Strategies to help communities sharpen their focus on activities to prevent suicide

The Community Guide on Mental Health

(Community Preventive Services Task Force, or CPSTF): Evidence-based findings to select community interventions to improve mental health

Mentoring for Youth with Mental Health Challenges

(National Mentoring Resource Center): Research on mentoring for youth (ages 18 and younger) experiencing mental health challenges

WHAT FUNDERS AND FOUNDATIONS CAN DO

Philanthropic and other funding organizations play a critical role in supporting the mental health of children and young people across the full continuum of need. For example, they can make bets on promising but untested technologies or programs for which government funding may not be available. They can also serve as reliable partners to community-based organizations across the country, and promote and build cross-sector partnerships. Below are some recommendations for how funding organizations can support youth mental health:

- **Create sustained investments in equitable prevention, promotion, and early intervention.** Prioritize interventions that address social and economic factors known to affect children's healthy development and mental health, such as poverty, discrimination, and inequality, among others.²²⁴
- **Incentivize coordination across grantees and foster cross-sector partnerships to maximize reach and bring together a diversity of expertise.** The scale and complexity of mental health issues among young people require collaborative approaches. Consider leveraging resources across sectors to advance practices, policies, and research that support the mental health of children, youth, and families. And support grantees in developing and sharing meaningful mental health outcome measures.
- **Scale up evidence-based interventions, technologies, and services.** Use a [structured process](#) to assess an intervention's readiness to scale and support high-quality implementation at a community level.²²⁵ Share information and convene stakeholders to provide education and consultation to spread innovation.
- **Invest in innovative approaches and research on mental health.** For example, fund participatory research that involves young people in understanding their online experiences. Develop and test new solutions, including digitally enabled solutions that can reach young people at scale and in underserved communities. Consider different kinds of funding models, such as incubators and accelerators, that can drive funding toward promising projects at very early stages.^{226, 227}
- **Elevate and amplify the voices of youth and families in all stages of funding and evaluation.** Listening to young people is critical to understanding what kinds of solutions will work and what communities need to scale successful interventions. Bring young people, parents, and caregivers to the table to identify their needs and create ongoing meaningful opportunities to inform grantmaking strategies and decision-making. Engage youth from different identities and backgrounds—particularly those that come from vulnerable communities.

RESOURCES FOR FUNDERS AND FOUNDATIONS

Grantmakers in Health: Resources for health funders to learn, connect, and grow

Incorporating Youth Voice and the Lived Experience in Research (NAM): Seminar examining the importance of including youth voices in research

Health in Mind: A Philanthropic Guide for Mental Health and Addiction (UPenn Center for High Impact Philanthropy): Guidance for funders on mental health and addiction

COVID-19 Pandemic: Supporting Mental Health (UPenn Center for High Impact Philanthropy): Guidance for funders on how to help individuals and communities struggling with the stress of COVID-19

The Promise of Adolescence (NAM): Report supported by the Funders for Adolescent Science Translation (FAST) Collaborative with recommendations for funders and other adolescent-serving systems on supporting young people's development

Disability & Philanthropy Forum: Resources to advance disability inclusion in philanthropy

WHAT EMPLOYERS CAN DO

Employers can play an outsized role in supporting the mental health of children and young people. They can **directly** help younger employees, such as high school students working part-time jobs or young adults starting out in the labor force after high school or college. For example, employers can provide affordable health insurance that covers mental health needs.

Employers can also support children and youth **indirectly**. For example, they can offer insurance coverage for employees' dependent children, offer parent-friendly benefits such as family leave and childcare, and promote work-life balance and a positive culture at work to reduce family stress.

Below are some recommendations for how employers can support the mental health of young people:

- **Provide access to comprehensive, affordable, and age-appropriate mental health care for all employees and their families, including dependent children.** Research shows that parental mental health challenges not only impact their productivity in the workplace, but can also affect the mental health of their children.^{228, 229} Employers should offer health insurance plans that include no or low out-of-pocket costs for mental health services, and a robust network of high-quality mental health care providers.
- **Implement policies that address underlying drivers of employee mental health challenges, including both home and workplace stressors.** Employers should:
 - Offer paid family leave and sick leave where feasible. Consider additional employee benefits such as respite care for caregivers and mental health and wellness tools.
 - Help caregivers secure affordable childcare, or offer more flexible work arrangements. This can reduce stress and improve productivity.^{230, 231}
 - Ensure employees are aware of and can easily make use of these benefits. For example, include information on mental health benefits in emails, webinars, and during onboarding and training for all new hires.
- **Create a workplace culture that affirms the importance of the mental health and wellbeing of all employees and their families.**
 - Create space for employees to speak up about how they are feeling and encourage company leaders to serve as role models for discussing mental health and modeling healthy behaviors. For example, ensure that senior leaders take advantage of benefits such as paid leave and vacation days.

- Solicit ideas from employees about how to support their mental health and wellbeing as well as that of their children and families.
 - Adopt clear messaging that promotes mental health awareness and addresses common misconceptions about mental health (for example, that mental health issues are not a sign of weakness).
 - Provide managers and supervisors with training to help recognize negative mental health symptoms in themselves and colleagues and encourage employees to seek help.²³² [Mental health employee resource groups](#), for example, can help increase mental health awareness, build community, and offer peer support.
- **Regularly assess employees' sense of wellbeing within the workplace.** Tools such as employee surveys can help employers understand the wellbeing of employees across demographic groups (e.g., gender, race, sexual orientation), levels of seniority, business units, and geographies, and to identify opportunities for improvement. Employers should make sure to assess the wellbeing of young adults just starting out in the workforce, as well as of parents with young children.

RESOURCES FOR EMPLOYERS

Center for Workplace Mental Health (American Psychiatric Association Foundation): Resources to help employers create a more supportive workplace environment

Work and Wellbeing Initiative (Harvard-MIT Collaboration): [Employer toolkit](#) to help improve workplace conditions and list of [employee assessment tools](#)

What Works Wellbeing (UK): UK's independent body for wellbeing evidence, policy, and practice. For example, see example employee wellbeing [snapshot survey](#).

Employer's Guide to Digital Tools and Solutions for Mental Health (One Mind PsyberGuide): Information for employers on digital mental health solutions for employees

Generation Work (Annie E. Casey Foundation): Research briefs, blogs, and tools to help employers of youth better understand and integrate positive youth development approaches

Mental Health Toolkit (Employer Assistance and Resource Network on Disability Inclusion): Background, tools and resources to help employers learn more about mental health and cultivate a welcoming and supportive work environment

Office of Disability Employment Policy (Department of Labor): Resources for disability-related workplace policies and practices

WHAT FEDERAL, STATE, LOCAL, AND TRIBAL GOVERNMENTS CAN DO

Note: For actions taken by the Biden Administration from January to October 2021 to support youth mental health, see [Fact Sheet: Improving Access and Care for Youth Mental Health and Substance Use conditions](#).

Ultimately, youth mental health challenges cannot be addressed solely by the efforts of youth, their families, local communities, and private organizations. Federal, state, local, and tribal governments all have a role to play. While the below recommendations are not comprehensive, their implementation would mark an enormous step forward in supporting youth and their families:

- **Address the economic and social barriers that contribute to poor mental health for young people, families, and caregivers.** Priorities should include reducing child poverty and ensuring access to quality childcare, early childhood services, and education; healthy food; affordable health care; stable housing; and safe neighborhoods with amenities such as parks and playgrounds. Recent federal investments in child poverty reduction, safe school reopening, and other pandemic-related measures represent historic progress on this front, but additional investments are needed at all levels of government.²³³ Emphasis should be placed on preventing adverse childhood experiences (ACEs), which are strong risk factors for mental health challenges.¹²
- **Take action to ensure safe experiences online for children and young people.** Example opportunities include but are not limited to increasing investment in research on the role of social media and technology in youth mental health; educating consumers about potential mental health risks online; requiring companies to be more transparent with researchers and the public (e.g., disclosing meaningful data for research purposes, enabling systemic auditing of social media algorithms), and developing safety standards for online services (e.g., standards for data collection, age verification, user engagement techniques such as ‘nudges’, and advertising aimed at kids and teens). For instance, the United Kingdom’s [Age appropriate design code](#) has led companies including Instagram, TikTok, and YouTube to announce product changes to protect their users’ safety, rights, and privacy.^{234, 235} In addition, the Australian government’s [Safety by Design](#) initiatives have resulted in a [set of principles](#) for user safety, [tools for companies](#) to assess their safety practices, [resources for investors and financial entities](#) to manage online safety risks, and a [pilot program with universities](#) to embed Safety by Design materials into curricula.²³⁶

- **Ensure all children and youth have comprehensive and affordable coverage for mental health care.** Example opportunities include strengthening public and private insurance coverage for children and young adults (e.g., by promoting enrollment), ensuring adequate payment for pediatric mental health services, investing in innovative payment models for integrated and team-based care, increasing the participation of mental health professionals in insurance networks, and ensuring compliance with mental health parity laws.²³⁷ Local, state, and tribal governments can access outreach and enrollment resources to help enroll and retain eligible children in Medicaid and CHIP at [InsureKidsNow.gov](https://www.insurekidsnow.gov).
- **Support integration of screening and treatment into primary care.** For example, continue expanding **Pediatric Mental Health Care Access programs**, which give primary care providers teleconsultations, training, technical assistance, and care coordination to support diagnosis, treatment, and referral for children with mental health and substance use needs.^{238, 239, 240} Expanding screening for ACEs is also critical. For instance, California recently enacted a law that will significantly expand coverage for ACEs screening.²⁴¹
- **Provide resources and technical assistance to strengthen school-based mental health programs.** Example opportunities include improving education about mental health, increasing screening of students for mental health concerns, investing in additional staff (e.g., school counselors) to support student mental health needs, improving care coordination, and financing school-based mental health services. As mentioned in the earlier section with recommendations for educators, the American Rescue Plan's Elementary and Secondary School Emergency Relief funds can be used for these purposes, along with Project AWARE (Advancing Wellness and Resilience in Education) program funds, which provide support for state, local, and tribal governments in building school-provider partnerships and coordinating resources to support prevention, screening, early intervention, and mental health treatment for youth in school-based settings.²⁴² In California, a recent law will ensure that all middle and high school students learn about mental health in health education classes.²⁴³ And, in New Jersey, a recent program will provide funding for school districts to screen students for depression.²⁴⁴
- **Invest in prevention programs, such as evidence-based social and emotional learning.** Example opportunities include implementing developmentally appropriate social and emotional learning standards and programs, supporting professional development for educators, and providing funding for teachers and school leaders to work with families to support student health needs. For example, the CDC's Legacy for Children program, which promotes positive parenting among low-income mothers, has been found to improve children's behavioral, social, and emotional health.²⁴⁵
- **Expand the use of telehealth for mental health challenges.** Example opportunities include addressing regulatory barriers (such as limits on provision of telehealth across state lines), ensuring appropriate payment, and expanding broadband access. For instance, Colorado recently established the "I Matter" program, offering young people three free behavioral health sessions, primarily via telehealth.²⁴⁶

- **Expand and support the mental health workforce.** Example opportunities include investing in training and hiring individuals from a broader set of disciplines (e.g., peer supports, community health workers, family counselors, care coordinators), accelerating training and loan repayment initiatives, supporting the mental health and wellbeing of health workers, and recruiting a diverse workforce that reflects local communities. In the school setting, governments should invest in building a pipeline of school counselors, nurses, social workers, and school psychologists.²⁵³
- **Expand and strengthen suicide prevention and mental health crisis services.** Example opportunities include providing flexible funding to fund crisis care needs, increasing access to intensive outpatient and other "step-down" programs, supporting access to trauma-informed services for traumatized children, implementing the [988 mental health crisis and suicide prevention hotline](#), and promoting public awareness of crisis hotlines and other resources. Governments should also collaborate with the private sector and local communities to reduce access to firearms and other lethal means of suicide and promote best practices such as safe storage.
- **Improve coordination across all levels of government to address youth mental health needs.** One example is to ensure households eligible for social services and supports are receiving them. For instance, states can align renewal processes across Medicaid and the Supplemental Nutrition Assistance Program (SNAP), use data from SNAP files to complete Medicaid renewal, and allow qualified entities like schools to make presumptive eligibility determinations.²⁴⁷
- **Support continued reduction in biases, discrimination, and stigma related to mental health.** Example opportunities include enforcing laws that support the needs of at-risk youth (e.g., students with disabilities), identifying and improving policies and programs that inappropriately target or harm youth with mental health needs, and conducting targeted education campaigns to address stigma, promote new cultural norms, and increase safety and trust in local communities.
- **Support the mental health needs of youth involved in the juvenile justice system.** Example opportunities include investing in alternatives to incarceration (e.g., school, probation, and police-based diversion models for youth with mental health needs²⁴⁸), expanding mental health training for staff, supporting high-quality and trauma-informed mental health care inside these systems, and improving coordination across different youth-serving agencies.²⁴⁹
- **Support the mental health needs of youth involved in the child welfare system.** Example opportunities include expanding family-centered mental health services to prevent unnecessary entry and increase reunification;²⁵⁰ ensuring youth and caregivers are informed about medications; investing in peer support services; providing mental health services before, during, and after new placements and when emancipating from foster care;²⁵¹ ensuring youth have access to mental health services in community settings whenever possible; and avoiding unnecessary placements in non-family settings. Coordination should be improved across different youth-serving agencies.
- *See "Where Additional Research is Needed" section for recommendations specific to research and data on youth mental health*

WHERE ADDITIONAL RESEARCH IS NEEDED

Despite the evidence that millions of young people are suffering and in crisis, there is still a lot we don't know. Below are recommendations for the kinds of research questions and studies that should be prioritized to better understand and address youth mental health needs:

- **Improve mental health data collection and integration to understand youth mental health needs, trends, services, and evidence-based interventions.**
 - Today, data on youth mental health are collected and analyzed by multiple agencies and often take months or years to be released. The federal government should strengthen research and data integration across governments, health systems, and community organizations to ensure regular, longitudinal surveillance of national mental health trends across the age continuum. Data collection and data linkages should be improved to enable real-time surveillance (e.g., at the census tract level).
 - Data should be able to be disaggregated to enable analysis of trends (by age, gender, race, ethnicity, disability status and type, sexual orientation, socioeconomic background, family characteristics, insurance status, etc.).²⁵²
- **Foster public-private research partnerships.** For example, academic partners, community-based organizations, technology companies, health care companies, and others can partner to conduct novel studies using nontraditional data sources (e.g., data from wearables and online platforms) to better understand needs, track outcomes, and evaluate risk and protective factors for youth mental health.
- **Increase investments in basic, clinical, and health services research to identify treatment targets for mental health conditions and develop innovative, scalable therapies.** For example, conduct research to optimize stepped-care approaches to treatment for youth populations (e.g., different kinds of cognitive-behavioral therapy such as self-guided, computerized, and group-based vs. solely individual therapy).²⁵³
- **Prioritize data and research with at-risk youth populations, such as racial, ethnic, and sexual and gender minority youth, individuals from lower socioeconomic backgrounds, youth with disabilities, youth involved in the juvenile justice system, and other groups.**²⁵⁴ Researchers and research sponsors should ensure that these populations are represented in basic, translational, effectiveness, and services research studies. This will help improve understanding of disparities in risk and trajectories for mental illnesses, responsiveness to interventions, and access to, and engagement with, quality mental health services.

- **Advance dissemination and implementation science to scale up and improve compliance with evidence-based mental health practices in systems that serve children, youth, and their families.** For example, appropriate funding agencies can prioritize demonstration projects of effective evidence-based interventions in and across schools or other systems (e.g., primary care offices, clinics, treatment facilities, family services, child welfare settings, juvenile justice settings). Translate findings into actionable policy proposals and disseminate them effectively to improve adoption of best practices.
- **Conduct research to expand understanding of social media and digital technology’s impact on youth mental health and identify opportunities for intervention.** For example, explore the impact of frequent exposure to social comparisons, hateful speech, and graphic content on children and youth, and which groups are most- and least-affected. Also, identify opportunities for families to engage with youth around social media as a means of connection, and offer guidance in handling difficult interactions and content. Explore how pre-existing mental health status and environmental conditions in young people’s lives inform how they engage with and experience content online, and empower young people with effective strategies (e.g., mood management) to actively manage their online experiences.

CONCLUSION

As we learn the lessons of the COVID-19 pandemic, and start recovering and rebuilding, we have an opportunity to offer a more comprehensive, more fulfilling, and more inclusive vision of what constitutes public health. And for a generation of children facing unprecedented pressures and stresses, day in and day out, change can't come soon enough.

It won't come overnight. Many of the recommendations offered in this Advisory require structural buy-in and change.

But everyone has a role to play in combating this mental health pandemic. Without individual engagement, no amount of energy or resources can overcome the biggest barrier to mental health care: the stigma associated with seeking help. For too long, mental and emotional health has been considered, at best, the absence of disease, and at worst, a shame to be hidden and ignored.

If we each start reorienting our priorities to create accessible space in our homes, schools, workplaces, and communities for seeking and giving assistance, we can all start building a culture that normalizes and promotes mental health care.

This is the moment to demand change—with our voices and with our actions.

Only when we do will we be able to protect, strengthen, and support the health and safety of all children, adolescents, and young adults—and ensure everyone has a platform to thrive.

ACKNOWLEDGMENTS

This Advisory was prepared by the Office of the Surgeon General (OSG) with contributions from the following interagency partners:

Department of Health and Human Services

Administration for Children and Families (ACF)

Administration for Community Living (ACL)

Behavioral Health Coordinating Council Subcommittee on Children and Youth

Centers for Disease Control and Prevention (CDC)

 National Center for Injury Prevention and Control (NCIPC)

 National Center for HIV, Viral Hepatitis, STD, and TB Prevention (NCHHSTP)

 Division of Adolescent and School Health (DASH)

Centers for Medicare and Medicaid Services

 Center for Medicaid and CHIP Services

Food and Drug Administration (FDA)

 Office of Pediatric Therapeutics

Health Resources and Services Administration (HRSA)

Maternal and Child Health Bureau (MCHB)

Indian Health Service (IHS)

National Institutes of Health (NIH)

 National Institute of Mental Health (NIMH)

 National Institute on Drug Abuse (NIDA)

 Eunice Kennedy Shriver National Institute of Child Health and Human Development (NICHD)

Office of the Assistant Secretary for Health (OASH)

 Office of Minority Health (OMH)

Office of the Assistant Secretary for Planning and Evaluation (ASPE)

 Office of Human Services Policy (HSP)

 Office of Behavioral Health, Disability, and Aging Policy (BHDAP)

Substance Abuse and Mental Health Services Administration (SAMHSA)

Additional Partners

Department of Education

 Office of Special Education and Rehabilitative Services (OSERS)

Department of Justice (DOJ)

 Office of Justice Programs (OJP)

White House Domestic Policy Council (DPC)

White House Office of Science and Technology Policy (OSTP)

Note: Examples and external resources in this advisory are provided for informational purposes only, and their inclusion does not constitute an endorsement by any government office or agency.

REFERENCES

1. U.S. Department of Health & Human Services. (2020 May 28). What is Mental Health. MentalHealth.gov. Accessed on November 10, 2021. Retrieved from <https://www.mentalhealth.gov/basics/what-is-mental-health>
2. U.S. Department of Health and Human Services. (1999) Mental health: A report of the Surgeon General, Rockville, MD. U.S. Department of Health and Human Services, Substance Abuse and Mental Health Services Administration, Center for Mental Health Services, National Institutes of Health, National Institute of Mental Health. Retrieved from <https://profiles.nlm.nih.gov/101584932X120>
3. U.S. National Library of Medicine. (2021 October 12). Mental Disorders. MedlinePlus. Accessed on November 10, 2021. Retrieved from <https://medlineplus.gov/mentaldisorders.html>
4. Cross-Disorder Group of the Psychiatric Genomics Consortium (2013). Identification of risk loci with shared effects on five major psychiatric disorders: a genome-wide analysis. *Lancet* (London, England), 381(9875), 1371–1379. [https://doi.org/10.1016/S0140-6736\(12\)62129-1](https://doi.org/10.1016/S0140-6736(12)62129-1)
5. Marshall M. (2020). The hidden links between mental disorders. *Nature*, 581(7806), 19–21. <https://doi.org/10.1038/d41586-020-00922-8>
6. Williams D. R. (2018). Stress and the Mental Health of Populations of Color: Advancing Our Understanding of Race-related Stressors. *Journal of Health and Social Behavior*, 59(4), 466–485. <https://doi.org/10.1177/0022146518814251>
7. Kalin N. H. (2021). Impacts of Structural Racism, Socioeconomic Deprivation, and Stigmatization on Mental Health. *The American Journal of Psychiatry*, 178(7), 575–578. <https://doi.org/10.1176/appi.ajp.2021.21050524>
8. Doom, J. R., Seok, D., Narayan, A. J., & Fox, K. R. (2021). Adverse and Benevolent Childhood Experiences Predict Mental Health During the COVID-19 Pandemic. *Adversity and resilience science*, 1–12. Advance online publication. <https://doi.org/10.1007/s42844-021-00038-6>
9. Hughes, K., Bellis, M. A., Hardcastle, K. A., Sethi, D., Butchart, A., Mikton, C., Jones, L., Dunne, M. P. (2017). The effect of multiple adverse childhood experiences on health: A systematic review and meta-analysis. *The Lancet Public Health*, 2(8), e356–e366.
10. U.S. Department of Health and Human Services, Substance Abuse and Mental Health Services Administration. (2009). Risk and Protective Factors for Mental, Emotional and Behavioral Disorders Across the Life Cycle. <https://www.csifdl.org/wp-content/uploads/2018/07/Risk-and-Protective-Factors-Study.pdf>
11. Trent, M., Dooley, D. G., Dougé, J., Section on Adolescent Health, Council on Community Pediatrics, & Committee on Adolescence. (2019). The Impact of Racism on Child and Adolescent Health. *Pediatrics*, 144(2), e20191765. <https://doi.org/10.1542/peds.2019-1765>
12. Bhushan D, Kotz K, McCall J, Wirtz S, Gilgoff R, Dube SR, Powers C, Olson-Morgan J, Galeste M, Patterson K, Harris L, Mills A, Bethell C, Burke Harris N, Office of the California Surgeon General. (2020). Roadmap for Resilience: The California Surgeon General's Report on Adverse Childhood Experiences, Toxic Stress, and Health. Office of the California Surgeon General. DOI: 10.48019/PEAM8812
13. Centers for Disease Control and Prevention. (2021 April 6). What are adverse childhood experiences? Retrieved from <https://www.cdc.gov/violenceprevention/aces/fastfact.html>
14. Shonkoff, J. P., Garner, A. S., & Committee on Psychosocial Aspects of Child and Family Health, Committee on Early Childhood, Adoption, and Dependent Care and Section on Developmental and Behavioral Pediatrics. (2012). The lifelong effects of early childhood adversity and toxic stress. *Pediatrics*, 129(1), e232–e246.
15. Arango, C., Díaz-Caneja, C. M., McGorry, P. D., Rapoport, J., Sommer, I. E., Vorstman, J. A., McDaid, D., Marín, O., Serrano-Drozdzowskyj, E., Freedman, R., & Carpenter, W. (2018). Preventive strategies for mental health. *The Lancet. Psychiatry*, 5(7), 591–604. [https://doi.org/10.1016/S2215-0366\(18\)30057-9](https://doi.org/10.1016/S2215-0366(18)30057-9)
16. Schmidt C. W. (2007). Environmental connections: a deeper look into mental illness. *Environmental Health Perspectives*, 115(8), A404–A410. <https://doi.org/10.1289/ehp.115-a404>
17. Perou, R., Bitsko, R. H., Blumberg, S. J., Pastor, P., Ghandour, R. M., Gfroerer, J. C., Hedden, S. L., Crosby, A. E., Visser, S. N., Schieve, L. A., Parks, S. E., Hall, J. E., Brody, D., Simile, C. M., Thompson, W. W., Baio, J., Avenevoli, S., Kogan, M. D., Huang, L. N., & Centers for Disease Control and Prevention (CDC) (2013). Mental health surveillance among children—United States, 2005–2011. *MMWR. Morbidity and Mortality Weekly Report Supplements*, 62(2), 1–35.
18. Whitney, D.G. & Peterson, M. (2019). US national and state-level prevalence of mental health disorders and disparities of mental health care use in children. *JAMA Pediatrics*, 173(4), 389–391. doi:10.1001/jamapediatrics.2018.5399
19. Centers for Disease Control and Prevention. (2020). Youth Risk Behavior Surveillance Data Summary & Trends Report: 2009–2019. Retrieved from https://www.cdc.gov/nchhstp/dear_colleague/2020/dcl-102320-YRBS-2009-2019-report.html
20. Kalb, L. G., Stapp, E. K., Ballard, E. D., Holingue, C., Keefer, A., & Riley, A. (2019). Trends in Psychiatric Emergency Department Visits Among Youth and Young Adults in the US. *Pediatrics*, 143(4), e20182192. <https://doi.org/10.1542/peds.2018-2192>
21. Curtin, S. C. (2020). State suicide rates among adolescents and young adults aged 10–24: United States, 2000–2018. *National Vital Statistics Reports*; vol 69 no 11. Hyattsville, MD: National Center for Health Statistics.

22. Curtin, S. C., Hedegaard, H., Ahmad, F. B. (2021). Provisional numbers and rates of suicide by month and demographic characteristics: United States, 2020. *Vital Statistics Rapid Release*; no 16. Hyattsville, MD: National Center for Health Statistics.
23. Armstrong, K. (2020 September 30). Technology in Context: The Surprising Social Upsides of Constant Connectivity. *Association for Psychological Science*. Accessed on November 30, 2021. Retrieved from <https://www.psychologicalscience.org/observer/technology-social-context>
24. Hagan, J. F., Shaw, J. S., & Duncan, M. P. (2017). *Bright Futures: Guidelines for Health Supervision of Infants, Children, and Adolescents*. 4th ed. Elk Grove Village, IL: American Academy of Pediatrics. <https://brightfutures.aap.org/materials-and-tools/guidelines-and-pocket-guide/Pages/default.aspx>
25. Twenge, J. M., Joiner, T. E., Rogers, M. L., & Martin, G. N. (2018). Increases in Depressive Symptoms, Suicide-Related Outcomes, and Suicide Rates Among U.S. Adolescents After 2010 and Links to Increased New Media Screen Time. *Clinical Psychological Science*, 6(1), 3–17. <https://doi.org/10.1177/2167702617723376>
26. Riehm, K. E., Feder, K. A., Tormohlen, K. N., Crum, R. M., Young, A. S., Green, K. M., Pacek, L. R., La Flair, L. N., & Mojtabai, R. (2019). Associations Between Time Spent Using Social Media and Internalizing and Externalizing Problems Among US Youth. *JAMA psychiatry*, 76(12), 1266–1273. <https://doi.org/10.1001/jamapsychiatry.2019.2325>
27. Kasser, T., & Ryan, R. M. (1996). Further Examining the American Dream: Differential Correlates of Intrinsic and Extrinsic Goals. *Personality and Social Psychology Bulletin*, 22(3), 280–287. <https://doi.org/10.1177/0146167296223006>
28. Eckersley, R., & Dear, K. (2002). Cultural correlates of youth suicide. *Social science & medicine* (1982), 55(11), 1891–1904. [https://doi.org/10.1016/s0277-9536\(01\)00319-7](https://doi.org/10.1016/s0277-9536(01)00319-7)
29. Twenge, J. M., Gentile, B., DeWall, C. N., Ma, D., Lacefield, K., & Schurtz, D. R. (2010). Birth cohort increases in psychopathology among young Americans, 1938–2007: A cross-temporal meta-analysis of the MMPI. *Clinical Psychology Review*, 30(2), 145–154. <https://doi.org/10.1016/j.cpr.2009.10.005>
30. Fairbrother, G., Stuber, J., Galea, S., Pfefferbaum, B., & Fleischman, A. R. (2004). Unmet need for counseling services by children in New York City after the September 11th attacks on the World Trade Center: implications for pediatricians. *Pediatrics*, 113(5), 1367–1374. <https://doi.org/10.1542/peds.113.5.1367>
31. Rodway, C., Tham, S. G., Ibrahim, S., Turnbull, P., Windfuhr, K., Shaw, J., Kapur, N., & Appleby, L. (2016). Suicide in children and young people in England: a consecutive case series. *The Lancet Psychiatry*, 3(8), 751–759. [https://doi.org/10.1016/S2215-0366\(16\)30094-3](https://doi.org/10.1016/S2215-0366(16)30094-3)
32. Golberstein, E., Gonzales, G., & Meara, E. (2019). How do economic downturns affect the mental health of children? Evidence from the National Health Interview Survey. *Health Economics*, 28(8), 955–970. <https://doi.org/10.1002/hec.3885>
33. Doepke, M., & Zilibotti, F. (2019). *Love, money & parenting: How economics explains the way we raise our kids*. Princeton, NJ: Princeton University Press.
34. Marks, E., Hickman, C., Pihkala, P., Clayton, S., Lewandowski, ER., Mayall, EE., Wray, B., Mellor, C., & van Susteren, L. (2021). Young People's Voices on Climate Anxiety, Government Betrayal and Moral Injury: A Global Phenomenon. *The Lancet*. Preprint. <http://dx.doi.org/10.2139/ssrn.3918955>
35. Clayton, S., Manning, C. M., Speiser, M., & Hill, A. N. (2021). *Mental Health and Our Changing Climate: Impacts, Inequities, Responses*. Washington, D.C.: American Psychological Association, and ecoAmerica.
36. McLean, C. P., Asnaani, A., Litz, B. T., & Hofmann, S. G. (2011). Gender differences in anxiety disorders: prevalence, course of illness, comorbidity and burden of illness. *Journal of Psychiatric Research*, 45(8), 1027–1035. <https://doi.org/10.1016/j.jpsychires.2011.03.006>
37. Salk, R. H., Hyde, J. S., & Abramson, L. Y. (2017). Gender differences in depression in representative national samples: Meta-analyses of diagnoses and symptoms. *Psychological Bulletin*, 143(8), 783–822. <https://doi.org/10.1037/bul0000102>
38. Hedegaard, H., Curtin, S. C., & Warner, M. (2020). Increase in suicide mortality in the United States, 1999–2018. *NCHS Data Brief*, (362), 1–8. Hyattsville, MD: National Center for Health Statistics.
39. Bridge JA, Horowitz LM, Fontanella CA, et al. (2018). Age-Related Racial Disparity in Suicide Rates Among US Youths From 2001 Through 2015. *JAMA Pediatrics*, 172(7):697–699. doi:10.1001/jamapediatrics.2018.0399
40. Reiss F. (2013). Socioeconomic inequalities and mental health problems in children and adolescents: a systematic review. *Social Science & Medicine* (1982), 90, 24–31. <https://doi.org/10.1016/j.socscimed.2013.04.026>
41. Substance Abuse and Mental Health Services Administration. (2021). Key substance use and mental health indicators in the United States: Results from the 2020 National Survey on Drug Use and Health (HHS Publication No. PEP21-07-01-003, NSDUH Series H-56). Rockville, MD: Center for Behavioral Health Statistics and Quality, Substance Abuse and Mental Health Services Administration. Retrieved from <https://www.samhsa.gov/data/>
42. Hillis, S. D., Blenkinsop A., Villaveces A., Annor F. B., Liburd, L., Massetti, G. M., Demissie, Z., Mercy, J. A., Nelson, C. A., Cluver, L., Flaxman, S., Sherr, L., Donnelly, C. A., Ratmann, O., & Unwin, J. T. (2021). Covid-19-Associated Orphanhood and Caregiver Death in the United States. *Pediatrics*. DOI: 10.1542/peds.2021-053760
43. Racine, N., McArthur, B. A., Cooke, J. E., Eirich, R., Zhu, J., & Madigan, S. (2021). Global Prevalence of Depressive and Anxiety Symptoms in Children and Adolescents During COVID-19: A Meta-analysis. *JAMA Pediatrics*, 175(11), 1142–1150. <https://doi.org/10.1001/jamapediatrics.2021.2482>

44. Sharma, M., Idele, P., Manzini, A., Aladro, CP, Ipince, A., Olsson, G., Banati, P., Anthony, D. (2021). Life in Lockdown: Child and adolescent mental health and well-being in the time of COVID-19, UNICEF Office of Research – Innocenti, Florence; pages 43-46, <https://www.unicef-irc.org/publications/pdf/Life-in-Lockdown.pdf>
45. Yard, E., Radhakrishnan, L., Ballesteros, M. F., Sheppard, M., Gates, A., Stein, Z., Hartnett, K., Kite-Powell, A., Rodgers, L., Adjemian, J., Ehlman, D. C., Holland, K., Idaikkadar, N., Ivey-Stephenson, A., Martinez, P., Law, R., & Stone, D. M. (2021). Emergency Department Visits for Suspected Suicide Attempts Among Persons Aged 12-25 Years Before and During the COVID-19 Pandemic - United States, January 2019-May 2021. *MMWR. Morbidity and Mortality Weekly Report*, 70(24), 888–894. <https://doi.org/10.15585/mmwr.mm7024e1>
46. The New York Times. (2020 June 9). Child Abuse Cases Drop 51 Percent. The Authorities Are Very Worried. Accessed on November 23, 2021. Retrieved from <https://www.nytimes.com/2020/06/09/nyregion/coronavirus-nyc-child-abuse.html>
47. Ssentongo, P., Fronterre, C., Ssentongo, A. E., Advani, S., Heilbrunn, E. S., Hazelton, J. P., Oh, J. S., McCall-Hosenfeld, J. S., & Chinchilli, V. M. (2021). Gun violence incidence during the COVID-19 pandemic is higher than before the pandemic in the United States. *Scientific Reports*, 11(1), 20654. <https://doi.org/10.1038/s41598-021-98813-z>
48. Office of the Surgeon General (OSG). (2021). Confronting Health Misinformation: The U.S. Surgeon General's Advisory on Building a Healthy Information Environment. US Department of Health and Human Services. <https://www.hhs.gov/sites/default/files/surgeon-general-misinformation-advisory.pdf>
49. WHO, UN, UNICEF, UNDP, UNESCO, UNAIDS, ITU, UN Global Pulse, & IFRC. (2020, September 23). Managing the COVID-19 infodemic: Promoting healthy behaviours and mitigating the harm from misinformation and disinformation. World Health Organization. <https://www.who.int/news/item/23-09-2020-managing-the-covid-19-infodemic-promoting-healthy-behaviours-andmitigating-the-harm-from-misinformation-and-disinformation>
50. Johnston, W. M., & Davey, G. C. (2011). The psychological impact of negative TV news bulletins: the catastrophizing of personal worries. *British Journal of Psychology* (London, England: 1953), 88 (Pt 1), 85-91. <https://doi.org/10.1111/j.2044-8295.1997.tb02622.x>
51. Duan, L., Shao, X., Wang, Y., Huang, Y., Miao, J., Yang, X., & Zhu, G. (2020). An investigation of mental health status of children and adolescents in china during the outbreak of COVID-19. *Journal of Affective Disorders*, 275, 112–118. <https://doi.org/10.1016/j.jad.2020.06.029>
52. Goldmann, E., & Galea, S. (2014). Mental health consequences of disasters. *Annual Review of Public Health*, 35, 169–183. <https://doi.org/10.1146/annurev-publhealth-032013-182435>
53. Akin, L. B., De Neve, J. E., Dunn, E. W., Fancourt, D., Goldberg, E., Helliwell, J., Jones, S.P., Karam, E., Layard, R., Lyubomirsky, S., Rzepa, A., Saxena, S., Thornton, E., VanderWeele, T., Whillans, A., Zaki, J., Caman, O.K., Ben Amor, Y. (2021, February 19). Mental health during the first year of the COVID-19 pandemic: A review and recommendations for moving forward. <https://doi.org/10.31234/osf.io/zw93g>
54. Brühlhart, M., Klotzbücher, V., Lalive, R., & Reich, S. K. (2021). Mental health concerns during the COVID-19 pandemic as revealed by helpline calls. *Nature*, 10.1038/s41586-021-04099-6. Advance online publication. <https://doi.org/10.1038/s41586-021-04099-6>
55. Luchetti, M., Lee, J. H., Aschwanden, D., Sesker, A., Strickhouser, J. E., Terracciano, A., & Sutin, A. R. (2020). The trajectory of loneliness in response to COVID-19. *American Psychologist*, 75(7), 897–908. <https://doi.org/10.1037/amp0000690>
56. Appleby, L., Richards, N., Ibrahim, S., Turnbull, P., Rodway, C., & Kapur, N. (2021). Suicide in England in the COVID-19 pandemic: Early observational data from real time surveillance. *The Lancet Regional Health. Europe*, 4, 100110. <https://doi.org/10.1016/j.lanepe.2021.100110>
57. Ahmad, F. B., & Cisewski, J. A. (2021). Quarterly provisional estimates for selected indicators of mortality, 2019-Quarter 1, 2021. National Center for Health Statistics. National Vital Statistics System, Vital Statistics Rapid Release Program. Retrieved from <https://www.cdc.gov/nchs/nvss/vsrr/mortality-dashboard.htm#>
58. Roy, A., Breaux, R., Sciberras, E., Patel, P., Ferrara, E., Shroff, D., Cash, A., Dvorsky, M., Langberg, J., Quach, J., Melvin, G. A., Jackson, A., & Becker, S. P. (2021). A Preliminary Examination of Key Strategies, Challenges, and Benefits of Remote Learning Expressed by Parents During the COVID-19 Pandemic. <https://doi.org/10.31234/osf.io/5ca4v>
59. Wright, K. P., Jr, Linton, S. K., Withrow, D., Casiraghi, L., Lanza, S. M., Iglesia, H., Vetter, C., & Depner, C. M. (2020). Sleep in university students prior to and during COVID-19 Stay-at-Home orders. *Current Biology: CB*, 30(14), R797–R798. <https://doi.org/10.1016/j.cub.2020.06.022>
60. Vaillancourt, T., Brittain, H., Krygsman, A., Farrell, A. H., Landon, S., & Pepler, D. (2021). School bullying before and during COVID-19: Results from a population-based randomized design. *Aggressive Behavior*, 47, 557– 569. <https://doi.org/10.1002/ab.21986>
61. Osgood, K., Sheldon-Dean, H., & Kimball, H. (2021). 2021 Children's Mental Health Report: What we know about the COVID-19 pandemic's impact on children's mental health — and what we don't know. Child Mind Institute.
62. Centers for Disease Control and Prevention. COVID Data Tracker. Trends in Number of COVID-19 Cases and Deaths in the US Reported to CDC, by State/Territory. Accessed on November 29, 2021. Retrieved from https://covid.cdc.gov/covid-data-tracker/#trends_dailydeaths

63. Jones, K. (2021). The Initial Impact of COVID-19 on Children and Youth (Birth to 24 years): Literature Review in Brief. Retrieved from <https://aspe.hhs.gov/reports/impact-covid-19-children-youth>
64. Nikolaidis, A., DeRosa, J., Kass, M., Droney, I., Alexander, L., Di Martino, A., Bromet, E., Merikangas, K., Milham, M. P., & Paksarian, D. (2021). Heterogeneity in COVID-19 Pandemic-Induced Lifestyle Stressors and Predicts Future Mental Health in Adults and Children in the US and UK. medRxiv : the preprint server for health sciences, 2021.08.10.21261860. <https://doi.org/10.1101/2021.08.10.21261860>
65. Fitzpatrick, K. M., Harris, C., & Drawve, G. (2020). Fear of COVID-19 and the mental health consequences in America. *Psychological Trauma: Theory, Research, Practice, and Policy*, 12(S1), S17-S21. <https://doi.org/10.1037/tra0000924>
66. Sugg, M. M., Runkle, J. D., Andersen, L., Weiser, J., & Michael, K. D. (2021). Crisis response among essential workers and their children during the COVID-19 pandemic. *Preventive Medicine*, 153, 106852. Advance online publication. <https://doi.org/10.1016/j.ypmed.2021.106852>
67. Griffith A. K. (2020). Parental Burnout and Child Maltreatment During the COVID-19 Pandemic. *Journal of Family Violence*, 1–7. Advance online publication. <https://doi.org/10.1007/s10896-020-00172-2>
68. Sinko, L., He, Y., Kishton, R. et al. (2021). “The Stay at Home Order is Causing Things to Get Heated Up”: Family Conflict Dynamics During COVID-19 From The Perspectives of Youth Calling a National Child Abuse Hotline. *J Fam Viol.* <https://doi.org/10.1007/s10896-021-00290-5>
69. Esposito, S., Giannitto, N., Squarcia, A., Neglia, C., Argentiero, A., Minichetti, P., Cotugno, N. & Principi, N. (2021). Development of Psychological Problems Among Adolescents During School Closures Because of the COVID-19 Lockdown Phase in Italy: A Cross-Sectional Survey. *Frontiers in Pediatrics*, 8:628072. <https://doi.org/10.3389/fped.2020.628072>
70. Verlenden, J. V., Pampati, S., Rasberry, C. N., Liddon, N., Hertz, M., Kilmer, G., Viox, M. H., Lee, S., Cramer, N. K., Barrios, L. C., & Ethier, K. A. (2021). Association of Children's Mode of School Instruction with Child and Parent Experiences and Well-Being During the COVID-19 Pandemic - COVID Experiences Survey, United States, October 8-November 13, 2020. *MMWR. Morbidity and mortality weekly report*, 70(11), 369–376. <https://doi.org/10.15585/mmwr.mm7011a1>
71. Hawrilenko M, Kroshus E, Tandon P, Christakis D. The Association Between School Closures and Child Mental Health During COVID-19. *JAMA Netw Open*. 2021;4(9):e2124092. doi:10.1001/jamanetworkopen.2021.24092
72. Stinson, E. A., Sullivan, R. M., Peteet, B. J., Tapert, S. F., Baker, F. C., Breslin, F. J., Dick, A. S., Gonzalez, M. R., Guillaume, M., Marshall, A. T., McCabe, C. J., Pelham, W. E., 3rd, Van Rinsveld, A. M., Sheth, C. S., Sowell, E. R., Wade, N. E., Wallace, A. L., & Lisdahl, K. M. (2021). Longitudinal Impact of Childhood Adversity on Early Adolescent Mental Health During the COVID-19 Pandemic in the ABCD Study® Cohort: Does Race or Ethnicity Moderate Findings?. *Biological Psychiatry Global Open Science*, 10.1016/j.bpsgos.2021.08.007. Advance online publication. <https://doi.org/10.1016/j.bpsgos.2021.08.007>
73. Henderson MD, Schmus CJ, McDonald C, Irving SY. (2020). The COVID-19 pandemic and the impact on child mental health: a socio-ecological perspective. *Pediatric Nursing*. 46(6). <https://www.pediatricnursing.net/issues/20novdec/267.pdf>
74. [Pediatrics publication not currently available] Hernandez, J. (2021, November 8). A study links facing discrimination at a young age with future mental health issues. NPR. Retrieved November 9, 2021, from <https://www.npr.org/2021/11/08/1053632912/study-discrimination-young-age-future-mental-health-issue>
75. Westrupp, E. M., Bennett, C., Berkowitz, T., Youssef, G. J., Toubmourou, J. W., Tucker, R., Andrews, F. J., Evans, S., Teague, S. J., Karantzas, G. C., Melvin, G. M., Olsson, C., Macdonald, J. A., Greenwood, C. J., Mikocka-Walus, A., Hutchinson, D., Fuller-Tyszkiewicz, M., Stokes, M. A., Olive, L., Wood, A. G., ... Sciberras, E. (2021). Child, parent, and family mental health and functioning in Australia during COVID-19: comparison to pre-pandemic data. *European child & adolescent psychiatry*, 1–14. Advance online publication. <https://doi.org/10.1007/s00787-021-01861-z>
76. Patrick, S. W., Henkhaus, L. E., Zickafoose, J. S., Lovell, K., Halvorson, A., Loch, S., Letterie, M., & Davis, M. M. (2020). Well-being of Parents and Children During the COVID-19 Pandemic: A National Survey. *Pediatrics*, 146(4), e2020016824. <https://doi.org/10.1542/peds.2020-016824>
77. Bergman, A. S., Axberg, U., & Hanson, E. (2017). When a parent dies - a systematic review of the effects of support programs for parentally bereaved children and their caregivers. *BMC palliative care*, 16(1), 39. <https://doi.org/10.1186/s12904-017-0223-y>
78. White, L.C., Law, J.K., Daniels, A.M., Toroney, J., Vernoia, B., Xiao, S., The SPARK Consortium, Feliciano, P., & Chung, W.K. (2020). Brief Report: Impact of COVID-19 on individuals with ASD and their caregivers: A perspective from the SPARK cohort. *Journal of Autism and Developmental Disorders*. <https://doi.org/10.1007/s10803-020-04816-6>
79. Jeste, S., Hyde, C., Distefano, C., Halladay, A., Ray, S., Porath, M., Wilson, R. B., & Thurm, A. (2020). Changes in access to educational and healthcare services for individuals with intellectual and developmental disabilities during COVID-19 restrictions. *Journal of intellectual disability research: JIDR*, 10.1111/jir.12776. Advance online publication. <https://doi.org/10.1111/jir.12776>
80. Neece, C., McIntyre, L. L., & Fenning, R. (2020). Examining the impact of COVID-19 in ethnically diverse families with young children with intellectual and developmental disabilities. *Journal of intellectual disability research: JIDR*, 64(10), 739–749. <https://doi.org/10.1111/jir.12769>

81. Patel K. (2020). Mental health implications of COVID-19 on children with disabilities. *Asian journal of psychiatry*, 54, 102273. <https://doi.org/10.1016/j.ajp.2020.102273>
82. National Council on Disability. (2021). 2021 Progress Report: The Impact of COVID-19 on People with Disabilities. https://ncd.gov/sites/default/files/NCD_COVID-19_Progress_Report_508.pdf
83. Racial and ethnic disparities in pediatric mental health. *Child and adolescent psychiatric clinics of North America*, 19(4), 759–774. <https://doi.org/10.1016/j.chc.2010.07.001>
84. American Indian Policy Institute. (2021). Tribal Digital Divide: Policy Brief and Recommendations. Accessed on November 10, 2021. Retrieved from https://aipi.asu.edu/sites/default/files/tribal_digital_divide_stimulus_bill_advocacy_04032020.pdf
85. Rogers, A. A., Ha, T., & Ockey, S. (2021). Adolescents' Perceived Socio-Emotional Impact of COVID-19 and Implications for Mental Health: Results From a U.S.-Based Mixed-Methods Study. *The Journal of adolescent health*, 68(1), 43–52. <https://doi.org/10.1016/j.jadohealth.2020.09.039>
86. Flanagan, S., Margolius, M., Pileggi, M., Glaser L., Burkander, K., Kincheloe, M., & Freeman, J. (2021). Where Do We Go Next? Youth Insights on the High School Experience During a Year of Historic Upheaval. America's Promise Alliance and Research for Action. <https://www.researchforaction.org/wp-content/uploads/2021/07/where-do-we-go-next.pdf>
87. Cheah, C., Wang, C., Ren, H., Zong, X., Cho, H. S., & Xue, X. (2020). COVID-19 Racism and Mental Health in Chinese American Families. *Pediatrics*, 146(5), e2020021816. <https://doi.org/10.1542/peds.2020-021816>
88. Wakabayashi, K., Cheah, C. S. L., Chang, T., Lai, G., Subrahmanyam, K., Chaudhary, N., Hyun, S., & Patel P. (2020). Addressing Inequities in Education: Considerations for Asian American Children and Youth in the Era of COVID-19. Society for Research in Child Development. <https://www.srcd.org/research/addressing-inequities-education-considerations-asian-american-children-and-youth-era-covid>
89. Panchal, N., Kamal, R., Cox, C., Garfield, R., & Chidambaram, P. (2021, May 26). Mental health and substance use considerations among children during the COVID-19 pandemic. Kaiser Family Foundation. <https://www.kff.org/coronavirus-covid-19/issue-brief/mental-health-and-substance-use-considerations-among-children-during-the-covid19-pandemic/>
90. Department of Education Office of Civil Rights. (2021). *Education in a Pandemic: The Disparate Impacts of COVID-19 on America's Students*. <https://www2.ed.gov/about/offices/list/ocr/docs/20210608-impacts-of-covid19.pdf>
91. Dooley, D., Bandealy, A., & Tschudy, M. (2020). Low-income children and coronavirus disease 2019 (COVID-19) in the US. *JAMA Pediatrics*, 174(10), 922–923.
92. Lai, J., & Widmar, N. O. (2020). Revisiting the Digital Divide in the COVID-19 Era. *Applied economic perspectives and policy*, 10.1002/aepp.13104. Advance online publication. <https://doi.org/10.1002/aepp.13104>
93. Endale, T., St Jean, N., & Birman, D. (2020). COVID-19 and refugee and immigrant youth: A community-based mental health perspective. *Psychological trauma: theory, research, practice and policy*, 12(S1), S225–S227. <https://doi.org/10.1037/tra0000875>
94. Robinson, L. R., Holbrook, J. R., Bitsko, R. H., Hartwig, S. A., Kaminski, J. W., Ghandour, R. M., Peacock, G., Heggs, A., & Boyle, C. A. (2017). Differences in Health Care, Family, and Community Factors Associated with Mental, Behavioral, and Developmental Disorders Among Children Aged 2–8 Years in Rural and Urban Areas - United States, 2011–2012. *Morbidity and mortality weekly report. Surveillance summaries* (Washington, D.C. : 2002), 66(8), 1–11. <https://doi.org/10.15585/mmwr.ss6608a1>
95. Lawrence, H. R., Burke, T. A., Sheehan, A. E., Pastro, B., Levin, R. Y., Walsh, R., Bettis, A. H., & Liu, R. T. (2021). Prevalence and correlates of suicidal ideation and suicide attempts in preadolescent children: A US population-based study. *Translational psychiatry*, 11(1), 489. <https://doi.org/10.1038/s41398-021-01593-3>
96. Development Services Group, Inc. (2017). "Intersection Between Mental Health and the Juvenile Justice System." Literature review. Washington, D.C.: Office of Juvenile Justice and Delinquency Prevention. <https://www.ojjdp.gov/mpg/litreviews/Intersection-Mental-Health-Juvenile-Justice.pdf>
97. Houtrow, A., Harris, D., Molinero, A., Levin-Decanini, T., & Robichaud, C. (2020). Children with disabilities in the United States and the COVID-19 pandemic. *Journal of pediatric rehabilitation medicine*, 13(3), 415–424. <https://doi.org/10.3233/PRM-200769>
98. Kugelmass H. (2016). "Sorry, I'm Not Accepting New Patients": An Audit Study of Access to Mental Health Care. *Journal of health and social behavior*, 57(2), 168–183. <https://doi.org/10.1177/0022146516647098>
99. Drescher J. (2015). Out of DSM: Depathologizing Homosexuality. *Behavioral sciences* (Basel, Switzerland), 5(4), 565–575. <https://doi.org/10.3390/bs5040565>
100. Centers for Disease Control and Prevention. (2021 October 14). Medical Conditions. Accessed on November 10, 2021. Retrieved from <https://www.cdc.gov/coronavirus/2019-ncov/need-extra-precautions/people-with-medical-conditions.html>
101. Fond, G., Nemani, K., Etchecopar-Etchart, D., Loundou, A., Goff, D. C., Lee, S. W., Lancon, C., Auquier, P., Baumstarck, K., Llorca, P. M., Yon, D. K., & Boyer, L. (2021). Association Between Mental Health Disorders and Mortality Among Patients With COVID-19 in 7 Countries: A Systematic Review and Meta-analysis. *JAMA psychiatry*, 78(11), 1208–1217. <https://doi.org/10.1001/jamapsychiatry.2021.2274>

- 102.** Ceban, F., Nogo, D., Carvalho, I. P., Lee, Y., Nasri, F., Xiong, J., Lui, L., Subramaniapillai, M., Gill, H., Liu, R. N., Joseph, P., Teopiz, K. M., Cao, B., Mansur, R. B., Lin, K., Rosenblat, J. D., Ho, R. C., & McIntyre, R. S. (2021). Association Between Mood Disorders and Risk of COVID-19 Infection, Hospitalization, and Death: A Systematic Review and Meta-analysis. *JAMA psychiatry*, 78(10), 1079–1091. <https://doi.org/10.1001/jamapsychiatry.2021.1818>
- 103.** World Economic Forum. (2020 October 9). 7 ways young people are making a difference in mental health. Accessed on November 10, 2021. Retrieved from <https://www.weforum.org/agenda/2020/10/7-ways-young-people-making-a-difference-mental-health/>
- 104.** Packman, K.J. (2020 October 15). The pandemic has shown us that parents have a bigger role to play in education. Accessed on November 10, 2021. Retrieved from: <https://www.involve.org.uk/resources/blog/opinion/pandemic-has-shown-us-parents-have-bigger-role-play-education>
- 105.** Edsource. (2021 March 19). Teachers reflect on a year of Covid: students struggling, others thriving. Accessed on November 10, 2021. Retrieved from: <https://edsource.org/2021/teachers-reflect-on-a-year-of-covid-students-struggling-others-thriving/649705>
- 106.** Children's Hospital Colorado. (2021). Providing Mental Health Care During the COVID-19 Pandemic. Accessed on November 10, 2021. Retrieved from <https://www.childrenscolorado.org/health-professionals/coronavirus-professional-resources/clinical-guidance-practice-resources/providing-care-during-covid-19-pandemic/>
- 107.** Boys and Girls Club of America. (2020 March 19). Clubs Offer Critical Care During COVID-19. Accessed on November 10, 2021. Retrieved from <https://www.bgca.org/news-stories/2020/March/Clubs-Offer-Critical-Care-During-COVID-19>
- 108.** Mental Health America. (2020 May 5). 8 Employers Supporting Employee Mental Health During COVID-19. Accessed on November 10, 2021. Retrieved from <https://mhanational.org/blog/8-employers-supporting-employee-mental-health-during-covid-19>
- 109.** National Conference of State Legislatures. (2021 April 17). Bridging the gap to youth mental health during COVID-19. Accessed on November 10, 2021. Retrieved from <https://www.ncsl.org/blog/2020/04/17/bridging-the-gap-to-youth-mental-health-during-covid-19.aspx>
- 110.** The White House. (2021 October 29). Fact Sheet: Biden Administration Announces Additional Actions to Increase COVID-19 Screening Testing in Schools and Keep Students Safe. <https://www.whitehouse.gov/briefing-room/statements-releases/2021/10/29/fact-sheet-biden-administration-announces-additional-actions-to-increase-covid-19-screening-testing-in-schools-and-keep-students-safe/>
- 111.** The White House. (2021 July 15). FACT SHEET: Biden-Harris Administration Distributes First Monthly Payments of the Expanded Child Tax Credit. <https://www.whitehouse.gov/briefing-room/statements-releases/2021/07/15/fact-sheet-biden-harris-administration-distributes-first-monthly-payments-of-the-expanded-child-tax-credit/>
- 112.** Department of Health and Human Services, Office of Disease Prevention and Health Promotion. (nd). Social Determinants of Health. Accessed on November 10, 2021. Retrieved from <https://health.gov/healthypeople/objectives-and-data/social-determinants-health>
- 113.** Parolin, Zachary, Sophie Collyer, Megan A. Curran, and Christopher Wimer. 2021. "Monthly Poverty Rates among Children after Expansion of the Child Tax Credit." Poverty and Social Policy Brief. *Center on Poverty and Social Policy*, Columbia University. Vol. 5, no. 4. <https://www.povertycenter.columbia.edu/news-internal/monthly-poverty-july-2021>
- 114.** Roehlkepartain, E. C., Pekel, K., Syvertsen, A. K., Sethi, J., Sullivan, T. K., & Scales, P. C. (2017). Relationships First: Creating Connections that Help Young People Thrive. Minneapolis, MN: Search Institute. <https://www.search-institute.org/wp-content/uploads/2017/12/2017-Relationships-First-final.pdf>
- 115.** Oberle, E., Guhn, M., Gadermann, A. M., Thomson, K., & Schonert-Reichl, K. A. (2018). Positive mental health and supportive school environments: A population-level longitudinal study of dispositional optimism and school relationships in early adolescence. *Social science & medicine* (1982), 214, 154–161. <https://doi.org/10.1016/j.socscimed.2018.06.041>
- 116.** Ballard, P. J., Hoyt, L. T., & Pachucki, M. C. (2019). Impacts of Adolescent and Young Adult Civic Engagement on Health and Socioeconomic Status in Adulthood. *Child development*, 90(4), 1138–1154. <https://doi.org/10.1111/cdev.12998>
- 117.** Spagnola, M., & Fiese, B. (2007). Family routines and rituals. *Infants and Young Children*, 20(4), 284–299. <https://doi.org/10.1097/01.IYC.0000290352.32170.5A>
- 118.** Glynn, L. M., Davis, E. P., Luby, J. L., Baram, T. Z., & Sandman, C. A. (2021). A predictable home environment may protect child mental health during the COVID-19 pandemic. *Neurobiology of stress*, 14, 100291. <https://doi.org/10.1016/j.ynstr.2020.100291>
- 119.** National Academies of Sciences, Engineering, and Medicine; Health and Medicine Division; Division of Behavioral and Social Sciences and Education; Board on Children, Youth, and Families; Committee on Applying Lessons of Optimal Adolescent Health to Improve Behavioral Outcomes for Youth, Kahn, N. F., & Graham, R. (Eds.). (2019). Promoting Positive Adolescent Health Behaviors and Outcomes: Thriving in the 21st Century. *National Academies Press* (US).
- 120.** Centers for Disease Control and Prevention. (2021). Coping with Stress. Accessed on November 10, 2021. Retrieved from: <https://www.cdc.gov/mentalhealth/stress-coping/cope-with-stress/index.html>
- 121.** The National Institute of Mental Health Information Resource Center. (2021). 5 Action Steps for Helping Someone in Emotional Pain. Accessed on November 10, 2021. Retrieved from: https://www.nimh.nih.gov/health/publications/5-action-steps-for-helping-someone-in-emotional-pain?utm_campaign=shareNIMH&utm_medium=Portal&utm_source=NIMHwebsite

122. Substance Abuse and Mental Health Administration. (2016). Creating a Youth Advisory Board. Accessed on November 12, 2021. Retrieved from https://youthmovenational.org/wp-content/uploads/2019/05/T2C_3-Final_Youth_Advisory_Boards.pdf
123. Centers for Disease Control and Prevention. (2021). Care for Yourself. Accessed on November 12, 2021. Retrieved from: <https://www.cdc.gov/mentalhealth/stress-coping/care-for-yourself/index.html>
124. National Scientific Council on the Developing Child (2015). *Supportive Relationships and Active Skill-Building Strengthen the Foundations of Resilience: Working Paper No. 13*. Retrieved from www.developingchild.harvard.edu
125. U.S. Department of Justice, Office of Juvenile Justice and Delinquency Prevention. (nd). Mentoring. Accessed on November 12, 2021. Retrieved from <https://ojjdp.ojp.gov/programs/mentoring>
126. Whitebread D. (2017). Free play and children's mental health. *The Lancet. Child & adolescent health*, 1(3), 167–169. [https://doi.org/10.1016/S2352-4642\(17\)30092-5](https://doi.org/10.1016/S2352-4642(17)30092-5)
127. Masten, A. S. (2014). *Ordinary magic: Resilience in development*. New York, NY: Guilford Press. <https://doi.org/10.1002/imhj.21625>
128. American Psychological Association. (2021 January 14). How to talk to children about difficult news. Accessed on November 29, 2021. Retrieved from <https://www.apa.org/topics/stress/talking>
129. Centers for Disease Control and Prevention. (2021 January 5). Risk and Protective Factors. Accessed on November 12, 2021. Retrieved from <https://www.cdc.gov/violenceprevention/aces/riskprotectivefactors.html>
130. Centers for Disease Control and Prevention. (2020 February 10). Teen Substance Use & Risks. Accessed on November 30, 2021. Retrieved from <https://www.cdc.gov/ncbddd/fasd/features/teen-substance-use.html>
131. Hingson, R. W., & Zha, W. (2009). Age of drinking onset, alcohol use disorders, frequent heavy drinking, and unintentionally injuring oneself and others after drinking. *Pediatrics*, 123(6), 1477–1484. <https://doi.org/10.1542/peds.2008-2176>
132. Substance Abuse and Mental Health Services Administration. (2021 November 9). Warning Signs and Risk Factors for Emotional Distress. Accessed on November 30, 2021. Retrieved from <https://www.samhsa.gov/find-help/disaster-distress-helpline/warning-signs-risk-factors>
133. Centers for Disease Control and Prevention. (2021 May 11). Alcohol Use and Your Health. Accessed on November 30, 2021. Retrieved from <https://www.cdc.gov/alcohol/fact-sheets/alcohol-use.htm>
134. National Eating Disorders Association. (2021). Warning signs and symptoms. Accessed on November 22, 2021. Retrieved from <https://www.nationaleatingdisorders.org/warning-signs-and-symptoms>
135. Koriath, T. (2018). Guns in child's home raise risk of suicide, unintentional death. Accessed on November 29, 2021. Retrieved from <https://publications.aap.org/aapnews/news/10383>
136. Swanson, S. A., Eyllon, M., Sheu, Y. H., & Miller, M. (2020). Firearm access and adolescent suicide risk: toward a clearer understanding of effect size. *Injury prevention: Journal of the International Society for Child and Adolescent Injury Prevention*, 27(3), 264–270. Advance online publication. <https://doi.org/10.1136/injuryprev-2019-043605>
137. Conner, A., Azrael, D., & Miller, M. (2019). Suicide Case-Fatality Rates in the United States, 2007 to 2014: A Nationwide Population-Based Study. *Annals of internal medicine*, 171(12), 885–895. <https://doi.org/10.7326/M19-1324>
138. Rideout, V., Fox, S., Peebles, A., & Robb, M. B. (2021). Coping with COVID-19: How young people use digital media to manage their mental health. San Francisco, CA: Common Sense and Hopelab. Retrieved from: <https://www.commonsensemedia.org/sites/default/files/uploads/research/2021-coping-with-covid19-full-report.pdf>
139. Coyne, S. M., Radesky, J., Collier, K. M., Gentile, D. A., Linder, J. R., Nathanson, A. I., Rasmussen, E. E., Reich, S. M., & Rogers, J. (2017). Parenting and Digital Media. *Pediatrics*, 140(Suppl 2), S112–S116. <https://doi.org/10.1542/peds.2016-1758N>
140. Morgan Stanley Alliance for Children's Mental Health. (2021 August). Tips for Supporting Students' Mental Health This Fall. Accessed on November 12, 2021. Retrieved from: <https://www.morganstanley.com/assets/pdfs/reemergence-program-educator-tips-english.pdf>
141. Centers for Disease Control and Prevention. (2018 August 7). School Connectedness. Accessed on November 12, 2021. Retrieved from https://www.cdc.gov/healthyyouth/protective/school_connectedness.htm
142. Adolescent Sleep Working Group, Committee on Adolescence, & Council on School Health (2014). School start times for adolescents. *Pediatrics*, 134(3), 642–649. <https://doi.org/10.1542/peds.2014-1697>
143. Centers for Disease Control and Prevention. (2020 May 29). Sleep and Sleep Disorders. Accessed on November 22, 2021. Retrieved from <https://www.cdc.gov/sleep/features/schools-start-too-early.html>
144. Stone, D.M., Holland, K.M., Bartholow, B., Crosby, A.E., Davis, S., and Wilkins, N. (2017). Preventing Suicide: A Technical Package of Policies, Programs, and Practices. Atlanta, GA: National Center for Injury Prevention and Control, Centers for Disease Control and Prevention. Retrieved from: <https://www.cdc.gov/violenceprevention/pdf/suicideTechnicalPackage.pdf>
145. National Health Promotion Associates. Botvin Life Skills Training. Accessed on November 12, 2021. Retrieved from <https://www.lifeskillstraining.com/>
146. PATHS Program Holding, LLC. PATHS Program. Accessed on November 12, 2021. Retrieved from <https://pathsprogram.com/>

147. PBIS Rewards. (nd). Check-In/Check-Out Behavior Intervention & PBIS. Accessed on November 18, 2021. Retrieved from <https://www.pbisrewards.com/blog/check-in-check-out-behavior-intervention/>
148. Substance Abuse and Mental Health Services Administration. (2021 November 5). Recognizing and Treating Child Traumatic Stress. Accessed on November 12, 2021. Retrieved from <https://www.samhsa.gov/child-trauma/recognizing-and-treating-child-traumatic-stress>
149. U.S. Department of Health & Human Services (MentalHealth.gov). (2019 March 22). For Educators. Accessed on November 12, 2021. Retrieved from <https://www.mentalhealth.gov/talk/educators>
150. National Association of School Psychologists. (2020). Providing effective social-emotional and behavioral supports after COVID-19 closures: Universal screening and Tier 1 interventions. Retrieved from <https://www.nasponline.org/resources-and-publications/resources-and-podcasts/covid-19-resource-center/crisis-and-mental-health-resources/providing-effective-social%E2%80%9393emotional-and-behavioral-supports-after-covid-19-closures-universal-screening-and-tier-1-interventions>
151. U.S. Department of Health and Human Services. (2021 August 27). SAMHSA Awards \$74.2M in Grants to Strengthen Youth Mental Health. Press Release. Retrieved from <https://www.hhs.gov/about/news/2021/08/27/samhsa-awards-74-2m-in-grants-to-strengthen-youth-mental-health.html>
152. National Academies of Sciences, Engineering, and Medicine. (2021). School-Based Strategies for Addressing the Mental Health and Well-Being of Youth in the Wake of COVID-19. Washington, DC: The National Academies Press. <https://doi.org/10.17226/26262>
153. American School Counselor Association. (2021). School Counselor Roles & Ratios. Accessed on November 23, 2021. Retrieved from <https://www.schoolcounselor.org/About-School-Counseling/School-Counselor-Roles-Ratios>
154. Department of Education, Office of Elementary & Secondary Education. (2021 March 17). American Rescue Plan Elementary and Secondary School Emergency Relief. Retrieved from <https://oese.ed.gov/offices/american-rescue-plan/american-rescue-plan-elementary-and-secondary-school-emergency-relief/>
155. U.S. Department of Education, Office of Special Education and Rehabilitative Services. (2021). Supporting Child and Student Social, Emotional, Behavioral, and Mental Health Needs. Washington, DC. Retrieved from <https://www2.ed.gov/documents/students/supporting-child-student-social-emotional-behavioral-mental-health.pdf>
156. Lever, N., Mathis, E., & Mayworm, A. (2017). School Mental Health Is Not Just for Students: Why Teacher and School Staff Wellness Matters. *Report on emotional & behavioral disorders in youth*, 17(1), 6–12.
157. Schubel, J. (2017 April 18). Medicaid Helps Schools Help Children. Center on Budget and Policy Priorities. Accessed on November 12, 2021. Retrieved from <https://www.cbpp.org/research/health/medicaid-helps-schools-help-children>
158. U.S. Department of Education. (2020 June 25). Disability Discrimination. Accessed on November 12, 2021. Retrieved from <https://www2.ed.gov/policy/rights/guid/ocr/disability.html>
159. Watson P. (2019). How to screen for ACEs in an efficient, sensitive, and effective manner. *Paediatrics & Child Health*, 24(1), 37–38. <https://doi.org/10.1093/pch/pxy146>
160. American Academy of Pediatrics. (2021 July 28). Interim Guidance on Supporting the Emotional and Behavioral Health Needs of Children, Adolescents, and Families During the COVID-19 Pandemic. Retrieved from <https://www.aap.org/en/pages/2019-novel-coronavirus-covid-19-infections/clinical-guidance/interim-guidance-on-supporting-the-emotional-and-behavioral-health-needs-of-children-adolescents-and-families-during-the-covid-19-pandemic/>
161. Juillard, C., Cooperman, L., Allen, I., Pirracchio, R., Henderson, T., Marquez, R., Orellana, J., Texada, M., & Dicker, R. A. (2016). A decade of hospital-based violence intervention: Benefits and shortcomings. *The journal of trauma and acute care surgery*, 81(6), 1156–1161. <https://doi.org/10.1097/TA.0000000000001261>
162. Bell, T. M., Gilyan, D., Moore, B. A., Martin, J., Ogbemudia, B., McLaughlin, B. E., Moore, R., Simons, C. J., & Zarzaur, B. L. (2018). Long-term evaluation of a hospital-based violence intervention program using a regional health information exchange. *The journal of trauma and acute care surgery*, 84(1), 175–182. <https://doi.org/10.1097/TA.0000000000001671>
163. The White House Briefing Room. (2021 April 7). FACT SHEET: More Details on the Biden-Harris Administration's Investments in Community Violence Interventions. Accessed on November 12, 2021. Retrieved from <https://www.whitehouse.gov/briefing-room/statements-releases/2021/04/07/fact-sheet-more-details-on-the-biden-harris-administrations-investments-in-community-violence-interventions/>
164. U.S. Department of Justice, Office for Victims of Crime. (2021 May 19). OVC FY 2021 VOCA Victim Assistance Formula Grant. Accessed on November 12, 2021. Retrieved from <https://ovc.ojp.gov/funding/opportunities/o-ovc-2021-19002>
165. NPR. (2021 June 11). How A Hospital And A School District Teamed Up To Help Kids In Emotional Crisis. Accessed on November 12, 2021. Retrieved from <https://www.npr.org/sections/health-shots/2021/05/26/1000400903/n-y-hospital-schools-aim-to-improve-kids-access-to-mental-health-provider>
166. Centers for Medicare & Medicaid Services. (2021 May 04). Integrated Care for Kids (InCK) Model. Accessed on November 12, 2021. Retrieved from <https://innovation.cms.gov/innovation-models/integrated-care-for-kids-model>
167. Walking The Talk. (nd). A toolkit for engaging youth in mental health: Create Youth-friendly spaces. Accessed on November 12, 2021. Retrieved from: <http://www.yetoolkit.ca/content/create-youth-friendly-spaces>

168. Impact of media use on children and youth. (2003). *Paediatrics & child health*, 8(5), 301–317. <https://doi.org/10.1093/pch/8.5.301>
169. McGinty, E. E., Webster, D. W., & Barry, C. L. (2013). Effects of news media messages about mass shootings on attitudes toward persons with serious mental illness and public support for gun control policies. *The American journal of psychiatry*, 170(5), 494–501. <https://doi.org/10.1176/appi.ajp.2013.13010014>
170. Klin, A., & Lemish, D. (2008). Mental disorders stigma in the media: review of studies on production, content, and influences. *Journal of health communication*, 13(5), 434–449. <https://doi.org/10.1080/10810730802198813>
171. Pfefferbaum, B., Nixon, S. J., Tucker, P. M., Tivis, R. D., Moore, V. L., Gurwitch, R. H., Pynoos, R. S., & Geis, H. K. (1999). Posttraumatic stress responses in bereaved children after the Oklahoma City bombing. *Journal of the American Academy of Child and Adolescent Psychiatry*, 38(11), 1372–1379. <https://doi.org/10.1097/00004583-199911000-00011>
172. Holman, E. A., Garfin, D. R., & Silver, R. C. (2014). Media's role in broadcasting acute stress following the Boston Marathon bombings. *Proceedings of the National Academy of Sciences of the United States of America*, 111(1), 93–98. <https://doi.org/10.1073/pnas.1316265110>
173. Johnston, W. M., & Davey, G. C. (1997). The psychological impact of negative TV news bulletins: the catastrophizing of personal worries. *British journal of psychology* (London, England : 1953), 88 (Pt 1), 85–91. <https://doi.org/10.1111/j.2044-8295.1997.tb02622.x>
174. Thompson, R. R., Jones, N. M., Holman, E. A., & Silver, R. C. (2019). Media exposure to mass violence events can fuel a cycle of distress. *Science advances*, 5(4), eaav3502. <https://doi.org/10.1126/sciadv.aav3502>
175. Stainback, K., Hearne, B.N., & Trieu, M.M. (2020). COVID-19 and the 24/7 News Cycle: Does COVID-19 News Exposure Affect Mental Health? *Socius: Sociological Research for a Dynamic World*; (6). <https://doi.org/10.1177/2378023120969339>
176. Su, Z., McDonnell, D., Wen, J., Kozak, M., Abbas, J., Šegalo, S., Li, X., Ahmad, J., Cheshmehzangi, A., Cai, Y., Yang, L., & Xiang, Y. T. (2021). Mental health consequences of COVID-19 media coverage: the need for effective crisis communication practices. *Globalization and health*, 17(1), 4. <https://doi.org/10.1186/s12992-020-00654-4>
177. Mental Health Media Guide. (nd). Step 5: Support Your Audience Before, During, and After Viewing. Accessed on November 12, 2021. Retrieved from <https://mentalhealthmediaguide.com/guide-front-page/tips-by-step/support-your-audience-before-during-after-viewing/>
178. Stanford University, Department of Psychiatry and Behavioral Sciences. (nd). Media & Mental Health Initiative (MMHI). Accessed on November 12, 2021. Retrieved from <https://med.stanford.edu/psychiatry/special-initiatives/mediamh.html>
179. Choe, J. Y., Teplin, L. A., & Abram, K. M. (2008). Perpetration of violence, violent victimization, and severe mental illness: balancing public health concerns. *Psychiatric services* (Washington, D.C.), 59(2), 153–164. <https://doi.org/10.1176/ps.2008.59.2.153>
180. Crocker, A. F., & Smith, S. N. (2019). Person-first language: are we practicing what we preach?. *Journal of multidisciplinary healthcare*, 12, 125–129. <https://doi.org/10.2147/JMDH.S140067>
181. Metzl, J. M., & MacLeish, K. T. (2015). Mental illness, mass shootings, and the politics of American firearms. *American journal of public health*, 105(2), 240–249. <https://doi.org/10.2105/AJPH.2014.302242>
182. National Action Alliance for Suicide Prevention. (2019). National Recommendations for Depicting Suicide. Accessed on November 12, 2021. Retrieved from <https://theactionalliance.org/resource/national-recommendations-depicting-suicide>
183. Nagata, J. M., Cortez, C. A., Cattle, C. J., Ganson, K. T., Iyer, P., Bibbins-Domingo, K., & Baker, F. C. (2021). Screen Time Use Among US Adolescents During the COVID-19 Pandemic: Findings From the Adolescent Brain Cognitive Development (ABCD) Study. *JAMA pediatrics*, 10.1001/jamapediatrics.2021.4334. Advance online publication. <https://doi.org/10.1001/jamapediatrics.2021.4334>
184. New Public. (2021 January 11). Building better digital public spaces, "Civic Signals: The qualities of flourishing digital spaces," Research Overview. Accessed on November 12, 2021. Retrieved from <https://newpublic.org/signals> and <https://docs.google.com/presentation/d/1lO4skPVekwciJGFYxxJBIBitFzzDS-C0zL1-AvhgfeNs/>
185. 5Rights Foundation. (2021). Pathways: How digital design puts children at risk. Accessed on November 12, 2021. Retrieved from <https://5rightsfoundation.com/uploads/Pathways-how-digital-design-puts-children-at-risk.pdf>
186. Council on Communications and Media. (2016). Media and Young Minds. *Pediatrics*, 138(5), e20162591. <https://doi.org/10.1542/peds.2016-2591>
187. Hill D. L. (2020). Social Media: Anticipatory Guidance. *Pediatrics in review*, 41(3), 112–119. <https://doi.org/10.1542/pir.2018-0236>
188. Haidt, J., & Twenge, J. (2021). Social media use and mental health: A review. Unpublished manuscript, New York University. <https://docs.google.com/document/d/1w-HOfseF2wF9YIpXwUUtP65-olnkPyWcgF5BiAtBEy0/edit>
189. Hagan, J. F., Shaw, J. S., & Duncan, M. P. (2017). *Bright Futures: Guidelines for Health Supervision of Infants, Children, and Adolescents*. 4th ed. Elk Grove Village, IL: American Academy of Pediatrics. https://brightfutures.aap.org/Bright%20Futures%20Documents/BF4_HealthySocialMedia.pdf
190. Chang, A. M., Aeschbach, D., Duffy, J. F., & Czeisler, C. A. (2015). Evening use of light-emitting eReaders negatively affects sleep, circadian timing, and next-morning alertness. *Proceedings of the National Academy of Sciences of the United States of America*, 112(4), 1232–1237. <https://doi.org/10.1073/pnas.1418490112>

191. Sumner, S. A., Ferguson, B., Bason, B., Dink, J., Yard, E., Hertz, M., Hilkert, B., Holland, K., Mercado-Crespo, M., Tang, S., & Jones, C. M. (2021). Association of Online Risk Factors With Subsequent Youth Suicide-Related Behaviors in the US. *JAMA network open*, 4(9), e2125860. <https://doi.org/10.1001/jamanetworkopen.2021.25860>
192. Swedo, E. A., Beauregard, J. L., de Fijter, S., Werhan, L., Norris, K., Montgomery, M. P., Rose, E. B., David-Ferdon, C., Massetti, G. M., Hillis, S. D., & Sumner, S. A. (2021). Associations Between Social Media and Suicidal Behaviors During a Youth Suicide Cluster in Ohio. *The Journal of adolescent health*, 68(2), 308–316. <https://doi.org/10.1016/j.jadohealth.2020.05.049>
193. McCrae, N., Gettings, S. & Purssell, E. (2017). Social Media and Depressive Symptoms in Childhood and Adolescence: A Systematic Review. *Adolescent Res Rev*, 2: 315–330. <https://doi.org/10.1007/s40894-017-0053-4>
194. Allcott, H., Braghieri, L., Eichmeyer, S., & Gentzkow, M. (2020). "The Welfare Effects of Social Media." *American Economic Review*, 110 (3): 629-76. <https://www.aeaweb.org/articles?id=10.1257/aer.20190658>
195. Ra, C. K., Cho, J., Stone, M. D., De La Cerda, J., Goldenson, N. I., Moroney, E., Tung, I., Lee, S. S., & Leventhal, A. M. (2018). Association of Digital Media Use With Subsequent Symptoms of Attention-Deficit/Hyperactivity Disorder Among Adolescents. *JAMA*, 320(3), 255–263. <https://doi.org/10.1001/jama.2018.8931>
196. American Psychiatric Association. (2018 June). Internet Gaming. Accessed on November 12, 2021. Retrieved from <https://www.psychiatry.org/patients-families/internet-gaming>
197. Przybylski, A. K., Weinstein, N., & Murayama, K. (2017). Internet Gaming Disorder: Investigating the Clinical Relevance of a New Phenomenon. *The American journal of psychiatry*, 174(3), 230–236. <https://doi.org/10.1176/appi.ajp.2016.16020224>
198. Orben, A., & Przybylski, A. K. (2019). The association between adolescent well-being and digital technology use. *Nature human behaviour*, 3(2), 173–182. <https://doi.org/10.1038/s41562-018-0506-1>
199. Coyne, S. M., Rogers, A. A., Zurcher, J. D., Stockdale, L., & Booth M. (2020). Does time spent using social media impact mental health?: An eight year longitudinal study. *Computers in Human Behavior*, 104. <https://doi.org/10.1016/j.chb.2019.106160>
200. Orben, A., Dienlin, T., & Przybylski, A. K. (2019). Social media's enduring effect on adolescent life satisfaction. *Proceedings of the National Academy of Sciences of the United States of America*, 116(21), 10226–10228. <https://doi.org/10.1073/pnas.1902058116>
201. George, M. J., Jensen, M. R., Russell, M. A., Gassman-Pines, A., Copeland, W. E., Hoyle, R. H., & Odgers, C. L. (2020). Young Adolescents' Digital Technology Use, Perceived Impairments, and Well-Being in a Representative Sample. *The Journal of pediatrics*, 219, 180–187. <https://doi.org/10.1016/j.jpeds.2019.12.002>
202. Odgers, C. L., & Jensen, M. R. (2020). Annual Research Review: Adolescent mental health in the digital age: facts, fears, and future directions. *Journal of child psychology and psychiatry, and allied disciplines*, 61(3), 336–348. <https://doi.org/10.1111/jcpp.13190>
203. Valkenburg, P. M., Meier, A., & Beyens, I. (2021). Social media use and its impact on adolescent mental health: An umbrella review of the evidence. *Current opinion in psychology*, 44, 58–68. Advance online publication. <https://doi.org/10.1016/j.copsyc.2021.08.017>
204. Beyens, I., Pouwels, J. L., van Driel, I. I., Keijsers, L., & Valkenburg, P. M. (2020). The effect of social media on well-being differs from adolescent to adolescent. *Scientific reports*, 10(1), 10763. <https://doi.org/10.1038/s41598-020-67727-7>
205. Verduyn, P., Lee, D. S., Park, J., Shablack, H., Orvell, A., Bayer, J., . . . Kross, E. (2015). Passive Facebook usage undermines affective well-being: Experimental and longitudinal evidence. *Journal of Experimental Psychology: General*, 144(2), 480–488. <http://dx.doi.org/10.1037/xge0000057>
206. Przybylski, A. K., & Weinstein, N. (2017). A large-scale test of the Goldilocks hypothesis: Quantifying the relations between digital-screen use and the mental well-being of adolescents. *Psychological Science*, 28(2), 204–215. <https://doi.org/10.1177/0956797616678438>
207. Hinduja, S. & Patchin, J. W. (2020). Bullying, Cyberbullying, and LGBTQ Students. *Cyberbullying Research Center*. Retrieved from <https://cyberbullying.org/bullying-cyberbullying-sexual-orientation-lgbtq.pdf>
208. Dickson, K., Richardson, M., Kwan, I., MacDowall, W., Burchett, H., Stansfield, C., Brunton, G., Sutcliffe, K., & Thomas, J. (2018). Screen-based activities and children and young people's mental health: A Systematic Map of Reviews, London: EPPI-Centre, Social Science Research Unit, UCL Institute of Education, University College London.
209. Parry, D. A., Fisher, J. T., Mieczkowski, H., Sewall, C. J. R., & Davidson, B. I. (2021). Social Media and Well-being: A Methodological Perspective. *PsyArXiv Preprints*. <https://doi.org/10.31234/osf.io/exhru>
210. Lenhart, A., & Owens, K. (2021). The Unseen Teen: The Challenges of Building Healthy Tech for Young People. Data & Society. Retrieved from: <https://datasociety.net/wp-content/uploads/2021/05/The-Unseen-Teen-.pdf>
211. Australian Government, eSafety Commissioner. (nd). Safety by Design. Accessed on November 12, 2021. Retrieved from <https://www.esafety.gov.au/about-us/safety-by-design/principles-and-background>
212. Meyer, M., Adkins, V., Yuan, N., Weeks, H. M., Chang, Y. J., & Radesky, J. (2019). Advertising in Young Children's Apps: A Content Analysis. *Journal of developmental and behavioral pediatrics: JDBP*, 40(1), 32–39. <https://doi.org/10.1097/DBP.0000000000000622>

- 213.** Fair Play Alliance. (nd). Fair Play Alliance. Accessed on November 12, 2021. Retrieved from <https://fairplayalliance.org/>
- 214.** Chen, C. A. (2021 September 21). Introducing Age Verification. Roblox. Accessed on November 12, 2021. Retrieved from <https://blog.roblox.com/2021/09/introducing-age-verification/>
- 215.** Elgersma, C. (2019 September 23). How to Use Apple's Screen Time Feature. Common Sense Media. Accessed on November 12, 2021. Retrieved from <https://www.commonsensemedia.org/blog/how-to-use-apples-screen-time-feature>
- 216.** Davies, R. (2020 December 10). Google to let YouTube users opt out of gambling and alcohol ads. The Guardian. Accessed on November 12, 2021. Retrieved from <https://www.theguardian.com/technology/2020/dec/10/google-to-allow-youtube-users-in-uk-to-opt-out-of-gambling-and-alcohol-ads>
- 217.** World Health Organization. (2021 October 4). WHO brings vital mental health messages to gamers via digital channels. Accessed on November 12, 2021. Retrieved from <https://www.who.int/news/item/04-10-2021-the-who-and-angry-birds-friends-team-up-for-world-mental-health-day>
- 218.** Makin S. (2019). The emerging world of digital therapeutics. *Nature*, 573(7775), S106–S109. <https://doi.org/10.1038/d41586-019-02873-1>
- 219.** Hackett, A., Hung, A., Leclerc, O., & Velamoor, S. (2020 March 31). The promise of digital therapeutics. *McKinsey & Company*. Accessed on November 23, 2021. Retrieved from <https://www.mckinsey.com/industries/life-sciences/our-insights/the-promise-of-digital-therapeutics>
- 220.** Centers for Disease Control and Prevention. (2019). Preventing Adverse Childhood Experiences: Leveraging the Best Available Evidence. Atlanta, GA: National Center for Injury Prevention and Control, Centers for Disease Control and Prevention. Retrieved from: <https://www.cdc.gov/violenceprevention/pdf/preventingACES.pdf>
- 221.** The Martinsburg Initiative. (2020). The Martinsburg Initiative: A Model Solution To A National Problem. Retrieved from: <https://themartinsburginitiative.com/>
- 222.** Centers for Disease Control and Prevention (2021). Drug-Free Communities Support Program. Accessed on October 7, 2021. Retrieved from: <https://www.cdc.gov/drugoverdose/drug-free-communities/about.html>
- 223.** U.S. Department of Health and Human Services (HHS) Office of the Surgeon General, & National Action Alliance for Suicide Prevention. (2021). The Surgeon General's Call to Action to Implement The National Strategy for Suicide Prevention. HHS. <https://www.hhs.gov/sites/default/files/sprc-call-to-action.pdf>
- 224.** Dopp, A. R., & Lantz, P. M. (2020). Moving Upstream to Improve Children's Mental Health Through Community and Policy Change. *Administration and policy in mental health*, 47(5), 779–787. <https://doi.org/10.1007/s10488-019-01001-5>
- 225.** Needels, K., Richman, S., Maxwell, N., & Anderson M.A. (2020). Scaling an Intervention: Recommendations and Resources, A Guide for Funders and Grantmakers. AmeriCorps and Mathematica. Retrieved from: https://americorps.gov/sites/default/files/document/AmeriCorps_ScalingRecsAndResources_ORE_9Apr2021.pdf
- 226.** Headstream. (nd). Building wellness through inclusive digital experiences. Accessed on November 12, 2021. Retrieved from <https://www.headstreaminnovation.com/>
- 227.** University of California Berkeley. (nd). The Fung Fellowship. Accessed on November 12, 2021. Retrieved from <https://fungfellows.berkeley.edu/about/our-story/>
- 228.** Goetzel, R. Z., Roemer, E. C., Holingue, C., Fallin, M. D., McCleary, K., Eaton, W., Agnew, J., Azocar, F., Ballard, D., Bartlett, J., Braga, M., Conway, H., Crighton, K. A., Frank, R., Jinnett, K., Keller-Greene, D., Rauch, S. M., Safeer, R., Saporito, D., Schill, A., ... Mattingly, C. R. (2018). Mental Health in the Workplace: A Call to Action Proceedings From the Mental Health in the Workplace-Public Health Summit. *Journal of occupational and environmental medicine*, 60(4), 322–330. <https://doi.org/10.1097/JOM.0000000000001271>
- 229.** Weissman, M. M., Wickramaratne, P., Nomura, Y., Warner, V., Pilowsky, D., & Verdelli, H. (2006). Offspring of depressed parents: 20 years later. *The American journal of psychiatry*, 163(6), 1001–1008. <https://doi.org/10.1176/ajp.2006.163.6.1001>
- 230.** Forry, N. D., & Hofferth, S. L. (2011). Maintaining Work: The Influence of Child Care Subsidies on Child Care-Related Work Disruptions. *Journal of family issues*, 32(3), 346–368. <https://doi.org/10.1177/0192513X10384467>
- 231.** Ray, T. K., & Pana-Cryan, R. (2021). Work Flexibility and Work-Related Well-Being. *International journal of environmental research and public health*, 18(6), 3254. <https://doi.org/10.3390/ijerph18063254>
- 232.** Centers for Disease Control and Prevention. (2021). Mental Health in the Workplace. Accessed on November 12, 2021. Retrieved from: <https://www.cdc.gov/workplacehealthpromotion/tools-resources/workplace-health/mental-health/index.html>
- 233.** The White House. (2021 June 11). FACT SHEET: Biden-Harris Administration Announces Child Tax Credit Awareness Day and Releases Guidance for Unprecedented American Rescue Plan Investments to Support Parents and Healthy Child Development. Accessed on November 12, 2021. Retrieved from <https://www.whitehouse.gov/briefing-room/statements-releases/2021/06/11/fact-sheet-biden-harris-administration-announces-child-tax-credit-awareness-day-and-releases-guidance-for-unprecedented-american-rescue-plan-investments-to-support-parents-and-healthy-child-dev/>
- 234.** Information Commissioner's Office. (nd). Introduction to the Age appropriate design code. Accessed on November 12, 2021. Retrieved from <https://ico.org.uk/for-organisations/guide-to-data-protection/ico-codes-of-practice/age-appropriate-design-code/>
- 235.** Lomas, N. (2021 September 1). UK now expects compliance with children's privacy design code. Tech Crunch. Accessed on November 12, 2021. Retrieved from <https://techcrunch.com/2021/09/01/uk-now-expects-compliance-with-its-child-privacy-design-code/>

- 236.** Australian Government, eSafety Commissioner. (nd). Safety by Design. Accessed on November 29, 2021. Retrieved from <https://www.esafety.gov.au/industry/safety-by-design>
- 237.** The White House. (2021 October 19). FACT SHEET: Improving Access and Care for Youth Mental Health and Substance Use Conditions. Retrieved from <https://www.whitehouse.gov/briefing-room/statements-releases/2021/10/19/fact-sheet-improving-access-and-care-for-youth-mental-health-and-substance-use-conditions/>
- 238.** U.S. Department of Health & Human Services. (2021 August 27). Biden-Harris Administration Invests \$10.7 Million in American Rescue Plan Funds to Expand Pediatric Mental Health Care Access. Press Release. Retrieved from <https://www.hhs.gov/about/news/2021/08/27/biden-harris-admin-invests-nearly-11-million-for-pediatric-mental-health-access.html>
- 239.** Massachusetts Child Psychiatry Access Program. Connecting Primary Care with Child Psychiatry. Accessed on November 12, 2021. Retrieved from <https://www.mcpap.com/>
- 240.** The White House. (2021 May 20). PRESS RELEASE. HHS Announces \$14.2 Million from American Rescue Plan to Expand Pediatric Mental Health Care Access. Accessed on November 29, 2021. Retrieved from <https://www.hhs.gov/about/news/2021/05/20/hhs-announces-142-million-american-rescue-plan-expand-pediatric-mental-health-care-access.html>
- 241.** Office of the California Surgeon General. (2021 October 8). PRESS RELEASE. New ACEs Equity Act Significantly Expands ACE Screening in California. Retrieved from <https://osg.ca.gov/wp-content/uploads/sites/266/2021/10/CA-OSG-News-Release-ACEs-Equity-Act.pdf>
- 242.** U.S. Department of Health and Human Services. (2021 August 27). SAMHSA Awards \$74.2M in Grants to Strengthen Youth Mental Health. Press Release. Retrieved from <https://www.hhs.gov/about/news/2021/08/27/samhsa-awards-74-2m-in-grants-to-strengthen-youth-mental-health.html>
- 243.** California Legislation Information. (2021). SB-224 Pupil instruction: mental health education (2021-2022). Retrieved from https://leginfo.ca.gov/faces/billNavClient.xhtml?bill_id=202120220SB224
- 244.** Tap Into Bordertown. (2021 October 2). New Law Creates Grant Program for Depression Screening in Schools. Accessed on November 23, 2021. Retrieved from <https://www.tapinto.net/towns/bordertown/sections/education/articles/new-law-creates-grant-program-for-depression-screening-in-schools>
- 245.** Centers for Disease Control and Prevention. (2021 February 22). Behavioral and Socioemotional Outcomes Through Age 5 of the Legacy for Children™ Public Health Approach to Improving Developmental Outcomes among Children Born into Poverty. Accessed on November 22, 2021. Retrieved from <https://www.cdc.gov/ncbddd/childdevelopment/features/legacy-for-children-keyfindings.html>
- 246.** Colorado Department of Human Services. (2021). I Matter - Providing Free Mental Health Support for Colorado Youth. Accessed on November 23, 2021. Retrieved from <https://cdhs.colorado.gov/i-matter-program>
- 247.** Brooks, T., Roygardner, L., Artiga, S., Pham, O., & Dolan, R. (2020 March 26). Medicaid and CHIP Eligibility, Enrollment, and Cost Sharing Policies as of January 2020: Findings from a 50-State Survey. *Kaiser Family Foundation*. Retrieved from <https://www.kff.org/report-section/medicaid-and-chip-eligibility-enrollment-and-cost-sharing-policies-as-of-january-2020-findings-from-a-50-state-survey-enrollment-and-renewal-processes/>
- 248.** Mental Health and Juvenile Justice Collaborative for Change: A Training, Technical Assistance and Education Center and a member of the Models for Change Resource Center Partnership. (nd). Better Solutions for Youth with Mental Health Needs in the Juvenile Justice System. Retrieved from https://ncyoj.policypresearchinc.org/img/resources/Better_Solutions_for_Youth_with_Mental_Health_Needs_in_the_Juvenile_Justice_System-501172.pdf
- 249.** Shufelt, J. L., Cocozza, J. J., & Skowrya, K. R. (2010). Successfully Collaborating With the Juvenile Justice System: Benefits, Challenges, and Key Strategies. Washington, DC: Technical Assistance Partnership for Child and Family Mental Health. https://www.air.org/sites/default/files/downloads/report/jjresource_collaboration.pdf
- 250.** Berger, L. M., & Font, S. A. (2015). The Role of the Family and Family-Centered Programs and Policies. *The Future of children*, 25(1), 155–176.
- 251.** Villagrana, M. (2021). Foster Care Alumni's Perceptions of Mental Health Services Received While in Foster Care. *Child Adolesc Soc Work J*. <https://doi.org/10.1007/s10560-021-00803-7>
- 252.** The White House. (2021 January 20). Executive Order On Advancing Racial Equity and Support for Underserved Communities Through the Federal Government. Retrieved from <https://www.whitehouse.gov/briefing-room/presidential-actions/2021/01/20/executive-order-advancing-racial-equity-and-support-for-underserved-communities-through-the-federal-government/>
- 253.** Williams, C., & Martinez, R. (2008). Increasing Access to CBT: Stepped Care and CBT Self-Help Models in Practice. *Behavioural and Cognitive Psychotherapy*, 36(6), 675–683. doi:10.1017/S1352465808004864
- 254.** Teplin, L. A., Abram, K. M., Washburn, J. J., Welty, L. J., Hershfield, J. A., & Dulcan, M. K. (2013 February). The Northwestern Juvenile Project: Overview. U.S. Department of Justice, Office of Justice Programs, Office of Juvenile Justice and Delinquency Prevention. Retrieved from <https://ojdp.ojp.gov/sites/g/files/xyckuh176/files/pubs/234522.pdf>

Figure 1 Sources

World Health Organization. (2014). *Health for the World's Adolescents: A second chance in the second decade*. WHO Press, World Health Organization. https://apps.who.int/adolescent/second-decade/files/1612_MNCAH_HWA_Executive_Summary.pdf

Bronfenbrenner, U., & Ceci, S. J. (1994). Nature-nurture reconceptualized in developmental perspective: A bioecological model. *Psychological Review*, 101(4), 568–586. doi:10.1037/0033-295X.101.4.568