The most recent version of the *Collection* is available at:
The *Collection* homepage

INTRODUCTION

Background of Child and Adolescent Mental Health
Epidemiology and Burden of Child and Adolescent Mental Health Problems
    Serious Emotional Disturbance
Providing Optimal Treatment
Identifying and Encouraging the Use of Evidence-based Treatments
    Benefits of Evidence-based Treatments
    Limitations of Evidence-based Treatments
Background of the Collection
    Using the Collection 6th Edition
Conclusion

Background of Child and Adolescent Mental Health

The recognition that children and adolescents suffer from mental health disorders is a relatively recent development. Throughout history, childhood was considered a happy period. It was believed that because children were spared the stressors that afflict adults, they did not suffer from true mental disorders (American Psychiatric Association [APA], 2002). It is now well-recognized that mental or emotional distress in youth may not just be a stage of childhood or adolescence, but can be evidence of a mental disorder caused by genetic, developmental, and physiological factors.

Although research conducted in the 1960s revealed that children do suffer from mental disorders (APA, 2002), it was not until 1980, when the third edition of the *Diagnostic and Statistical Manual of Mental Disorders* (*DSM-III*) was published by the APA, that child and adolescent mental disorders were assigned a separate and distinct section within the classification system (National Institute of Mental Health [NIMH], 2001). The development of treatments, services, and methods for preventing mental health disorders in children and adolescents has continued to evolve over the past several decades.

The National Alliance for the Mentally Ill (NAMI) defines mental illness as a disorder of the brain that may disrupt a person's thinking, feeling, moods, and ability to relate to others (2005). In 2013, the APA released the fifth edition of the *Diagnostic and Statistical Manual of Mental Disorders* (*DSM-5*). Significant changes were made to the criteria and categories of mental disorders and these changes are discussed in detail throughout this *Collection.* The definition of a mental disorder was also modified in the *DSM-5* as follows:

A mental disorder is a syndrome characterized by clinically significant disturbance in an individual's cognition, emotion regulation, or behavior that reflects a dysfunction in the psychological, biological, or developmental processes underlying mental functioning. Mental disorders are usually associated with significant distress in social, occupational, or other important activities. An expectable or culturally approved response to a common stressor or loss, such as the death of a loved one, is not a mental disorder. Socially deviant behavior (e.g., political, religious, or sexual) and conflicts that are primarily between the individual and society are not mental disorders unless the deviance or conflict results from a dysfunction in the individual, as described above (APA, 2013).

In early December 1999, U.S. Surgeon General David Satcher released the first ever Surgeon General's report on Mental Health. This report called attention to the seriousness of mental illness as an "urgent health concern" (U.S. Department of Health and Human Services, 1999). The report also discussed the needs of specific populations such as children and provided the first comprehensive, nationwide, longitudinal data on the development of children's mental health. This report noted that mental health disorders appear in families of all social classes and backgrounds. However, some children are at greater risk due to other factors. These factors include physical problems, intellectual disability, low birth weight, family history of mental and addictive disorders, multigenerational poverty, and caregiver separation or abuse and neglect (U.S. Department of Health and Human Services). Risk factors and causal influences for mental health disorders in youth vary, depending on the specific disorder.

Child and adolescent mental health has emerged as a distinct arena for service delivery. With the increased attention given to children's mental health and the development of systems of care for children with serious emotional disorders and their families, mental health has emerged as a new focus in the field of early childhood (Woodruff et al.). Family members, practitioners, and researchers have become increasingly aware that mental health services are an important and necessary support for youth who experience mental, emotional, or behavioral challenges and their families.

Epidemiology and Burden of Child and Adolescent Mental Health Problems

According to the New Freedom Commission on Mental Health established by President George W. Bush, childhood is a critical period for the onset of behavioral and emotional disorders (2003). Between 13 to 20 percent of children living in the United States experience a mental disorder in a given year (Centers for Disease Control and Prevention [CDC], 2013). Researchers supported by the National Institute of Mental Health (NIMH) found that half of all lifelong cases of mental health disorders begin by age 14 (Archives of General Psychiatry, as cited by the NIMH, 2005). Moreover, there are frequently long delays between the first onset of symptoms and the point at which people seek and receive treatment. This study also noted that a mental health disorder left untreated could lead to a more severe, more difficult-to-treat illness and to the development of co-occurring mental health disorders. In addition, nearly half of all individuals with one mental disorder met the criteria for two or more disorders (NIMH).

The National Comorbidity Survey Replication Adolescent Supplement (NCS-A) is a nationally representative face-to-face survey of 10,123 adolescents aged 13 to 18 years in the United States. Conducted between 2001 and 2004, the survey was designed to estimate the lifetime prevalence, age-of-onset distributions, course, and comorbidity of mental health disorders among children and adolescents. NCS-A found the overall prevalence of youth with mental health disorders with severe impairment and/or distress to be 22 percent (Merikangas et al., 2010). Study results revealed that anxiety disorders were the most common condition, followed by behavior disorders, mood disorders, and substance use disorders, with approximately 40 percent of those with one class of disorder also meeting criteria for another class of lifetime disorder (Merikangas et al.).

There has been little research to measure the financial burden of mental health disorders in children and adolescents. However, a team of researchers analyzed various data sources to locate information on the utilization and costs associated with mental health disorders in youth. They estimated that the cost of mental disorders among persons younger than 24 years of age in the United States was $247 billion annually (CDC, 2013). This includes costs associated with health care, special education, juvenile justice, and decreased productivity. Mental disorders were among the most costly conditions to treat in children (CDC). This analysis, along with other studies, pointed to two reasons why national health expenditures for child and adolescent mental disorders are difficult to estimate, including:

- Mental health services are delivered and paid for in the health, mental health, education, child welfare, and juvenile justice systems; and

- No comprehensive national datasets exist in this area (CDC; Sturm et al. 2001; Ringel & Sturm, 2001).

Child and adolescent preventive interventions have the potential to significantly reduce the economic burden of mental health disorders by reducing the need for mental health and related services. Furthermore, such interventions can improve school readiness, health status, and academic achievement and reduce the need for special education services (National Institute for Health Care Management, 2005). These interventions also translate into societal savings by lessening parents' dependence on welfare and increasing educational attainment and economic productivity (National Institute for Health Care Management).

Serious Emotional Disturbance

Serious emotional disturbance (SED) refers to a diagnosable mental health problem that severely disrupts a youth's ability to function socially, academically, and emotionally. While SED is defined by federal regulation, states may provide additional guidance to professionals (Substance Abuse and Mental Health Services Administration [SAMHSA], 2016). Virginia's Department of Behavioral Health and Developmental Services (VDBHDS) outlines the following as criteria for SED:

1. Problems in personality development and social functioning that have been exhibited over at least one year's time;
2. Problems that are significantly disabling, based on the social functioning of most children of the child's age;
3. Problems that have become more disabling over time; and
4. Service needs require significant intervention by more than one agency (VDBHDS, 2013).

Estimates of the number of children suffering from SED vary significantly depending on the study cited. One study attempting to collect SED prevalence rates found that variations in estimates for SED might be explained due to the varying objectives for collecting the data as well as the types of methodology used for selecting the study populations. A follow up literature review of this study effort found that national SED estimates range from five to 26 percent (Brauner & Stephens, 2006). According to prior research, about one out of every ten youths with a current mental disorder fulfill criteria for SED based on the Substance Abuse and Mental Health Services Administration (SAMHSA) definition (i.e., a mental health problem that has a drastic impact on a child's ability to function socially, academically, and emotionally) (Merikangas et al., 2010).

A recent study conducted by the Federal Interagency Forum on Child and Family Statistics (2015) found that the percentage of children with SED was about five percent in most years between 2001 and 2013 (2015). Among children with SED, 23 percent received special education services for an emotional or behavioral problem, 43 percent had a parent who had contacted a general doctor about the child's emotional or behavioral problem, and 55 percent had a parent who had contacted a mental health professional about the child (Federal Interagency Forum on Child and Family Statistics). In Virginia, it is estimated that between 117,592 and 143,724 children and adolescents have a SED, with between 65,329 and 91,461 exhibiting extreme impairment (VDBHDS, 2013).

Providing Optimal Treatment

The acknowledgment of mental health needs in youth has prompted further study on a variety of disorders and their causes, prevention, and treatments. Child and adolescent mental health represents a major federal public health priority, as reflected in the U.S. Surgeon General's *Report of the Surgeon General's Conference on Children's Mental Health: A National Action Agenda* (2000). The report outlines the following three steps that must be taken to improve services for children with mental health needs:

- Improving early recognition and appropriate identification of disorders within all systems serving children;
- Improving access to services by removing barriers faced by families; and
- Closing the gap between research and practice to ensure evidence-based treatments for children.

Without appropriate treatment, childhood mental health disorders can escalate. Untreated childhood mental health disorders may also be precursors of school failure, involvement in the juvenile justice system, and/or placement outside of the home. Other serious outcomes include destructive, ambiguous, or dangerous behaviors, in addition to mounting parental frustration. The resulting cost to society is high in both human and financial terms. Identifying a child's mental health disorder early and ensuring that the child receives appropriate care can break the cycle (New Freedom Commission on Mental Health, 2003).

Identifying and Encouraging the Use of Evidence-based Treatments

There have been more than two decades of research in treating child and adolescent mental health disorders. However, there are challenges to helping families and clinicians select the best treatments. The field of child and adolescent mental health is multi-disciplinary, with a diverse service system. Today, there are a multitude of theories about which treatments work best, making it is very difficult for service providers to make informed choices.

Scientific evidence can serve as a guide for families, clinicians, and other mental health decision-makers. Interventions that have strong empirical support are referred to as empirically validated treatments, empirically supported treatments, evidence-based treatments, or evidence-based practices. All of these terms attempt to capture the notion that the treatment or practice has been tested and that its effects have been demonstrated scientifically.

Benefits of Evidence-Based Treatments

Evidence-based medicine evolved out of the understanding that decisions about the care of individual patients should involve the conscientious and judicious use of current best evidence (Fonagy, 2000). Evidence-based treatments allow patients, clinicians, and families to see the differences between alternative treatment decisions and to ascertain what treatment approach best facilitates successful outcomes (Donald, 2002). Treatments that are evidence-based and research-driven complement a clinician's experience in practice. Evidence-based medicine has significantly aided clinicians in the decision-making process by providing a fair, scientifically rigorous method of evaluating treatment options.

Evidence-based medicine also helps professional bodies develop clearer and more concise working practices and establish treatment guidelines. The accumulated data for evidence-based treatments support their consideration as first-line treatment options (Nock, Goldman, Wang, & Albano, 2004). With literally hundreds of treatment approaches available for some disorders, it is difficult for clinicians to select the most appropriate and effective intervention (Nock et al.). The strongest argument in support of using evidence-based practices is that they enable clinicians to identify the best-evaluated methods of health care. Evidence-based treatments are recognized as an important component in behavioral health care by professional organizations, and increasingly, insurance companies and other payers are reluctant to pay for services without an evidence base (Society of Clinical Child & Adolescent Psychology, 2012).

Another driving force in the utilization of evidence-based medicine is the potential for cost savings (Fonagy, 2000). With rising awareness of mental health issues and a demand by consumers to obtain the best treatment for the best price, the emphasis on evidence-based practices is both practical and justified. Few people have time to conduct research in order to evaluate best practices. Evidence-based medicine provides a structured process for clinicians and patients to access information on what is effective.

Moreover, studies have shown that evidence-based practices work in a relatively short time span and lead to long-standing improvements.

Limitations of Evidence-Based Treatments

There are stakeholders in the field of children's mental health who have regarded the evidence-based treatment movement with skepticism. According to Michael Southam-Gerow, Assistant Professor of Clinical Psychology and Director, Graduate Studies at the Department of Psychology at Virginia Commonwealth University, there are several criticisms surrounding the utilization of evidence-based treatments (Personal Communication, December 15, 2009). These include the following:

- There is too much information, making it difficult for a service provider to choose a treatment among many that may be supported for a particular problem.
- There is too little information and there are distinct problem areas for which there is still very little known.
- The evidence is inadequate and it has been argued that there is insufficient supportive data to favor one treatment versus another. Furthermore, the long-term effects of many treatments are unknown. More studies are needed before treatments are categorized as being evidence-based.
- Because a treatment has not been tested does not mean it is not effective. Some commonly used treatments are not deemed to be evidence-based treatments because they have not been tested.

Additionally, evidence-based practices as currently developed and implemented may have inherent limitations that prevent their widespread delivery (Kazdin, 2011). Many of the evidence-based practices cannot reach individuals at the scale needed, particularly if they are provided on a one-to-one, in-person basis. There are challenges in extending evidence-based practices to patient care on a scale sufficient to have impact on the personal and social burdens of mental illness. As noted previously, many mental health disorders do not yet have an accompanying evidence-based practice. While there are limitations in the development and implementation of evidence-based practices, a number of these practices are effective across a range of disorders, suggesting some common mechanisms or core processes (U.S. Department of Health & Human Services, 2015).

Background of the *Collection*

The 2002 General Assembly, through Senate Joint Resolution 99, directed the Virginia Commission on Youth to coordinate the collection of treatments recognized as effective for children and adolescents, including juvenile offenders, with mental health disorders. The resulting publication, the *Collection of Evidence-based Practices for Children and Adolescents with Mental Health Treatment Needs (Collection)* was compiled by the Commission on Youth with the assistance of an advisory group of experts.

In 2003, the General Assembly passed Senate Joint Resolution 358, requiring the Commission to update the *Collection* biennially. The resolution also required the Commission to disseminate the *Collection* via web technologies. As specified in this resolution, the Commission received assistance disseminating the *Collection* from the Advisory Group and other impacted agencies. The *Collection* has been updated five times since 2002.

In 2013, the American Psychiatric Association made several significant changes to the categorization of disorders included in the *Diagnostic and Statistical Manual Fifth Edition (DSM-5)*. The Commission has made significant revisions to the *Collection 6th Edition* to incorporate these changes.

Using the *Collection 6th Edition*

With the limitations of evidence-based treatments in mind, the *Collection 6th Edition* has been updated to reflect the current state of the science. It has been developed and updated to provide information to

families, clinicians, administrators, policymakers and others seeking information about evidence-based practices for child and adolescent mental health disorders. The *Collection 6th Edition* has four categories that represent different levels of scientific support for a particular treatment. These levels are summarized in Table 1. Because research is ongoing, treatments are expected to move around among the categories with time.

The *Collection 6th Edition* also includes information on assessment instruments. This is to emphasize that all clinical decisions should be made in consultation with the data. Patient data should be collected to justify treatment plans, changes in treatment plans, and terminations. Clinicians and mental health treatment organizations are becoming both data-driven and data collectors, allowing for greater opportunities for outcome measures to be collected and reviewed during the course of treatment.

Table 1
Treatment Categories Used in *Collection 6th Edition*

Levels of Scientific Support	Description
What Works (Evidence-based Treatment)	Meets all of the following criteria: 1. Tested across two or more randomized controlled trials (RCTs); 2. At least two different investigators (i.e., researcher); 3. Use of a treatment manual in the case of psychological treatments; and 4. At least one study demonstrates that the treatment is superior to an active treatment or placebo (i.e., not just studies comparing the treatment to a waitlist).
What Seems to Work	Meets all but one of the criteria for "What Works" or Is commonly accepted as a valid practice supported by substantial evidence
What Does Not Work	Meets none of the criteria above but meets either of the following criteria: 1. Found to be inferior to another treatment in an RCT; and/or 2. Demonstrated to cause harm in a clinical study.
Not Adequately Tested	Meets none of the criteria for any of the above categories. It is possible that such treatments have demonstrated some effectiveness in non-RCT studies, but their potency compared to other treatments is unknown. It is also possible that these treatments were tested and tried with another treatment. These treatments may be helpful, but would not be currently recommended as a first-line treatment.

Conclusion

Effective mental health treatments that have undergone testing in both controlled research trials and real-world settings are available for a wide range of diagnosed mental health disorders. The *Collection 6th Edition* is designed to encourage use of these treatments by professionals providing mental health treatments. The *Collection 6th Edition* is also designed to provide parents, caregivers, and other stakeholders with general information about the various disorders and problems affecting youth.

Evidence-based treatments have been developed with the express purpose of improving the treatment of child and adolescent mental health disorders (Nock et al., 2004). Clinicians can incorporate these well-documented treatments while still adequately addressing the patient's individual differences (Nock et al.).

Resources and Organizations

American Academy of Family Physicians

https://www.aafp.org

American Association of Child & Adolescent Psychiatry (AACAP)

http://www.aacap.org/

American Psychiatric Association (APA)

http://www.psych.org

http://www.parentsmedguide.org

American Psychological Association (APA)

http://www.apa.org/

Familydoctor.org

https://familydoctor.org/

Medscape Today Resource Centers (from WebMD)

https://www.medscape.com/internalmedicine

National Alliance for the Mentally Ill (NAMI)

https://www.nami.org/

National Institute of Mental Health (NIMH)

http://www.nimh.nih.gov/index.shtml

National Registry of Evidence-based Programs and Practices

http://www.nrepp.samhsa.gov

National Technical Assistance Center for Children's Mental Health

https://gucchdtacenter.georgetown.edu/

Substance Abuse and Mental Health Services Administration (SAMHSA)

Caring for Every Child's Mental Health Campaign

https://www.samhsa.gov/children

U.S. Department of Education

Office of Special Education and Rehabilitative Services

https://www2.ed.gov/about/offices/list/osers/index.html?src=mr

U.S. Department of Health and Human Services

Centers for Disease Control and Prevention

https://www.cdc.gov/

U.S. National Library of Medicine and the National Institutes of Health

Medline Plus

https://medlineplus.gov/

Virginia Resources and Organizations

1 in 5 Kids Campaign

https://vakids.org/our-work/mental-health

Mental Health America of Virginia

https://mhav.org/

National Alliance for the Mentally Ill Virginia (NAMI Virginia)

https://namivirginia.org/

Virginia Department of Behavioral Health and Developmental Services (DBHDS)

http://www.dbhds.virginia.gov/

Virginia Office of Children's Services

http://www.csa.virginia.gov/

Voices for Virginia's Children

https://vakids.org/

References

American Psychiatric Association (APA). (2002). *Childhood disorders*. Retrieved from www.psych.org/public_info/childr~1.cfm. *Not available December 2017.*

American Psychiatric Association (APA). (2013). *Diagnostic and statistical manual of mental disorders* (5th ed.) (DSM-5). Washington, DC: Author.

Bayer, J. K., Ukoumunne, O. C., Lucas, N., Wake, M., Scalzo, K., & Nicholson, J. (2011). Risk factors for childhood mental health symptoms: National longitudinal study of Australian children. *Pediatrics, 128*(4), 865-879.

Brauner, C. B., & Stephens, C. B. (2006). Estimating the prevalence of early childhood serious emotional/behavioral disorders: Challenges and recommendations. *Public Health Reports, 121*(3), 303-310.

Centers for Disease Control and Prevention (CDC). (2013). Mental health surveillance among children—United States, 2005–2011. *Morbidity and Mortality Weekly Report, 62*(02), 1-35.

Centers for Disease Control (CDC). (2012). *Prevalence of autism spectrum disorders—Autism and developmental disabilities monitoring network, 14 sites, United States, 2008. Surveillance summaries.* Retrieved from https://www.cdc.gov/mmwr/preview/mmwrhtml/ss6103a1.htm?s_cid=ss6103a1_w

Donald, A. (2002). A practical guide to evidence-based medicine. *Medscape Psychiatry & Mental Health eJournal, 9*(2).

Federal Interagency Forum on Child and Family Statistics. (2015). *America's children: Key national indicators of well-being.* Washington, DC: U.S. Government Printing Office.

Fonagy, P. (2000). *Evidence based child mental health: The findings of a comprehensive review.* Paper presented to "Child mental health interventions: What works for whom?" Center for Child and Adolescent Psychiatry.

Kazdin, A. E. (2011). Evidence-based treatment research: advances, limitations, and next steps. *American Psychologist, 66*(8), 685-698.

Merikangas, K. R., He, J., Burstein, M., Swanson, S. A., Avenevoli, S., Cui, L., … Swendsen, J. (2010). Lifetime prevalence of mental disorders in U.S. adolescents: Results from the national comorbidity study-adolescent supplement (NCS-A). *Journal of the American Academy of Child and Adolescent Psychiatry, 49*(10), 980-989.

National Alliance for the Mentally Ill (NAMI). (2005). *About mental illness*. Retrieved from http://www.nami.org/Content/NavigationMenu/Inform_Yourself/About_Mental_Illness/About_Mental_Illness.htm. *Not available December 2017*.

National Institute for Health Care Management. (2005). *Children's mental health: An overview and key considerations for health system stakeholders.* Retrieved from https://www.nihcm.org/pdf/CMHReport-FINAL.pdf

National Institute of Mental Health (NIMH). (2005). *Mental illness exacts heavy toll, beginning in youth*. Retrieved from http://www.nih.gov/news/pr/jun2005/nimh-06.htm. *Not available December 2017.*

National Institute of Mental Health (NIMH). (2001). *Blueprint for change: Research on child and adolescent mental health.* Report of the National Advisory Mental Health Council's Workgroup on Child and Adolescent Mental Health Intervention.

New Freedom Commission on Mental Health. (2003). *Achieving the promise: Transforming mental health care in America.* DHHS Pub. No. SMA-03-3832. Rockville, MD.

Nock, M., Goldman, J., Wang, Y., & Albano, A. (2004). From science to practice: The flexible use of evidence-based treatments in clinical settings. *Journal of the American Academy of Child and Adolescent Psychiatry, 43*(6), 777-780.

Ringel, J., & Sturm, R. (2001). National estimates of mental health utilization and expenditures for children in 1998. *Journal of Behavioral Health Services and Research, 28*, 319-333.

Society of Clinical Child & Adolescent Psychology. (2012). What is evidence-based practice (EBP)? *Effective Child Therapy.* Retrieved from http://effectivechildtherapy.org/content/evidence-based-practice-0. *Not available December 2017.*

Sturm, R., Ringel, J., Bao, C., Stein, B., Kapur, K, Zhang, W., & Zeng, F. (2001). National estimates of mental health utilization and expenditures for children in 1998. In *Blueprint for change: Research on child and adolescent mental health*, Vol. VI, Appendices. Washington, DC: National Advisory Mental Health Council Workgroup on Child and Adolescent Mental Health Intervention, Development, and Deployment.

Substance Abuse and Mental Health Services Administration (SAMHSA). (2016). Mental and substance use disorders. Retrieved from https://www.samhsa.gov/disorders

U.S. Department of Health and Human Services. (2015). Evidence-based psychotherapies: Novel models of delivering treatment. Agency for Healthcare Research and Quality. Retrieved from https://www.ahrq.gov/professionals/education/curriculum-tools/population-health/kazdin.html

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. (2001). *Mental health: Culture, race, ethnicity–supplement to mental health: Report of the Surgeon General*. Rockville, MD: Author.

U.S. Public Health Service. (2000). *Report of the Surgeon General's Conference on Children's Mental Health: A national action agenda*. Washington, DC: Department of Health and Human Services.

Virginia Department of Behavioral Health and Developmental Services (VDBHDS). (2013). *Comprehensive state plan 2014 to 2020.* Retrieved from http://www.dbhds.virginia.gov/library/quality%20risk%20management/opd-stateplan2014thru2020.pdf

Woodruff, D., Osher, D., Hoffman, C., Gruner, A., King, M., & Snow, S. (1999). The role of education in a system of care: Effectively serving children with emotional or behavioral disorders. *Systems of care: Promising practices in children's mental health, 1998 series, volume III*. Washington, DC: Center for Effective Collaboration and Practice, American Institutes for Research.

DISCLOSURE STATEMENT

The information contained herein is strictly for informational and educational purposes only and is not designed to replace the advice and counsel of a physician, mental health provider, or other medical professional. If you require such advice or counsel, you should seek the services of a licensed mental health provider, physician, or other medical professional. The Commission on Youth is not rendering professional advice and makes no representations regarding the suitability of the information contained herein for any purpose.