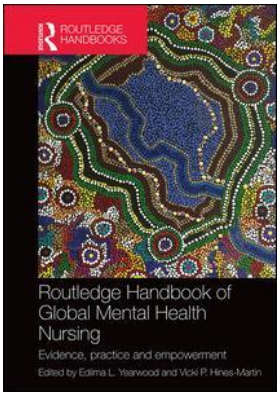

Routledge Handbook of Global Mental Health Nursing Evidence, practice and empowerment

Edilma L. Yearwood, Vicki P. Hines-Martin

Strategies For Mental Health Promotion in Children and Adolescents

Publication details
https://www.routledgehandbooks.com/doi/10.4324/9781315780344.ch18
Irene Eunhee Kim, Andrew Cashin, Edilma L. Yearwood
Published online on: 01 Sep 2016

18

STRATEGIES FOR MENTAL HEALTH PROMOTION IN CHILDREN AND ADOLESCENTS

Irene Eunhee Kim, Andrew Cashin and Edilma L. Yearwood

Introduction

Childhood mental health is defined by the World Health Organization (WHO) as "having a positive sense of identity, the ability to manage thoughts and emotions, as well as to build social relationships, and the aptitude to learn and to acquire an education, ultimately enabling full active participation in society" (WHO, 2013, p. 6). WHO (2012) also stated that

> young people with a good sense of mental well-being possess problem-solving skills, social competence and a sense of purpose, which helps them rebound from any setbacks that they encounter, thrive in the face of poor circumstances, avoid risk-taking behavior and continue a productive life.
>
> *(WHO, 2012, p. 6)*

Children and adolescents are challenged with serious obstacles to their mental health regardless of whether they live in developing or developed countries (Achenbach & Rescorla, 2007; Belfer, 2008). These obstacles include abandonment, neglect, child abuse, family instability, parent psychopathology, poverty, dislocation, exposure to traumatic events such as violence, disaster, and, in some parts of the world, child prostitution and child soldiering (Masten, 2014). Additionally, children constitute up to half of the population in many developing countries with basic needs for nutrition, water and sanitation taking precedence over child mental health concerns (Belfer & Nurcombe, 2007; Patel, Flisher, Nikapota, & Malhotra, 2008).

Epidemiological data consistently report the global prevalence of child and adolescent mental disorders to be approximately 20 percent (Kieling *et al.*, 2011; Klasen & Crombag, 2013; WHO, 2012) and suicide to be the second leading cause of death in the 15–19 years age category worldwide (Patton *et al.*, 2009; WHO, 2012). Mental health challenges and disorders can result when children's vulnerabilities and risk factors outweigh their resilience and protective factors. Child mental disorders can manifest themselves in many domains and in many different ways. It is now understood that mental disturbances at a young age can lead to ongoing impairment

in adult life (Belfer, 2008; Flament *et al.*, 2007; Kessler *et al.*, 2005; Merikangas, Nakamura, & Kessler, 2009) and up to 50 percent of adult mental disorders have their origin in childhood (Belfer, 2008). Thus, the lack of attention to the mental health of children and adolescents not only leads to mental disorders with lifelong consequences to the quality of life for individuals, but to a reduced capacity of societies to be safe and productive.

In 1989, the Convention on the Rights of the Child (CRC) was adopted by the United Nations General Assembly (United Nations Children's Fund (UNICEF), 2009; WHO, 2005a). CRC, the most universally endorsed and comprehensive human rights treaty of all time (WHO, 2005a), was a major and historic milestone in the effort to promote mental health and well-being in children around the world. It advocated for children having the right to survive and develop, and to be protected from violence, abuse and exploitation. The treaty also called for the views of children to be respected, and actions concerning them to be taken in their best interests (UNICEF, 2009). However, despite this effort to identify characteristics and environments that support healthy growth and development of children, the magnitude and impact of mental health problems were not properly recognized by many governments and policy makers in the world and continue to be unrecognized to this day, as many countries have chosen not to endorse the CRC.

Recently, the WHO has started playing a major role in raising public awareness of child mental health and facilitating the establishment of appropriate services (Belfer, 2008; Kieling *et al.*, 2011). In 2002, it convened an expert panel to deliberate the status of children with mental disorders, especially in developing countries, and issued its report, *Caring for Children and Adolescents with Mental Disorders: Setting WHO directions* (WHO, 2003) to establish a framework for understanding the overall scope of the problems associated with launching a system of care for the treatment of child mental disorders. In 2005, WHO also published *The Child and Adolescent Mental Health Atlas* (WHO, 2005a), which is one of the first systematic efforts to collect data on treatment resources available for children and adolescents with mental disorders worldwide. The WHO ATLAS project was complemented by another publication, *Child and Adolescent Mental Health Policies and Plans* (WHO, 2005b), in order to provide practical information and guidelines for developing mental health policies and strategies. These efforts demonstrated the WHO's recognition of the fundamental worldwide absence of mental health policy for children and its negative impact on healthy development. In these documents, nurses, as the largest group of health care providers, were being asked to serve as frontline providers in delivering services to children with mental disorders (WHO, 2011). While these documents provide us with epidemiological data on child disorders and policy recommendations, there is also a need for robust guidelines for child mental health promotion especially in low- and middle-income environments.

This chapter will describe risks, protective factors, and global issues impacting children's mental health. It will further explore common mental health challenges and disorders, mental health promotion strategies, prevention programs for this population and opportunities for nurses, as the largest health care providers globally, to meet the mental health needs of children, adolescents and their families.

(Throughout this chapter, the term "children" will include adolescents unless otherwise specified.)

Etiology of childhood psychiatric and behavioral syndromes

Before embarking upon a discussion of variance from "normal" development of behavior and cognition in the form of syndromes and disorders, and in the case of illness acute variance, it is always worthwhile to briefly review what we consider to be normal.

Although the unified theories of cognitive development (Piaget), identity (Erickson), and moral reasoning (Kohlberg) have been critiqued, they remain valuable in that they provide a base from which to articulate variance. It must be noted that heterogeneity of people is the rule rather than the exception within age groups, but also within countries and cultures (Smetana, Campione-Barr and Metzger, 2006). Varied ways of thinking about development have been presented through consideration of information processing (largely development of attention, memory, and use of images) and the socially mediated aspects represented in ecology, among others. Table 18.1 provides a quick overview of development as represented in the staged approach used by Piaget, Erickson, and Kohlberg. Piaget's work focused on the development of mental schemata and the assimilation of these into daily life (Piaget, 1952). Erickson focused on the development of identity (1952/1998) and Kohlberg on moral development in the context of shifting views from those traditionally held that moral education was the province of the family and church alone, which left little space to consider the role of school professionals and others in this endeavor (Kohlberg and Hersh, 1977).

Summary of developmental theorists

It is of note that adolescence is a time of upheaval and crisis that is in and of itself developmentally normal. Preceding the theorists featured in Table 18.1, Mitchell (1924) provided an apt description of the depth of normal teenage upheaval in the context of rapid physiological change and cognitive development:

> The adolescent youth is an unbalanced and lumbering creature. He finds it difficult to make his way around in a world littered with obstacles. He is constantly running into furniture. He is awkward in making delicate distinctions and in observing the nice decisions of society. His hands and feet are large. He finds the world an uncharted sea in which he is constantly making mistakes. Our customary attitude toward him is one of reproof and condemnation. We urge him to conform to set standards but the very nature of his mechanism at this time makes conformity impossible . . . The adolescent girl in her development parallels that of the youth. Her awkwardness may be not so marked and she seems to recover from it more quickly.
>
> *(Mitchell, 1924, pp. 51–53)*

The causes of most psychiatric disorders and behavioral challenges involve some combination of biological and psychosocial factors. Furthermore, child psychiatric symptoms are mitigated by the child's cognitive, social, emotional, and developmental stages and socio-cultural context. The extent and nature of the influence of the child's surroundings, such as family, peers, school, community, and cultural group, depend on the developmental stage and age of the child (Patel, Flisher, & Cohen, 2006; Paula, Duarte, & Bordin, 2007). Also, culture can create specific sources of distress and impairment in children, and influence how symptoms are interpreted (Kieling *et al.*, 2011).

The concept of risk and protective factors

Researchers explain the etiology of mental disorders in children in association with risk and protective factors. A risk factor is a variable associated with an increased risk of psychopathology whereas a protective factor is a variable that moderates the effects of risk exposure. Furthermore, risks can be either modifiable (can be influenced or altered) or non-modifiable (cannot be

Table 18.1 Comparison of child developmental theories

Piaget *4 stages of cognitive development*	*Erickson* *8 stages of identity formation*	*Kohlberg* *6 stages of moral development*
Sensorimotor 0–2 years Thinking with the bodily sensorimotor equipment	Trust vs. mistrust The first social achievement is letting mother out of sight Trust is developed in oneself and the capacity of the body An inner population of memories and anticipated sensations is developed that has correspondence with outer people and things	The punishment and obedience orientation Responds to rules and norms of good and bad, but based on consequences of punishment or reward at the individual level
Preoperational 2–7 years Schemata developed that are no longer attached to activity alone There is an increase in representational (symbolic) thinking	Autonomy vs. shame A stage of development of autonomy of free will be characterized by holding in and letting	The instrumental- relativist orientation Action is largely that which satisfies one's own needs Social relations are seen through a market type place lens of profiting from action
Concrete operational 7–11 years Thought is organized in a more logical fashion Thinking becomes more agil	Initiative vs. guilt Corresponds with ambulating and infantile genitality a time when a sense of making is added to the social armory Insight is gained into the role and functions of people and institutions How to participate is grasped	The interpersonal concordance of "good boy—nice girl" orientation Approval is sought through doing what is considered "nice"
Formal operational 11+ years The capacity is developed for abstraction applied in systematic and scientific thinking Hypothetico-deductive reasoning develops	Industry vs. inferiority Child learns to win praise and acceptance by sustained production of things The value of sustained attention and diligence is learnt	The law and order orientation A stage of doing duty informed by authority figures, rules and a principle of social order maintenance
	Identity vs. role diffusion This marks the end of childhood and the beginning of being a youth (adolescence) Marked by rapid physiological changes and a questioning of all the learning acquired from the earlier stages Concerned with how they appear to others and how to apply industry fruitfully	The social-contract legalistic orientation, generally with utilitarian overtures Focus is dominated by a legal point of view, but peppered with awareness that society may need to change this view based on utility and rational discussion
	Intimacy vs. isolation The ability to relate fully, both emotionally and sexually in relationships is developed A balance is negotiated between work, love, and recreation	The universal-ethical-principle orientation Right is seen as an individual judgment based on self-selected ethical principles This represents a shift from internalization of concrete rules
	Generativity v stagnation Interest in assisting and promoting the next generation is cultivated	
	Ego integrity vs. despair Acceptance is developed of the meaning of one's life	

Source: Erikson, 1952/1998; Kohlberg & Hersh, 1977; Piaget, 1952.

influenced or altered). Children are more vulnerable to developing psychiatric and behavioral symptoms when risk factors surpass protective factors. In the meantime, protective factors can act by promoting alternative, compensatory processes that enhance self-esteem and a sense of personal effectiveness (Nurcombe, 2007). The more opportunities children have to experience the positive effects of protective factors, the more likely they are to be able to sustain mental health later in life (WHO, 2012). In general, both risk factors and protective factors can be understood in the context of three domains—biological, psychological, and social. Table 18.2 provides a description of risk and protective factors for children's mental health.

Global risk factors

In addition to the aforementioned risk factors within low, middle-, and high-income communities, there are worldwide crises that can also impact child mental health. Many children may show resilience in response to these global phenomena especially with the appropriate scaffolding from adults and community resources. However, severe traumas will place vulnerable children at a significantly higher risk of experiencing mental health problems.

Displacement

According to the *UNHCR Statistical Yearbook 2012* (United Nations High Commissioner for Refugees (UNHCR), 2013), 45.2 million people were forcibly displaced worldwide as a result of war, political violence, and/or related threats as of the end of 2012. Disaggregated information on age showed that children under the age of 18 represented an average of 49 percent of the total population affected by these traumas (UNHCR, 2013). Displaced children may experience enormous trauma in the form of violence, crime, or other humiliations, disruption of family and loss of parents and relatives, physical and psychological injury, and economic dispossession, (Patel *et al.*, 2006; Reed, Fazel, Jones, Panter-Brick, & Stein, 2012). These occurrences may be characterized by multiple events happening in multiple contexts that persist over time. Refugee families often encounter resettlement stressors such as poverty and poor housing, as well as acculturative stressors and discrimination, which can pose increased risks for emotional and behavioral health in refugee children (Betancourt *et al.*, 2015; Reed *et al.*, 2012; Ziaian, de Anstiss, Antoniou, Baghurst, & Sawyer, 2013). The results of most studies show high prevalence estimates of psychological problems in refugee children, particularly with respect to anxiety, depression, and posttraumatic stress disorder (Belfer, 2008; Porter & Haslam, 2005; Reed *et al.*, 2012).

Disasters

Children are one of the most vulnerable groups for post-disaster psychological morbidity (Kar, 2009; Norris *et al.*, 2002). Disasters can be classified as either natural disasters or man-made disasters (Masten & Osofsky, 2010). Natural disasters refer to phenomena such as earthquakes, floods, hurricanes, tornados, or tsunamis that can kill thousands of people and destroy entire communities. Man-made disasters include fires, acts of mass violence such as war, genocide, terrorism, and mass shootings, as well as industrial accidents, transportation accidents, and disease outbreaks.

Following catastrophic disasters, post-traumatic reactions in directly affected children may reach epidemic proportions, remain high for a lengthy period, and ultimately endanger the well-being of all children residing in the affected region. A child's psychological reaction to a disaster

Table 18.2 Description of risk and protective factors for children's mental health

Domain	*Risk factors*	*Protective factors*
Biological factors	Genetic susceptibility for mental disorders Chromosomal abnormality Exposure to intrauterine toxins such as alcohol, illegal drugs, and tobacco Premature birth Perinatal trauma and low birth weight Environmental exposure to lead Malnutrition Traumatic brain injury HIV infection and other physical illnesses	Good intellectual functioning Age-appropriate physical development Good physical health
Psychological	Difficult temperament or behavioral inhibition Maladaptive personality traits Consequences associated with emotional, sexual, physical abuse or neglect Learning difficulties	Easy temperament style Good self-esteem Age-appropriate social skills High level of problem-solving ability Ability to learn from experience
Social		
Family factors	Disrupted attachment Poor parenting Marital discord Parent's psychopathology such as parental depression, substance abuse, and antisocial personality Single parent or blended families Poverty Death of family member	Secure attachments to parents Good support from at least one parent Cohesive family environment Opportunities for positive involvement in familial activities
School factors	Peer rejection, bullying and negative peer group influence Academic failure Inadequate educational provision or training opportunities	The quality of schools Peer networking Positive relationships with teachers Opportunities for involvement in school life with accompanying sense of belonging Positive academic achievement
Community factors	Poor access to or lack of resources Discrimination, marginalization, and stigma Exposure to violence Overcrowding	Adequate community resources for sports and skill building Positive cultural experiences Positive role modeling Rewards for community involvement A connection with community organizations including religious organizations

Source: Kieling *et al.*, 2011; Manikam, 2002. Adapted from Patel, Flisher, Hetrick, & McGorry, 2007.

depends upon degree of exposure, extent of loss of family members, trauma-related parental distress, previous exposure to stressful events, and proximity to traumatic events (Kar, 2009; Ying, Wu, Lin, & Chen, 2013). Common psychiatric manifestations among children include acute stress reaction, adjustment disorder, depression, panic disorder, post-traumatic stress disorder (PTSD) and other anxiety disorders (Belfer & Nurcombe, 2007; Kar, 2009; Weems *et al.*, 2007; Yule & Smith, 2008). The prevalence of PTSD varied from around 5 percent to over 43 percent (Kar, 2009) and man-made disasters tend to have a higher prevalence of PTSD than natural disasters (Kar, 2009; Kumar & Fonagy, 2013; Norris *et al.*, 2002).

Child trafficking: soldiering and sexual exploitation

Child trafficking fundamentally violates the right and dignity of all children and is one of the most alarming global issues threatening children today. The International Labor Organization (ILO) estimated that 5.5 million children aged 17 and below were victims of forced labor globally at any point in time during the period 2002–2011 (ILO, 2012). This estimate reflects most forms of human trafficking that children are subject to, including sexual exploitation and forced labor (ILO, 2012). The children, who are trafficked within their home countries or transported away from their homes, are treated as commodities to be bought, sold, and resold. These children are trapped in jobs into which they are coerced or deceived and which they cannot leave even though they have a right to be protected under the UN Convention on the Rights of the Child and their governments are obliged to safeguard them. Instead, these children are made to serve as domestic slaves, field or factory workers, unwitting organ donors, prostitutes, or even child soldiers (Conradi, 2013; Rafferty, 2013). Here, we will further explore two of the worst forms of forced child labor, child soldiering and child sexual exploitation.

Child soldiering

The brutal outcomes of war in some parts of world may be the creation of child soldiers at an age better suited for school. The United Nation's Children's Fund (UNICEF) (2007) has defined the child soldier as, "a child associated with an armed force or armed group" as

> any person below 18 years of age who is or who has been recruited or used by an armed force or armed group in any capacity, including but not limited to children, boys, and girls used as fighters, cooks, porters, messengers, spies, or for sexual purposes.
> *(UNICEF, 2007, p. 7)*

Children are introduced into armed organizations in a variety of ways such as kidnapping, force, and manipulation (Betancourt *et al.*, 2013a; Conradi, 2013; McMullen *et al.*, 2013), but no matter what inducements are offered, it is generally accepted that children cannot give voluntary consent to join such groups (Conradi, 2013).

It is estimated that about 300,000 children may be involved in armed forces activities in more than 87 countries at any given moment (Coalition to Stop the Use of Child Soldiers, 2008). These children, who are the victims of child trafficking, become perpetrators of violence once they are absorbed into the armed groups. They are forced to commit violent acts, and participate in mass atrocities (Coalition to Stop the Use of Child Soldiers, 2008). The very environment of violence and abuse results in serious health and mental health risks as well as social stigma upon return (McMullen *et al.*, 2013).

Findings of the systemic review for all articles related to former child soldiers by Betancourt *et al.* (2013b) concluded that abduction, age of conscription, exposure to violence, gender, and community stigma are associated with increased internalizing and externalizing mental health problems. On the other hand, family acceptance, social support, and educational/economic opportunities are associated with improved psychosocial adjustment in these child soldiers. Although there are variations in prevalence rates of mental health problems, most of the researchers have agreed that former child soldiers have a higher prevalence of PTSD, depression and suicidal ideation, (Belfer & Nurcombe, 2007; Ertl, Pfeiffer, Schauer-Kaiser, Elbert, & Neuner, 2014). Betancourt *et al.* (2013b) also reported a greater prevalence of anxiety disorder and conduct disorder among former child soldiers compared to a control group.

Child sexual exploitation

Child sexual exploitation is one of the most destructive forms of abuse, but is pervasive throughout the world in developing countries as well as industrialized nations such as North America and Europe. ILO (2012) estimated that about one million children are the victims of forced sexual exploitation worldwide at any point in time during the period 2002–2011; children therefore constituted 21 percent of 4.5 million total victims, both child and adult. Not surprisingly, girls and women represent 98 percent of those 4.5 million total victims (ILO, 2012). In addition, girls who are trafficked are especially likely to be forced into the sex trades such as prostitution and pornography (Rafferty, 2013). Barnitz (2001) points out that the average age of children brought into commercial sexual exploitation is estimated to be 13 or 14.

Children are entrapped in sexual exploitation in a variety of ways and remain vulnerable (ILO, 2009; Rafferty, 2013; Willis & Levy, 2002); homeless, runaway, or abandoned children are frequently pushed into prostitution and actively recruited by pimps and traffickers; girls are sometimes enticed or kidnapped and then forced into prostitution; poverty-stricken families sell their children in a desperate attempt to purchase food. Sexual exploitation disrupts normal life experiences and has a cascading effect on children's well-being, development, and health. The short- and long-term effects on children victimized by this traumatic experience are profound; the immediate risks include emotional, sexual, and physical abuses and even torture and murder (Barnitz, 2001; ILO, 2009; Rafferty, 2013; Willis & Levy, 2002); it will also put these children at greater risk of mental health issues such as post-traumatic stress disorder, depression and suicidal ideation, anxiety, aggressive behavior and substance abuse (Rafferty, 2013; Willis & Levy, 2002; Wondie, Zemene, Reschke, & Schroder, 2011); they are also vulnerable to sexually transmitted diseases, HIV infection, unwanted pregnancy, and reproductive illnesses (ILO, 2009; Mitchell, Finkelhor, & Wolak, 2010; Willis & Levy, 2002).

Impact of human immunodeficiency virus/acquired immunodeficiency syndrome (HIV/AIDS)

Millions of children worldwide live in communities heavily burdened with HIV/AIDS; children who are facing such disruption confront a number of serious risks, both direct and indirect, which threaten their overall development and health. They may acquire HIV infection transmission from their mothers during pregnancy or more commonly during delivery; they may become infected in adolescence or later by means of sexual transmission (Betancourt *et al.*, 2013a). In addition, children may suffer from the loss of family and friends who form the basis of their supportive environment.

In 2012, 2.1 million adolescents were living with HIV globally and approximately two-thirds of new HIV infections in adolescents aged 15–19 years were among girls (UNICEF, 2013). Betancourt *et al.* (2013a) expressed their concern that young women are at greater risk of contracting the virus through sexual activity as well as through sexual exploitation and abuse in many parts of the globe. Furthermore, about 230,000 children, 90 percent of whom live in 21 countries in sub-Saharan Africa and India, were newly infected with HIV in 2012 (UNICEF, 2013). Also, an estimated 17.8 million children throughout the world have lost one or both parents to HIV/AIDS in the same year (UNICEF, 2013).

The effects of living with HIV/AIDS, of having an affected parent or being orphaned by AIDS can increase the risk for mental illnesses in children. Children and adolescents with HIV/AIDS need not only to cope with fears of dying, but also to face unique illness-related stressors including stigma and discrimination, isolation, and complex disclosure issues (Murphy, Moscicki, Vermund & Muenz, 2000; Orban *et al.*, 2010), while trying to adjust to declining physical functioning. For young people in the HIV/AIDS affected families—either living with infected parents or having lost one or both parents—risks are numerous and include poverty, the pressure to drop out of school to care for sick parents or get a job to support the family, and the psychological burden associated with witnessing illness and coping with death (Belfer, 2008; Betancourt *et al.*, 2013a; Cluver, Orkin, Gardner, & Boyes, 2012; Hong 2010; Sturgeon & Orley, 2005). Many of these stressors are chronic and adversely impact children's lives on multiple levels. Children affected by HIV/AIDS are highly vulnerable to mental disorders and have shown a high prevalence for depression (Cluver *et al.*, 2012; Zhao *et al.*, 2009; Zhao, Zhao, Zhao, & Stanton, 2014), anxiety, and post-traumatic stress disorder (PTSD) (Cluver *et al.*, 2012). In conclusion, it is clear that the presence of HIV/AIDS in the family has far-reaching consequences that can seriously affect the mental health and well-being of children.

Resilience

Globally, tens of millions of children each year are exposed to terrifying phenomena such as disasters, political violence, displacement, child trafficking, pandemics, malnutrition, neglect, and abuse that threaten child development and well-being (Masten, 2014). In spite of such significant adversities or risks, there are some children who adapt successfully. These children are often called "resilient"(Garmezy, 1991; Rutter, 1987), "invulnerable" (Caffo & Belaise, 2007) and "stress-resistant" (Luthar & Zigler, 1991; Rutter, 1987). Rutter (2012) has defined "resilience" as "reduced vulnerability to environmental risk experiences, the overcoming of a stress or adversity, or a relatively good outcome despite risk experiences" (p. 336). In understanding the concept of "resilience," two pivotal conditions are necessary: exposure to significant threat or severe adversity and the achievement of positive adaptation despite major assaults on the developmental process (Luthar, Cicchetti, & Becker, 2000).

According to Kieling and colleagues (2011), resilience is related to the concept of protective factors, but it focuses more on a child's ability to regulate his/her own behavior and emotions to endure chronic stress or overcome trauma. Although early studies were mostly focused on personal qualities of "resilient children," such as self-esteem (Masten & Garmezy, 1985), and social competence (Luthar & Zigler, 1991), there has been a change of paradigm in resilience as research has progressed. It has been acknowledged that resilience may often stem from factors external to the child (Luthar *et al.*, 2000). Garmezy (1991) has emphasized that resilience is best understood in three domains: the child, the family, and the community. He has suggested that the presence of some caring adults such as grandparents, kindly concerned teachers, or the presence of an institutional structure, such as a caring agency or a church, could foster resilience

in children in the absence of responsive parents or in the presence of marked marital discord (Garmezy, 1991). Walsh (2003; 2007) has conceptualized the new notion of "family resilience," which has shifted attention from family as a protective factor for the child to family as the functional unit of resilience. The concept of "community resilience" has also been formulated by Landau (2007; 2010) based on her global experience in disaster recovery. She defined "community resilience" as "the community's inherent capacity, hope, and faith to withstand major trauma, overcome adversity, and to prevail, with increased resources, competence, and connectedness" (Landau, 2007, p. 352).

Many scholars who are concerned with the impact of extreme adversity on children have found that children can actually grow stronger through such adversity with the support of family and community (Masten, 2014; Masten & Narayan, 2012; Landau, 2010; Walsh, 2007). Rutter (2012) has also supported this finding with the introduction of two new concepts: the notion of "steeling effects," where engagement with stress serves to prepare the individual for better subsequent adaptation, and the notion of "turning point effects," where negative life experience or adversity eventually serve to give more opportunities to individuals in life.

Assessing children and adolescents

Childhood impairment can be defined as a deficiency in adaptive functioning for the child's developmental stage within his/her specific cultural context (Paula *et al.*, 2007). There has traditionally been a focus on disorders when discussing child and adolescent mental health. However, maintaining this focus only serves to foster stigma and a pathologizing approach rather than supporting a mental health promotion perspective. Thus, culture-specific tools are important to properly assess both resilience and impairment in children. Unfortunately, nomenclatures that describe mental disorders in this section are based on the two most frequently used diagnostic classifications of mental illnesses, the American Psychiatric Association's *Diagnostic and Statistical Manual of Mental Disorders* (DSM) and the World Health Organization's *International Classification of Diseases* (ICD). These classifications are grounded in Western conceptualizations (Schwab-Stone, Ruchkin, Vermeiren, & Leckman, 2001), which may fail to integrate meaningful cultural perspectives and context in classifying mental and behavioral disorders of children from other parts of the world and limit the understanding of mental disorders and challenges in these children (Belfer, 2008).

The following neuropsychiatric symptoms are identified as the most significant challenges in children across the world based on frequency of occurrence and degree of associated impairment. Merikangas, Nakamura, and Kessler (2009) have reported that about one-third of children experience a mental disorder over their lifetime. The most prevalent conditions in children are anxiety, followed by behavioral, mood, and substance use (Belfer, 2008; Merikangas *et al.*, 2009). In particular, adolescents with mental health problems demonstrate high rates of suicidal behaviors and of tobacco, alcohol, and other drug use (Centers for Disease Control and Prevention, 2013; Flament *et al.*, 2007). Nurses need to be knowledgeable about the diagnoses and clinical features associated with major childhood behavioral and mental disorders, as a necessary prerequisite for both needs assessment and the provision of good child mental health care.

Developmental challenges

Consistent with all the syndromes considered by child and adolescent psychiatric nurses, neurodevelopmental disorders have onset in a period characterized by intense development. However this particular subset of disorders affect the youngest of our population, and are

frequently recognized in early childhood (American Psychiatric Association, 2013). The context of social impairment is often seen in early play and relationships with family and peers and occupational function is seen in pre-school or early school performance. Developmental deficits can involve limitations of learning, of executive functioning, of intelligence or impairment of social skills (American Psychiatric Association, 2013) as well as limitations in physical functioning.

Diagnosis of behavioral disorders is a probabilistic statement (Szatmari, Archer, Fisman, Streiner, & Wilson, 1995). That is, a behavioral diagnosis as a professional construct is a descriptor of behaviors that fit most closely with those exhibited by the young person. Validated tools are often used to record observations and aid in answering how the intensity and frequency of observed behaviors, or performance, compares to population means. This is important information in terms of distinguishing when to make the determination that behavior is outside the range of that typically expected within the developmental and cultural context, and within the bounds of a diagnostic category. Clinician judgment is also required as many of the neurodevelopmental disorders impact an individual's ability to actively participate in the assessment process (American Psychiatric Association, 2013). Social impairment, impairments of attention, and physical impairment can all impact on testability. Further, the thinking and information style in some groups, such as impaired abstraction in autism (Cashin & Barker, 2009; Cashin, Gallagher, Newman, & Hughes, 2012) and other forms of intellectual disability (American Psychiatric Association, 2013) may impact on the person's ability to understand questions designed for a neurotypical population. Disorders that involve perception, such as some communication disorders may interfere with decoding messages or responding. In the subset of neurodevelopmental disorders there is a propensity for co-morbidity of physical or behavioral disorders (American Psychiatric Association, 2013).

As the neurodevelopmental disorders are diagnosed in early childhood there is also frequently a change of diagnosis as further development in the child allows for the emergence of a fuller understanding of the profile of psychiatric disability. One common example is when a child in preschool is observed to have problems with attention and focus and is diagnosed with attention deficit hyperactivity disorder (ADHD) and a trial of stimulant medications may be started. The child then enters school, and is observed to be defiant and to not follow directions, and a diagnosis of oppositional defiance disorder (ODD) is added. As part of refusing to follow directions it is observed that the child has high preference routines and activities, and later obsessive-compulsive disorder (OCD) may be added. Soon after a more complete picture emerges when difficulty interacting with peers is observed and a diagnosis of an autism spectrum disorder (ASD) is made. As a more thorough probabilistic statement is made and diagnosis refined, it is important to consider whether true comorbidity exists, or whether the new diagnosis better explains earlier understandings and requires removal of the earlier diagnoses.

Stretching the above example into adolescence further demonstrates the need to understand diagnosis as being within the context of a particular time and available data. Many of the disorders in the category of neurodevelopmental disorders, although often diagnosed in childhood are pervasive and lifelong (American Psychiatric Association, 2013). Nomenclature in the DSM refers to *disability* as opposed to *delay* to reflect this feature. Delay has the unfortunate implication that catch-up will occur. We are in many countries used to delayed public transport and familiar with the expectation that, although perhaps late, we will arrive at the destination. For some neurodevelopmental disorders, such as those of speech and communication this analogy may apply.

Many of the disorders in this category are characterized by deficits or excess in behaviors, and delay or failure to reach milestones of development (American Psychiatric Association, 2013).

The behavior, while the focus of intervention, often does not adequately inform the therapeutic approach. It is essential to understand the thinking and information processing style of those who are participating in treatment (Cashin, 2005, 2008; Cashin & Barker, 2009; Cashin, Browne, Bradbury, & Mulder, 2013). Autism, for example, is characterized by a specific cognitive processing style that makes modification of treatment essential (Rotheram-Fuller & MacMullen, 2011). Intellectual disability impacts upon volume of information that can be processed and speed of processing, and this must be taken into consideration when assessing or treating a child with a developmental delay.

Behavioral disorders

Table 18.3 provides a description of common behavioral disorders and their associates symptoms including attention-deficit/hyperactivity disorder (ADHD); oppositional defiant disorder (ODD); conduct disorder (CD); and substance use disorders (SUD).

Psychiatric disorders

Table 18.4 contains a description of common psychiatric disorders seen in children and adolescents with associated symptoms, etiology, global prevalence rates and recommended treatment.

Self-harm: non-suicidal self-injury and suicide in children and adolescents

Self-harm is one of the most serious global health problems for adolescents and young adults (de Kloet *et al.*, 2011; Muehlenkamp, Claes, Havertape, & Plener, 2012; Nock, 2012). WHO (2010b) defines self-harm as "a broader term referring to intentional self-inflicted poisoning or injury which may or may not have a fatal intention or outcome"(p. 73). Self-harm is generally divided into suicidal self-injury (SSI) and non-suicidal self-injury (NSSI) (Nock, 2012). SSI refers to suicide ideation, suicide plans, suicide attempts, and suicide death (Nock, 2012) while NSSI refers to the direct, deliberate destruction of one's own body tissue in the absence of any intent to die (Cloutier, Martin, Kennedy, Nixon, & Muehlenkamp, 2010; Favazza, 1998; Jacobson, Muehlenkamp, Miller, & Turner, 2008; Nock, 2012). Both NSSI and suicidal behavior disorder are included as conditions for further study in the DSM-5 (APA, 2013). Muehlenkamp and colleagues (2012) conducted a systematic review of current (2005–2011) empirical studies reporting on the prevalence of NSSI and self-harm in adolescent samples across the globe and found a mean lifetime prevalence of 18.0 percent for NSSI behavior and 16.1 percent for self-harm.

NSSI is also called self-mutilation, self-injurious behaviors, or para-suicidal behaviors. The term NSSI has been formulated to distinguish self-injurious behavior from suicidal attempts because they present as separate entities with differentiable motivations (see Table 18.5) (Cloutier *et al.*, 2010; Jacobson *et al.*, 2008; Muehlenkamp, 2005; Nock & Kessler, 2006). Nock and Kessler (2006) reported that the US prevalence of suicide attempts decreased from 4.6 percent to 2.7 percent after a reanalysis of data from the National Comorbidity Study when intent to die was required as prerequisite for a suicidal attempt. However, it is important to note that there are youngsters who engage in both SSI and NSSI behaviors (Andover, Morris, Wren, & Bruzzese, 2012; Cloutier *et al.*, 2010; Jacobson *et al.*, 2008; Nock, Joiner, Gordon, Lloyd-Richardson, & Prinstein, 2006). Moreover, NSSI is a risk factor for suicide attempts (Andover *et al.*, 2012; Nock, *et al.*, 2006; Plener, Libal, Keller, Fegert, & Muehlenkamp, 2009) and 70 percent of adolescents who self-injure have at least one suicide attempt (Nock *et al.*, 2006). Global suicide and self-harm behaviors in youth are addressed further in Chapter 12.

Table 18.3 Behavioral disorders

Disorder	*Characteristics*	*Etiology*	*Treatment*	*Global factors*
Attention deficit hyperactivity disorder (ADHD)	Inattention, impulsivity, hyperactivity, failure to pay close attention to details, difficulty organizing tasks and activities, excessive talking, fidgeting or inability to remain seated in appropriate situations (APA, 2013; WHO, 2010a) Symptoms present before age 12 and affect performance in social, academic and work settings (APA, 2013)	Genetics Neurobiological (Pliszka & AACAP Work Group on Quality Issues, 2007a) Environmental (APA, 2013, p. 62)	Pharmaco-therapy Adjunctive psychosocial intervention including parent training, classroom behavioral intervention and social skills training (Pliszka *et al.*, 2007a; Young & Amarasinghe, 2010)	For children aged 5–19 years, the global pooled prevalence of ADHD in 2010 was 2.2% and 0.7% for males and females, respectively (Erskine *et al.*, 2013)
Oppositional defiant disorder (ODD)	Negativistic, disobedient, hostile behavior toward authority figures; angry/irritable mood; argumentative/defiant; vindictiveness (APA, 2013; WHO, 2010a); onset between age 8-adolescent (Steiner, Remsing & AACAP Work Group on Quality Issues, 2007) Poor school performance despite normal intelligence; risk for low self-esteem and mood dysregulation (Steiner, Remsing, & AACP Work Group on Quality Issues, 2007; Gale, 2011) Disorder associated with substantial risk of secondary mood, anxiety, impulse-control, and substance use disorders (Nock, Kazdin, Hiripi, & Kessler, 2007)	Biological Psychological Social (Steiner *et al.*, 2007)	Individual problem-solving skills training Parent management training Adjunctive pharmaco-therapy (Steiner *et al.*, 2007)	The pooled prevalence of ODD was estimated as 3.3%, which was associated with significant heterogeneity (Canino, Polanczyk, Bauermeister, Rohde, & Frick, 2010)
Conduct disorder (CD)	The most severe type of behavioral disorder (Buitelaar *et al.*, 2013) Repetitive violation of the rights of others and violation of age-appropriate norms; bullying, threatening/intimidation of others; cruelty to animals, people; destruction of property; deliberate fire-setting; truancy; theft and violation of rules (APA, 2013)	Temperamental Environmental Genetic Physiological (APA, 2013)	Individual skill-building approaches Parent management training Adjunctive pharmaco-therapy (Buitelaar *et al.*, 2013; National Institute for Health and Care Excellence (NICE), 2013)	The pooled global prevalence of CD in 2010 for children aged 5–19 years was 3.6% (3.3–4.0) and 1.5% (1.4–1.7) for males and females, respectively (Erskine *et al.*, 2013)

Substance use disorder (SUD)	A maladaptive pattern of psychoactive substance use with clinically significant levels of impairment or distress Impairment including family conflict or dysfunction, interpersonal conflict, and academic failure, risk-taking behavior An increase in the likelihood of legal problems due to possession, and exposure to hazardous situations Substances are defined for alcohol, amphetamine (or amphetamine-like), caffeine, cannabis, cocaine, hallucinogens, inhalants, nicotine, opioids, phencyclidine and sedative, hypnotic, or anxiolytic agents (APA, 2013)	Genetic (Dick & Agrawal, 2008) Neurobiological (Clark, Chung, Thatcher, Pajtek, & Long, 2012) Environmental such as family and peer factors (Thatcher & Clark, 2008)	Family therapy CBT with motivational enhancement Non-substance using peer support Comprehensive services such as housing, academic assistance, and recreation (Bukstein & AACAP Work Group on Quality Issues, 2005)	The median estimate of alcohol or drug abuse or dependence in community surveys of adolescents is 5% with a range from 1% to 24% (Merikangas *et al.*, 2009)

Table 18.4 Psychiatric/mental disorders

Disorders	*Characteristics*	*Etiology*	*Treatment*	*Global factors*
Anxiety disorders Generalized anxiety disorder and social anxiety disorder are the two most prevalent types of anxiety disorders (Merikangas *et al.*, 2009)	**Generalized anxiety disorder** Excessive and irrational worries about competence, approval, appropriateness of past behavior, and the future The dominant symptoms—restlessness or feeling keyed up, being easily fatigued, trouble concentrating, irritability, muscle tension, and sleep disturbance (APA, 2013; WHO, 2010a) **Social anxiety disorder** A persistent fear of being embarrassed in social situations, in performance situations, or in one or more social settings (APA, 2013; WHO, 2010a)	Temperamental Environmental Genetics (APA, 2013) Neurobiological (Strawn, Wehry, DelBello, Rynn, & Strakowski, 2012).	Pharmaco-therapy, *CBT (Connolly, Bernstein & AACAP Work Group on Quality Issues, 2007; Khalid-Khan, Santibanez, McMicken & Rynn, 2007; Silverman, Pina, & Viswesvaran 2008; Strawn *et al.*, 2012)	he median prevalence rate of all anxiety disorders of children and adolescents was 8% (Merikangas *et al.*, 2009)
Mood disorders	**Depressive disorders** Depressed or irritable mood, loss of interest and pleasure, increased or decreased appetite or sleep, decreased activity, poor concentration, lack of energy, and exaggerated guilt May have self-injurious or suicidal ideation (APA, 2013; Birmaher, Brent, & AACAP Work Group on Quality Issues, 2007)	Temperamental (APA, 2013) Genetic Environmental factor (APA, 2013; Birmaher *et al.*, 2007)	CBT or IPT Pharmaco-therapy Supportive management Family involvement School involvement Psychoeducation (Birmaher *et al.*, 2007)	A worldwide prevalence rate of major depressive disorder in youth range from 0.6% to 3% (Merikangas *et al.*, 2009)

	Bipolar disorder Characterized by extreme episodic mood dysregulation accompanied by symptoms (e.g.,decreased need for sleep, hypersexuality, impulsivity) that significantly impair multiple domains of functioning Differentiated from adult-onset bipolar disorder by increased rates of rapid cycling, mixed mood states, psychiatric comorbidity, and developmentally-specific psychosocial impairment Higher chance of neurocognitive deficits, poor academic performance and disruptive school behavior (West *et al.*, 2014)	Genetic Environmental (APA, 2013; Birmaher *et al.*, 2007)	Pharmaco-therapy Psychotherapy Psychoeducation (AACAP, 2007; WHO, 2010b) Child- and family-focused cognitive-behavioral therapy (West *et al.*, 2014)	A meta-analysis of the existing international studies of pediatric bipolar disorders for young people ages 7 to 21 years reported an overall rate of 1.8% (Van Meter, Moreira, & Youngstrom, 2011)
Early-onset schizophrenia	Onset before 18 years of age Two or more psychotic symptoms such as hallucinations, delusions, disorganized speech, disorganized or catatonic behavior, and/or negative symptoms (APA, 2013; McClellan, Stock, & AACAP Committee on Quality Issues, 2013) Onset before 13 years of age appears to be quite rare. The rate of onset then increases during adolescence, with the peak ages of onset for the disorder ranging from 15 to 30 years (McClellan *et al.*, 2013)	Genetic Environmental (APA, 2013) Neuroanatomical abnormalities (McClellan *et al.*, 2013)	Antipsychotic medications combined with psychoeducational, psychotherapeutic, and educational interventions (McClellan *et al.*, 2013)	The worldwide prevalence of schizophrenia is generally held to be approximately 1%, but the prevalence of early-onset schizophrenia has not been adequately studied (McClellan *et al.*, 2013)

The incidence of suicide is rare before puberty, but becomes increasingly frequent through adolescence (Dervic, Brent, & Oquendo, 2008). In the 15–19- year-old age category, the second leading cause of death is suicide (Patton *et al.*, 2009; WHO, 2013). Mental disorders or behavioral challenges have been identified as a root cause in 90 percent of youth death by suicide (Bridge, Goldstein, & Brent, 2006; WHO, 2006), and the most common links with suicide attempts are major depressive disorder (MDD) (Jacobson *et al.*, 2008), anxiety disorder, PTSD, disruptive behavior disorders and substance use disorder (Chartrand, Sareen, Toews, & Bolton, 2012). Teens engaged in NSSI also show similar patterns of psychiatric disorders, including high rates of MDD, PTSD, oppositional defiant disorder, and substance use disorder (Nock *et al.*, 2006; Nock & Kessler, 2006). Additionally, NSSI is one of the hallmark symptoms of borderline personality disorder (BPD) in the DSM-5 (APA, 2013). However, NSSI and BPD can also occur independently (In-Albon, Ruf, & Schmid, 2013). Nock and colleagues (2006) confirmed that only about 50 percent of those who engage in NSSI suffer from BPD. Table 18.5 contains a comparison between non-suicidal self-injurious behaviors and suicidal self-injurious behaviors.

Taliaferro and Muehlenkamp (2014) analyzed the data from the 2010 Minnesota Student Survey to identify risk factors associated with suicidal ideation and suicide attempts among adolescents. The risk factors included childhood physical and sexual abuse, parental substance abuse, cultural taboo about same-sex sexual attraction or experience, weight dissatisfaction and maladaptive dieting behavior, alcohol and other drug use, depression, anxiety disorders, hopelessness, involvement in bullying, running away from home, dating violence, physical fighting, self-injury, physical or mental health problems, and chronic family dysfunction or violence (Taliaferro & Muehlenkamp, 2014). They also identified protective factors against suicidal ideation or behavior among youth: parent connectedness, school engagement, involvement in certain extracurricular activities particularly sports, academic achievement, close supportive friendships, and connections to non-parental adults (Taliaferro & Muehlenkamp, 2014).

Mental health promotion strategies and evidence-based prevention programs

Mental health promotion refers to actions undertaken to improve conditions and environments as a means of supporting individual competence, mental health and well-being. The focus is on identifying and fostering strengths and supporting community assets that can then serve as resources to further promote overall health (Kobau *et al.*, 2011), with less focus on illness and pathology. Mental health promotion strategies must address and work to correct the social determinant of health factors that impede mental health and overall well-being. Positive psychology focuses on empowerment strategies, positive attributes and ways in which individuals and communities can thrive. The WHO Global School Health Initiative developed in 1995 supports school environments that strengthen their capacity to develop healthy settings for living, learning and working. These schools focus on caring for self and others, healthy decision-making, strive to shape health related behaviors, develop and adhere to policies supporting equity, peace, social justice, and stability.

Mental Health: A Report of the Surgeon General (US Department of Health and Human Services, 1999) highlighted the importance of preventive intervention as a central activity for the improvement of children's mental health. Childhood is a critical time for preventing mental disorders since there is a high degree of continuity between child disorders and those in adulthood (Klasen & Crombag, 2013; McDougall, 2010). Thus, it is pivotal to intervene early in a child's life in order to prevent or reduce the likelihood of long-term impairment (McDougall, 2010; SAMHSA, 2007).

Table 18.5 Comparison between non-suicidal self-injury (NSSI) and suicidal self-injury (SSI)

Feature	*NSSI*	*SSI*
Intent	Affect regulation, self-punishment, interpersonal influence, sensation seeking, interpersonal boundaries, anti-dissociation, anti-suicide	To cease existence, eliminate life, to escape a painful situation
Lethality	Low, rarely requires medical attention	High, requires medical attention
Chronicity	Repetitive in nature, chronic (10–15 years)	Infrequent
Methods	Tendency to use multiple methods: skin cutting, severe scratching, self-biting, skin-picking, burning, head-banging, hitting, preventing wound healing, some forms of body piercing, branding or carving words or symbols into skin, object insertion	Often one chosen method: ingestion, vehicular exhaust, hanging/strangulation, gun use, running into traffic, cutting
Reactions	Elicits fear, disgust, hostility, revulsion	Elicits care, compassion, concern
Aftermath	Sense of relief, calm, satisfaction	No relief of distress
Demographics	Adolescents and young adults, equally males and females	Usually older men complete
Global prevalence	The mean lifetime prevalence of 18.0% (SD = 7.3) for NSSI	The mean proportion of adolescents reporting a lifetime suicidal attempt is 9.7% and suicidal ideation is 29.9%

Source: Bridge *et al.*, 2006; Cloutier *et al.*, 2010; Evans, Hawton, Rodham, & Deeks, 2005; Klonsky & Muehlenkamp, 2007; Muehlenkamp *et al.*, 2012; Wilkinson & Goodyer, 2011; Yearwood & Bosnic, 2012; Young, Sproeber, Groschwitz, Preiss, & Plener, 2014. Adapted from Muehlenkamp, 2005.

Mental health promotion strategies

As discussed in the previous section, exposure to risk factors and lack of protective factors will increase prevalence of mental health challenges. Preventive intervention in child mental health must be multifaceted, targeting both individual and community dynamics and structures that influence healthy psychological development in children. The goal would be to develop and support appropriate resources that would then promote capacity, foster resilience, and increase overall effectiveness of protective factors (Manikam, 2002; Nurcombe, 2007; Shea & Shern, 2011). Timely and effective interventions will reduce the burden of mental health disorders on children and their family, and also reduce the costs to health systems and communities (Catalano *et al.*, 2012; Hahlweg, Heinrichs, Kuschel, Bertram, & Naumann, 2010; SAMHSA, 2007).

Preventive health care interventions are generally classified as primary, secondary, and tertiary as proposed by the Commission on Chronic Illnesses (CCI) (1957). Primary prevention refers to interventions targeting the general population to prevent future health problems and involves education, while secondary prevention involves screening and prompt intervention for those who are beginning to show signs of difficulty by early identification and effective treatment (CCI, 1957). Tertiary prevention aims to reduce the severity of the impairment associated with an existing disorder, support rehabilitation success, prevent relapse, and achieve the highest level of functioning (CCI, 1957).

The Institute of Medicine (IOM) (1994) has recognized issues in applying this traditional classification to mental health and has redefined intervention phases into prevention, treatment, and maintenance. In order to describe the different service needs in the prevention phase, IOM has adapted the framework of Gordon (Gordon, 1987), which divides preventive intervention strategies as universal, selective, and indicated, based on the population groups to whom interventions are directed. Universal prevention targets the entire population of a particular area, whereas selective intervention targets specific groups or individuals whose risk of developing a mental disorder is significantly higher than average due to exposure to some risk factors (IOM, 1994). Indicated prevention involves targeting those individuals who exhibit subclinical symptoms of a disorder (IOM, 1994).

The IOM commissioned development of the framework is summarized in Figure 18.1.

Prevention phase (primary intervention)

Prevention strategies in this phase involve either universal prevention or selective prevention; both strategies target those individuals who are currently functioning normally in order to prevent future problems. Durlak, Weissberg, Dymnicki, Taylor, and Schellinger (2011) reviewed 213 school-based universal prevention programs and confirmed significant improvement in social and emotional skills, attitudes, behavior, and academic performance in children. Sometimes specific intervention strategies might be necessary to address children's needs depending on the nature of targeted mental health issues. The prevention interventions that focus on helping children build coping skills and social competence, and also reinforcing proper parenting skills might be most effective in children regardless of the circumstances (El Din, 2004; Masten & Monn, 2015).

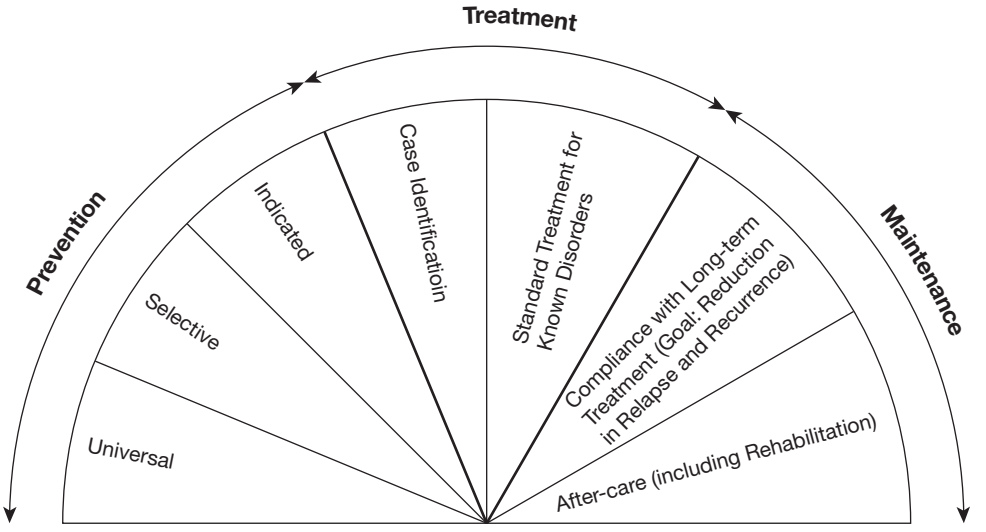

Figure 18.1 Reducing risks for mental disorders: frontiers for preventive intervention research, 1994

Source: Reprinted with permission by the National Academy of Sciences, Courtesy of the National Academies Press, Washington, DC.

Parenting skills

Parenting plays a crucial role in a wide variety of child social, emotional, behavioral, and intellectual outcomes (Landry, Smith, & Swank, 2006; Shapiro, Printz & Sanders, 2008). Researchers have reported that parental attachment contributes positively to self-esteem and life satisfaction and negatively to measures of depression, anxiety, and feelings of alienation (Grant *et al.*, 2006; Manikam, 2002). Dysfunctional parent–child interactions increase the risk of mental disorders, particularly when they are prolonged and accompanied by other adverse factors (Dodge, Coie, & Lynam, 2006). Conversely, enhanced parenting can even mitigate or buffer the adverse effects of environmental adversities on early childhood development (Domian, Baggett, Carta, Mitchell, & Larson, 2010; Leidy, Guerra, & Toro, 2010).

Therefore, it is crucial to teach parents optimal parenting skills in order to help build positive relationships with their children. Studies have shown that interventions targeted towards parenting have been efficacious in improving parental perceptions, children's social skills and school adjustment, and also produced reductions in behavioral problems (Barlow & Stewart-Brown, 2000; Cartwright-Hatton, McNicol, & Doubleday, 2006). Parenting training is also known to promote family coping, consistency, cohesion, and use of family support networks, each of which support the development of family resilience (Masten & Monn, 2015; Webster-Stratton, 2009).

Coping and social skills

Psychosocial stress is a significant and pervasive risk factor for psychopathology in childhood. But, in reality, children need to handle a wide range of challenging social situations every day. The ways in which children cope with stress are potentially important mediators and moderators of the impact of stress on current and future adjustment and psychopathology (Compas *et al.*, 2001). Also, a child's ability in social interaction with his/her environment may be the best way to predict the child's mental health (Compas, Connor-Smith, Saltzman, Thomsen, & Wadsworth, 2001; Grossman & Liang, 2008; Gumpel, 2007). Thus, preventive mental health interventions for children may be desirable to promote the coping and social skills of children (Durlak & Wells, 1997; Greenberg, Domitrovich & Bumbarger, 2001; Spence, 2003).

Treatment phase (secondary prevention)

This phase can be summarized as early identification and intervention. It involves *indicated* prevention, that is, prompt intervention for those who are just beginning to show signs of difficulty. First of all, target problems need to be identified for intervention. When children are screened and identified in a primary care or school setting, those with early disturbances should be referred to proper treatment (Durlak *et al.*, 2011). Then, the most effective evidence-based treatment modalities have to be selected in order to build resources and capacities in children and their families (Verhulst, 2004; WHO, 2005b). It is critical to evaluate outcomes of mental health services and effectiveness of the treatment by comparing the baseline measures at the time of assessment with measures upon completion of intervention (Verhulst, 2004).

Maintenance phase (tertiary prevention)

This phase focuses on relapse prevention. Children with mental disorders need proper support from family and school in order to prevent relapse or deterioration and also maintain optimal functioning (El Din, 2004). It is important for teachers and other school personnel to understand the nature of a child's problems and work together with mental health providers and family.

Global evidence-based preventive programs

"Evidence-based prevention" can be defined as

> the conscientious, explicit and judicious use of current best evidence to make decisions about interventions for individuals, communities and populations that facilitate the currently best possible outcomes in reducing the incidence of diseases and in enabling people to increase control over and to improve their health.
>
> *(Hosman & Jané-Llopis, 2005, as cited in WHO, 2004, p. 18)*

Additionally, Nation and colleagues (2003) have identified nine characteristics that are consistently associated with effective prevention programs: being comprehensive, using varied teaching methods, providing sufficient dosage, including theory-driven strategies, providing opportunities for positive relationships, being appropriately timed, incorporating relevant socio-cultural values and practices, integrating outcome evaluations, and involving well-trained and sensitive staff.

Most of the evidence-based mental health preventive interventions have been developed in high-income countries, such as the USA, Canada, Australia, and northern European countries (Klasen & Crombag, 2013; WHO, 2004). WHO (2004) has published *Prevention of Mental Disorders: Effective interventions and Policy Options* to facilitate the use of evidence-based interventions worldwide, especially for low-income countries where there is a lack of prevention knowledge in spite of enormous public mental health problems. WHO (2004) has also advised that service providers need to take into consideration cultural adaptation when they implement evidence-based programs from other countries or cultures in communities and target populations that differ from the ones that were originally developed and tested.

Klasen and Crombag (2013) have performed a systematic review of all randomized controlled trials in child and adolescent mental health in low- and middle-income countries, and have indicated that affordable and feasible interventions can be developed to improve the functioning of affected children, their families and their communities worldwide. In addition, they have found that parent training is a highly effective intervention in lessening conduct symptoms in behavioral disorders. Also, children who are exposed to war, disaster, and other traumatic experiences can be well treated in low resource settings even in unstable environments with proper interventions (Klasen & Crombag, 2013).

Fayyad and colleagues (2010) adopted the parenting skills intervention that was developed by the Integrated Services Taskforce of "the World Psychiatric Association Child Mental Health Presidential Programme" in order to check the feasibility of dissemination of the evidence-based intervention in a developing country. The program was delivered to 87 mothers of children with behavior problems in Lebanon by social and health workers with little or no mental health background who were trained for this program over four half-day sessions. This pilot project revealed that the intervention was effective in decreasing both the abnormal range of the children's behaviors from 54.4 percent to 19.7 percent, and mothers' use of severe corporal punishment from 40.2 percent to 6.1 percent.

Patel and colleagues (2007) have proposed "a population-based, youth focused model" to improve the range of affordable and feasible interventions to youth in both developing and developed countries. The model recommends integrating youth mental health programs into all existing youth programs, including general health, education, and welfare programs, since those programs are less stigmatized and more accessible to young people and can provide youth-friendly services under the same location (Patel *et al.*, 2007).

The following four preventive mental health programs are cited by WHO (2004) as global exemplary evidence-based prevention interventions. These are mostly a universal prevention or a selective prevention, which mental health nurses who work in community and school settings can utilize.

Incredible Years

The Incredible Years (IY) is one of the best-validated and well-established intervention programs for parents, teachers, and children that aims at treating and preventing conduct problems in children aged 0 to 12 years old (Presnall, Webster-Stratton, & Constantino, 2014; Webster-Stratton, & Herman, 2010; Webster-Stratton, Rinaldi, & Reid, 2011). Carolyn Webster-Stratton, a nurse practitioner, researcher and psychologist developed the intervention. The intervention is based on research conducted at the University of Washington Parenting Clinic in the United States in 1984 (Trotter & Rafferty, 2014; Webster-Stratton *et al.*, 2011). The program interventions have been implemented with positive results in over 24 countries including Germany, Ireland, Netherlands, New Zealand, Norway, Portugal, Republic of Korea, Russian Federation, Turkey, United States, and Wales (United Kingdom) (United Nations Office on Drugs and Crime, (UNODC), 2010). IY has been published in 10 languages, Chinese, Danish, Dutch, French, Norwegian, Portuguese, Russian, Spanish, Swedish, and Turkish (UNODC, 2010).

IY Training Series is a set of three separate, complementary, multifaceted, and developmentally based curricula for children, parents, and teachers, which can be used independently or together (Webster-Stratton, & Herman, 2010). IY is underpinned by social learning theory and comprises behaviorally based group training programs in order to promote positive interactions and reduce coercive interaction cycles between the child and the parent, and to improve the child's problem-solving behavior, social competence and emotional regulation (Webster-Stratton *et al.*, 2011; WHO, 2004). There are treatment versions of the parent and child programs as well as prevention versions for high-risk populations. The child and teacher programs span the age range of 3–8 years. The parenting programs span the age range of 0–12 years. IY uses videotape-modeling methods and includes modules for parents, school teachers, and children.

IY Series programs have been the subject of extensive empirical evaluation over the past three decades. All three programs have been widely endorsed by various review groups (Reinke, Stormont, Webster-Stratton, Newcomer, & Herman, 2012). IY parent and child interventions have proven efficacious in multiple randomized control studies for young children with primary diagnoses of ODD or CD, 40 to 50 percent of whom also had high levels of inattentive and hyperactive symptoms (Webster-Stratton, Reid, & Beauchaine, 2013). Also, in classrooms where teachers received the IY Classroom Management Training, children were observed to have higher school readiness scores, including engagement and on-task behavior and increased prosocial behaviors, as well as significantly reduced peer aggression in classrooms (Reinke *et al.*, 2012). IY has been selected as an exemplary best practice program for violence prevention by the US Office of Juvenile Justice and Delinquency Prevention (Center for the Study and Prevention of Violence, 2004; Webster-Stratton & Herman, 2010) and is also considered a "model program" by the World Health Organization (WHO, 2004).

Promoting alternative thinking strategies

The promoting alternative thinking strategies (PATHS) is a multi-year, universal and selective primary prevention program that was developed by Mark Greenberg and Carol Kusche in the United States in early 1990s (Kusche & Greenberg, 1994). Teachers, while simultaneously

enhancing the educational process in the classroom, use this comprehensive program for kindergarten through sixth grade. It is based on the ABCD (Affective–Behavioral–Cognitive–Dynamic) model, which places primary importance on the developmental integration of affect, behavior, and cognitive understanding (Kusche & Greenberg, 1994). The PATHS has been selected as an exemplary Blueprint model program by the US Office of Juvenile Justice and Delinquency Prevention (Center for the Study and Prevention of Violence, 2004) and is also considered a "model program" by the World Health Organization (2004). The PATHS program has been implemented in many countries such as the United States, Belgium, United Kingdom, Norway, Canada, Australia, and Israel (Flament *et al.*, 2007).

The PATHS curriculum provides teachers with systematic, developmentally based lessons, materials, and instructions to enhance children's social competence and reduce aggression and acting-out behavior in the classroom (Kusche & Greenberg, 1994). The PATHS materials consist of a manual and six volumes of lessons, which are divided into three major units, each containing developmentally sequenced lessons to integrate and build on previous learning. There is also a supplementary unit that contains 30 lessons, which reviews and extends concepts covered. Each unit contains aspects of five themes: self-control, emotional understanding, interpersonal problem-solving skills, positive self-esteem, and improved peer communication/relationships. Each volume includes teacher scripts, pictures, photographs, activity sheets, posters, home activities, and parent letters and information. It is recommended to initiate the program at the entrance to schooling and continue through Grade 5 and be taught three times per week for a minimum of 20–30 minutes per day. Although primarily focused on school and classroom settings, information and activities are also included for home use by parents.

The PATHS program has demonstrated efficacy in developing greater emotional knowledge and social competence and less social withdrawal among children receiving the program than children who did not participate (Crean & Johnson, 2013; Domitrovich, Cortes, & Greenberg, 2007; Greenberg, Kusche, Cook, & Quamma, 1995). The PATHS program has shown a 32 percent reduction in teachers' reports of students exhibiting aggressive behavior; a 36 percent increase in teachers' reports of students exhibiting self-control; and a 20 percent increase in students' scores on cognitive skills tests in various studies that used a control group (SAMHSA 2007). A recent study evaluated PATHS embedded within the Fast Track prevention model using a sample of almost 3,000 children who were randomly selected to begin the program in first grade and were followed for 3 years. The authors found positive effects for reduced aggression, increased prosocial behavior, and increased academic engagement for those children who received the program. Program effects were particularly robust for children in disadvantaged schools and for those who initially showed higher rates of aggression (Conduct Problems Prevention Research Group, 2010). Similar results were found using the PATHS curriculum with a sample of elementary students in the United Kingdom and Turkey, in which participant children were rated as showing improvement in emotional vocabulary, recognizing feelings in self and others, cooperation, empathy, and self-control (Arda & Ocak, 2011; Curtis & Norgate, 2007; Kelly, Longbottom, Potts, & Williamson, 2004).

Triple P-positive parenting program

Triple P (TP), which designates a ''positive parenting program,'' is a comprehensive multilevel system of parenting intervention that was designed to prevent behavioral, emotional and developmental problems in children from birth to age 16 (Hahlweg *et al.*, 2010; UNODC, 2010; Sanders, Kirby, Tellegen, & Day, 2014). The program was developed by Sanders and colleagues at the Parenting and Family Support Center of the School of Psychology at the

University of Queensland, Australia (Sanders, 2008; Sanders, Markie-Dadds, & Turner, 2003). The program began on a small scale as a home-based, individually administered training program for parents of disruptive preschool children (Sanders & Glynn, 1981), but, over the past 30 years, has evolved into a comprehensive evidence-based public health model of intervention (Sanders, 2008). The ultimate goal of TP is to enhance the knowledge, skills, and confidence of parents at a whole-of-population level and, in turn, to reduce the prevalence rates of behavioral and emotional problems in children and adolescents (Sanders, 2008).

TP emphasizes the centrality of parent–child interactions to promote family protective factors and reduce risk factors by using social learning models (de Graaf, Speetjens, Smit, de Wolff, & Tavecchio, 2008). It gives parents simple and practical strategies to confidently manage their children's behavior, develop effective, non-violent strategies, provide a safe, nurturing environment, and build positive, caring family relationships, which enhance children's healthy development and prevent problems from developing.

The program involves five levels of intervention on a tiered continuum in order to meet the differing needs of parents within a comprehensive system of parenting support (de Graaf *et al.*, 2008; Sanders *et al.*, 2014). The five levels of intervention incorporate programs that vary according to intensity, contact with practitioners, and delivery format: Level 1 is a form of universal prevention that delivers psychoeducational information on parenting skills to interested parents and is a media and communication strategy, including television, radio, online, and print, on positive parenting; Level 2 is a brief intervention consisting of 1 or 3 sessions for parents of children with mild behavioral problems using telephone or face-to-face contacts or group seminars; Level 3 consists of narrow-focused interventions including 3 to 4 individual face-to-face or telephone sessions, or a series of 2-hour group discussion sessions that target children with mild to moderate behavioral difficulties and includes active skills training for parents; Level 4 includes 8–10 sessions delivered through individual, group or self-directed (online or workbook) formats that target individual parents of children at risk; and Level 5 includes enhanced interventions using adjunct individual or group sessions for families where parenting difficulties are complicated by other sources of family distress (de Graaf *et al.*, 2008; Sanders *et al.*, 2014).

TP has been recognized as an effective example of the parenting program by WHO (2004), and is number one on the United Nations' ranking of parenting programs, based on ample research-based evidence indicating the effectiveness based on 4 meta-analyses of Triple-P studies, 10 independent randomized control trials, 47 randomized control trials, 28 quasi-experimental studies and 11 studies containing pre- and post-intervention evaluation (UNODC, 2010). In addition, TP has been implemented successfully in 25 countries including Australia, Belgium, Canada, China, the Netherlands Antilles (Curaçao), Germany, Iran (Islamic Republic of), Ireland, Japan, New Zealand, Netherlands, Singapore, Sweden, Switzerland, United Kingdom, and United States (UNODC, 2010). The program is also published in 10 languages: Chinese (Mandarin/-Cantonese), Dutch, English, Flemish, French, German, Japanese, Papiamento (the Netherlands Antilles), and Spanish (UNODC, 2010).

The Olweus bullying prevention program

One of the most well-known and widely implemented anti-bullying programs is "the Olweus Bullying Prevention Program (OBPP)" that was developed by Dan Olweus in Norway (El Din, 2004; Limber, 2011; Stephens, 2011; Ttofi & Farrington, 2009). The OBPP is a multilevel, multicomponent school-based program designed to prevent or reduce bullying and related victimization, and achieve better peer relations among elementary, middle, and junior high school students aged 6 to 15 (Olweus & Limber, 2010; Limber, 2011). It was started as a nationwide

campaign in Norway after three adolescent boys in northern Norway committed suicide as the result of severe bullying and victimization in 1983 (Olweus & Limber, 2010; Limber, 2011).

The OBPP has been implemented in six large-scale evaluations involving more than 40,000 students in Norway, which have yielded average reductions by 20 percent to 70 percent in students' report of bullying and victimization, as well as reductions in antisocial behaviors such as vandalism and truancy (Olweus & Limber, 2010; Limber, 2011). Ttofi & Farrington (2009) have performed a most comprehensive systemic review and meta-analysis of the effectiveness of anti-bullying programs and have concluded that the programs inspired by the work of Dan Olweus worked best and the OBPP should be the basis of future anti-bullying initiatives. It has been replicated internationally with positive results in the United States, Canada, Japan, Australia, and many European countries, including United Kingdom, Germany, and Belgium (Limber, 2011; Olweus & Limber, 2010; Stephens, 2011; Ttofi & Farrington, 2009). This program is considered a "model program" by the World Health Organization (2004).

The OBPP attempts to restructure the existing school environment to minimize opportunities and rewards for bullying and to increase awareness and knowledge of teachers, parents, and students about bullying (Olweus & Limber, 2010). The intervention consists of workshops for teachers and parents, and booklets, videos, and social skills and problem-solving training for students (Olweus & Limber, 2010). School staff members are primarily responsible for introducing four key principles: (a) show warmth and positive interest in their students; (b) set firm limits to unacceptable behavior; (c) use consistent nonphysical, non-hostile negative consequences when rules are broken; and (d) function as authorities and positive role models (Olweus & Limber, 2010). These principles have been incorporated into specific interventions at four levels: the school, the classroom, the individual, and, in some contexts, the community

Table 18.6 Components of the OBPP

School-level	• Establish a bullying prevention coordinating committee (BPCC) • Conduct trainings for the BPCC and all staff • Administer the Olweus Bullying Questionnaire (Grades 3–12) • Hold staff discussion group meetings • Introduce the school rules against bullying • Review and refine the school's supervisory system • Hold a school-wide kick-off event to launch the program • Involve parents
Classroom-level	• Post and enforce school-wide rules against bullying • Hold regular (weekly) class meetings to discuss bullying and related topics • Hold class-level meetings with students' parents
Individual-level	• Supervise students' activities • Ensure that all staff intervene on-the-spot when bullying is observed • Meet with students involved in bullying (separately for those who are bullied and who bully) • Meet with parents of involved students • Develop individual intervention plans for involved students, as needed
Community-level	• Involve community members on the BPCC • Develop school–community partnerships to support the school's program • Help to spread anti-bullying messages and principles of best practice in the community

Source: Reprinted from Olweus & Limber (2010).

(Olweus & Limber, 2010; Limber, 2011). Table 18.6 provides a summary of the components of the OBPP at each of these four levels.

Low educational attainment and evidence-based interventions

Low educational attainment is a worldwide problem, especially in developing countries. *The Millennium Developmental Goals Report 2013* (United Nations (UN), 2013) has set one of its major global goals as achieving universal primary education in order to enhance proper education and prevent poor academic performance in children. This report indicates that 57 million children globally are still denied their right to primary education and more than half of these children live in sub-Saharan Africa. It further reports that 123 million youths aged 15 to 24 lack basic reading and writing skills and 61 percent of them are young women (UN, 2013). Moreover, in lower-income countries, only 37 percent of adolescents complete lower secondary education and the rate is as low as 14 percent for the poorest (UNESCO, 2014). Even high-income countries that provide free or mandatory secondary education still have problems. In Europe, about 14 percent of all 18- to 24-year-olds either complete a low level of education or end their education without a certificate, which are of little use in the labor market (Theunissen, Griensven, van Verdonk, Feron, & Bosma, 2012). A 2009 survey showed that 8 percent of 16- to 24-year-olds in the US did not have a high school degree and were not enrolled in school (Aud *et al.*, 2011).

Low educational attainment is described as children who do not enroll, do not progress, or drop out (Petrosino, Morgan, Fronius, Tanner-Smith, & Boruch, 2015), and poverty is known to be a key factor of this phenomena (UN, 2013). Children from the poorest households are at least three times more likely to be out of school than children from the richest households in developing countries (UN, 2013). It is common for children to work to earn money to support their family or to stay home to take care of younger siblings. In some cultures, girls are not encouraged to pursue education and are expected to help out at home. Additionally, the cost of schooling, poor school infrastructure, teacher shortages, and safety and sanitation problems are some other factors that impede children's education in developing countries (Birdsall, Levine & Ibrahim, 2005). Meanwhile, variables associated with low educational attainment in developed countries include poor or single-parent households, minority status, poor academic performance, school disengagement, dissatisfaction with teachers, peer rejection, chaotic school environment, alcohol and substance abuse, adolescent pregnancy, mental illnesses, low parental expectation, and family disruption (El Din, 2004; Fan & Wolters, 2014; Graeff-Martins *et al.*, 2007; Nurcombe, 2007).

Low educational attainment has long-lasting negative consequences for individuals, families, and communities, as indicated by low earnings, more dependence on public assistance, poor health outcomes, life-dissatisfaction, social alienation, depression, alcohol and drug abuse, criminal activities, and higher chance of an intergenerational cycle (Fall & Roberts, 2012; Flisher, Townsend, Chikobvu, Lombard, & King, 2010; Henry, Knight, & Thornberry, 2012). On the other hand, education can help individuals escape poverty, improve health outcomes, and stop poverty from being passed down through the generations (Petrosino *et al.*, 2015; UNESCO, 2014).

Due to the disparate and varied reasons for low educational attainment, there may not be one common solution to this problem. However, regardless of the cause of low educational attainment, early intervention may be crucial. Increased access to schooling is a necessary first step towards universal primary education in developing countries (UN, 2013). According to Petrosino and colleagues (2015), who have done a systematic review of impact studies on school

enrollment interventions in developing countries, the interventions with the largest average effects are the ones that focus on improving school or community infrastructures, such as building new schools, repairing schools, and improving roads/access to schools. These developments increase student enrollment, student attendance and academic progress, as well as decrease school dropout (Petrosino *et al.*, 2015). Graeff-Martins and colleagues (2006) have assessed the feasibility and initial efficacy of a package of universal preventive intervention designed to reduce school dropout in developing countries. This intervention was implemented in a city public school in Brazil and yielded significant effects in dropout and absenteeism (Graeff-Martins *et al.*, 2006). The package consisted of two workshops with teachers, five letters to parents, three meetings with parents and school, a telephone helpline, 1-day cognitive intervention and a mental health assessment with possible referral to resources available in the community for students absent more than 10 days (Graeff-Martins *et al.*, 2006). In Honduras, a number of middle-school alternative programs have been implemented to expand post-primary school coverage for at-risk youngsters who live in rural and urban areas. These programs have been successful in reaching a vulnerable population in the country, although dropout rates are generally high (Marshall *et al.*, 2014).

In developed countries, most of the intervention programs are school-based programs, which aim to prevent school dropout and absenteeism. It is reported that the role of teachers as tutor-counselors is the most crucial and has a significant impact on school success, engagement, and educational achievement of youngsters (Graeff-Martins *et al.*, 2007). Also, students and families, who feel marginalized in their relations with teachers and peers, need further support to connect at school and engage with students' learning (Christenson & Thurlow, 2004; Graeff-Martins *et al.*, 2007). Tanner-Smith and Wilson (2013) report that dropout programs have generally been shown to be effective at reducing school dropout, and the relationship between absenteeism and later school dropout is well-established based on their findings from a systematic review and meta-analysis of literature on school dropout prevention and intervention programs. The most frequently used dropout intervention modalities can be classified as school/class restructuring, supplemental academic training, mentoring counseling, alternative school, cognitive behavioral/skills training, attendance monitoring/financial rewards, vocational/employment oriented, and multi-service packages (Tanner-Smith & Wilson, 2013).

The US Department of Health and Human Services Substance Abuse and Mental Health Services Administration (SAMHSA, 2007) have introduced "Reconnecting Youth (RY)" as an effective evidence-based dropout prevention program. RY is a selective school-based program for youth in ninth through twelfth grade (ages 14 to 18), who are at risk for school dropout. The central program goals are to decrease drug involvement, increase school performance and decrease emotional distress. It uses a partnership model involving peers, school personnel, and parents and caregivers. Since RY was developed in 1985 by Leona Eggert, child/adolescent psychosocial nurse specialist, and Liela Nichola in the United States, it has been implemented in all 50 states as well as internationally (e.g., in Canada, Germany, Malaysia, Russia, and Spain) to reach hundreds of thousands of youth (SAMHSA, 2007).

Role for nurses

Mental Health Atlas 2011(WHO, 2011) reports that nurses represent the largest professional group working in the mental health field worldwide, with the median rate of nurses in this sector at 5.8 per 100,000 population. This is greater than the rate of all other mental health workers combined. In particular, nurses have been primary providers in delivering necessary care to children with mental health challenges in most low- and middle-income countries where mental

health professionals are scarce (WHO, 2007). In some developed countries, psychiatric/mental health nurses have expanded their roles, with adequate educational preparation, to advanced functioning, which includes diagnosing, prescribing medication, and providing various types of supportive therapies including brief, trauma-focused, group, and individual to children in need. This model needs to be applied to and scaled up for use in low- and middle-income environments that are resource poor.

Therefore, it will be greatly beneficial to develop and offer educational opportunities to nurses and expand their roles accordingly in order to provide timely and effective services to children with mental and behavioral disorders and their families. Above all, nurses need to be recognized as essential and untapped human resources, capable of providing these crucial services.

Conclusion

About 20 percent of children suffer from mental disorders worldwide, accounting for a significant portion of the global burden of disease (Belfer & Nurcombe, 2007; Kieling *et al.*, 2011). Burden involves higher rates of health care utilization, necessary educational accommodation, and potential burden to both the criminal justice and social service systems (Belfer, 2008; Merikangas *et al.*, 2009). In addition, mental health challenges and behavioral symptoms cause enormous burden to children and their families. In low-income communities resources are insufficient, inequitably distributed and poorly used, contributing to a 90 percent treatment gap (Malhotra & Padhy, 2015). If untreated, childhood difficulties persist into adulthood resulting in poor quality of life, erosion of self-esteem and lost productivity.

Engaging in mental health promotion and prevention efforts is a necessary component when addressing barriers to human flourishing associated with the social determinants of health. Supportive resources for children include parents, teachers, nurses, and primary care providers, but ideally must be extended to many other groups involved in nurturing young people where they work, play, and learn. The specialist child and adolescent mental health nurse clinician has a strong role to play in education, policy development, and promotion of mental health literacy within communities. In addition nurses can use their expertise when conducting comprehensive assessments and providing evidence-based treatment within a culturally aware, respectful, and inclusive framework.

References

Achenbach, T.M., & Rescorla, L.A. (2007). *Multicultural understanding of child and adolescent psychopathology: Implications for mental health assessmen*t. New York: Guilford.

American Academy of Child and Adolescent Psychiatry (AACAP) Committee on Quality Issues (CQI). (2007). Retrieved July 24, 2016 from www.jaacap.com/content/pracparam.

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

Andover, M.S., Morris, B.W., Wren, A., & Bruzzese, M.E. (2012). The co-occurrence of non-suicidal self-injury and attempted suicide among adolescents: Distinguishing risk factors and psychosocial correlates. *Child and Adolescent Psychiatry and Mental Health*, 6, 11.

Arda, T.B., & Ocak, Ş. (2011). Social competence and promoting alternative thinking strategies: PATHS preschool curriculum. *Educational Sciences: Theory & Practice*, 12(4), 2691–2698.

Aud, S., Hussar, W., Kena, G., Bianco, K., Frohlich, L., Kemp, J., & Tahan, K. (2011). *The condition of eduj309*

cation 2011 (NCES 2011–2033). US Department of Education, National Center for Education Statistics. Washington, DC: US Government Printing Office.

Barlow, J., & Stewart-Brown, S. (2000). Behavior problems and group based parent education programs. *Journal of Development & Behavioral Pediatrics*, 21, 356–370.

Barnitz, L. (2001). Effectively responding to the commercial sexual exploitation of children: A comprehensive approach to prevention, protection, and reintegration services. *Child Welfare*, 80(5), 597–610.

Belfer, M.L. (2008). Child and adolescent mental disorders: The magnitude of the problem across the globe. *Journal of Child Psychology and Psychiatry*, 49(3), 226–236.

Belfer M.L., & Nurcombe, B. (2007). The epidemiology and burden of child and adolescent mental disorder. In H. Remschemidt, B. Nurcombe, M.L. Belfer, N. Sartorius & A. Okasha (Eds.), *The mental health of children and adolescents: An area of global neglect* (pp. 27–42). West Sussex, UK: John Wiley & Sons.

Betancourt, T.S., Meyers-Ohki, S.E., Charrow, A., & Hansen, N. (2013a). Annual research review: Mental health and resilience in HIV/AIDS-affected children—a review of the literature and recommendations for future research. *Journal of Child Psychology & Psychiatry*, 54(4), 423–444.

Betancourt, T.S., Borisova, I., Williams, T.P., Meyers-Ohki, S.E., Rubin-Smith, J.E., Annan, J., & Kohrt, B.A. (2013b). Research review: Psychosocial adjustment and mental health in former child soldiers—A systematic review of the literature and recommendations for future research. *Journal of Child Psychology & Psychiatry*, 54(1), 17–36.

Betancourt, T.S., Abdi, S., Ito, B.S., Lilienthal, G.M., Agalab, N., & Ellis, H. (2015). We left one war and came to another: Resource loss, acculturative stress, and caregiver-child relationships in Somali refugee families. *Cultural Diversity & Ethnic Minority Psychology*, 21(1), 114–125.

Birdsall, N., Levine, R., & Ibrahim, A. (2005). *Toward universal primary education: Investments, incentives, and institutions*. London: United Nations Development Programme.

Birmaher, B., Brent, D., & AACAP Work Group on Quality Issues. (2007). Practice parameter for the assessment and treatment of children and adolescents with depressive disorders. *Journal of the American Academy of Child Adolescent Psychiatry*, 46(11), 1503–1526.

Bridge, J.A., Goldstein, T.R., & Brent D.A. (2006). Adolescent suicide and suicidal behavior. *Journal of Child Psychology and Psychiatry* 47(3/4), 372–394.

Buitelaar, J.K., Smeets, K.C., Herpers, P., Scheepers, F., Glennon, J., & Rommelse, N.N. (2013*). Conduct disorders. European Child & Adolescent Psychiatry*, 22(Suppl 1), S49–S54.

Bukstein, O.G., & AACAP Work Group on Quality Issues. (2005). Practice parameter for the assessment and treatment of children and adolescents with substance use disorders. *Journal of the American Academy of Child Adolescent Psychiatry*, 44(6), 609–621.

Caffo, E., & Belaise, C. (2007). Violence and trauma: Evidence-based assessment and intervention in children and adolescents: A systemic review. In H. Remschemidt, B. Nurcombe, M.L. Belfer, N. Sartorius, & A. Okasha (Eds.), *The mental health of children and adolescents: An area of global neglect* (pp. 137–164). West Sussex, UK: John Wiley & Sons.

Canino, G., Polanczyk, G., Bauermeister, J.J., Rohde, L.A., & Frick, P. (2010). Does the prevalence of CD and ODD vary across cultures*? Social Psychiatry & Psychiatric Epidemiology*, 45(7), 695–704.

Cartwright-Hatton, S., McNicol, K., & Doubleday, E. (2006). Anxiety in a neglected population: Prevalence of anxiety disorders in pre-adolescent children. *Clinical Psychology Review*, 26(7), 817–833.

Cashin, A. (2005). Autism: Understanding conceptual processing deficits. *Journal of Psychosocial Nursing and Mental Health Services*, 43(4), 22–30.

Cashin, A. (2008). Narrative therapy: A psychotherapeutic appraoch in the treatment of adolescents with Asperger's Disorder. *Journal of Child and Adolescent Psychiatric Nursing*, 21(1), 48–56.

Cashin, A, & Barker, P. (2009). The triad of impairment in autism revisited. *Journal of Child and Adolescent Psychiatric Nursing*, 22(4), 189–193.

Cashin, A., Gallagher, H., Newman., C., & Hughes, M. (2012). Autism and the cognitive processing triad: A case for revising the criteria. *The Diagnostic and Statistical Manual. Journal of Child and Adolescent Psychiatric Nursing*, 25, 141–148.

Cashin, A., Browne, G., Bradbury, J., & Mulder, A. (2013). The effectiveness of Narrative Therapy with young people with autism. *Journal of Child and Adolescent Psychiatric Nursing*, 26(1), 32–41.

Catalano, R.F., Fagan, A.A., Gavin, L.E., Greenberg, M.T., Irwin Jr, C.E., Ross, D.A., & Shek, D.T. (2012). Worldwide application of prevention science in adolescent health. *The Lancet*, 379 (9826), 1653–1664.

Center for the Study and Prevention of Violence. (2004). Blue prints for violence prevention. Retrieved May 14, 2014 from www.ncjrs.gov/pdffiles1/ojjdp/204274.pdf.

Centers for Disease Control and Prevention. (2013). Mental health surveillance among children United States, 2005–2011. *Morbidity and Mortality Weekly Report*, 62(Suppl 2), 1–35. Retrieved January 3, 2014 from CDC website: www.cdc.gov/mmwr/preview/mmwrhtml/su6202a1.htm.

Chartrand, H. Sareen, J., Toews, M., & Bolton, J. M. (2012). Suicide attempts versus non-suicidal self-injury among individuals with anxiety disorders in a nationally representative sample. *Depression & Anxiety*, 29(3), 172–179.

Christenson, S.L., & Thurlow, M.L. (2004). School dropouts: Prevention considerations, interventions, and challenges. *Current Directions in Psychological Science*, 13(1), 136–39.

Clark, D.B., Chung, T., Thatcher, D.L., Pajtek, S., & Long, E.C. (2012). Psychological dysregulation, white matter disorganization and substance use disorders in adolescence. *Addiction*, 107(1), 206–214.

Cloutier, P., Martin, J., Kennedy, A., Nixon, M.K., & Muehlenkamp, J.J. (2010). Characteristics and co-occurrence of adolescent non-suicidal self-injury and suicidal behaviours in pediatric emergency crisis services. *Journal of Youth & Adolescence*, 39(3), 259–269.

Cluver, L.D., Orkin, M., Gardner, F., & Boyes, M.E. (2012). Persisting mental health problems among AIDS-orphaned children in South Africa. *Journal of Child Psychology & Psychiatry*, 53(4), 363–370.

Coalition to Stop the Use of Child Soldiers. (2008). *Child soldiers: Global report 2008*. London: Coalition to Stop the Use of Child Soldiers.

Commission on Chronic Illness. (1957). *Chronic illness in the United States (Vol. 1)*. Cambridge, MA: Harvard University Press.

Compas, B.E., Connor-Smith, J.K., Saltzman, H., Thomsen, A.H., & Wadsworth, M.E. (2001). Coping with stress during childhood and adolescence: Problems, progress, and potential in theory and research. *Psychological Bulletin*, 127(1), 87–127.

Conduct Problems Prevention Research Group. (2010). The effects of a multi-year randomized clinical trial of a universal social-emotional learning program: The role of student and school characteristics. *Journal of Consulting and Clinical Psychology*, 78(2), 156–168.

Connolly, S.D., Bernstein, G.A., & AACAP Work Group on Quality Issues. (2007). Practice parameter for the assessment andtreatment of children and adolescents with anxiety disorders. *Journal of the American Academy of Child Adolescent Psychiatry*, 46(2), 267–283.

Conradi, C. (2013). Child trafficking, child soldiering: Exploring the relationship between two "worst forms" of child labor. *Third World Quarterly*, 34(7), 1209–1226.

Crean, H.F., & Johnson, D.B. (2013). Promoting Alternative Thinking Strategies (PATHS) and elementary school aged children's aggression: Results from a cluster randomized trial. *American Journal of Community Psychology*, 52(1/2), 2691–2698.

Curtis, C., & Norgate, R. (2007). An evaluation of the Promoting Alternative Thinking Strategies curriculum at Key Stage 1. *Educational Psychology in Practice*, 23(1), 33–44.

de Graaf, I., Speetjens, P., Smit, F., de Wolff, M., & Tavecchio, L. (2008). Effectiveness of the Triple P-Positive Parenting Program on Parenting: A meta-analysis. *Family Relations*, 57(5), 553–566.

de Kloet, L., Starling, J., Hainsworth, C., Berntsen, E., Chapman, L., & Hancock, K. (2011). Risk factors for self-harm in children and adolescents admitted to a mental health inpatient unit. *Australian and New Zealand Journal of Psychiatry*, 45, 749–755.

Dervic, K., Brent, D.A., & Oquendo, M.K. (2008). Completed suicide in childhood. *Psychiatric Clinics of North America*, 31(2), 271–291.

Dick, D.M., & Agrawal, A. (2008). The genetics of alcohol and other drug dependence. *Alcohol Research & Health*, 31(2), 111–118.

Dodge, K.A., Coie, J.D., & Lynam, D. (2006). Aggression and antisocial behavior in youth. In W. Damon, R.M. Lerner, & N. Eisenberg (Eds.), *Handbook of child psychology: Social, emotional, and personality development* (6th ed.) (Vol. 3, pp. 719–788). New York: Wiley.

Domian, E.W., Baggett, K.M., Carta, J.J., Mitchell, S., & Larson, E. (2010). Factors influencing mothers' abilities to engage in a comprehensive parenting intervention program. *Public Health Nursing*, 27(5), 399–407.

Domitrovich, C.E., Cortes, R C., & Greenberg, M.T. (2007). Improving young children's social and emotional competence: A randomized trial of the Preschool PATHS® Curriculum. *Journal of Primary Prevention*, 28(2), 67–91.

Durlak, J.A., & Wells, A.M. (1997). Primary prevention mental health programs for children and adolescents: A meta-analytic review. *American Journal of Community Psychology*, 25(2), 115–152.

Durlak, J.A., Weissberg, R.P., Dymnicki, A.B., Taylor, R.D., & Schellinger, K.B. (2011). The impact of enhancing students' social and emotional learning: A meta-analysis of school-based universal interventions. *Child Development*, 82(1), 405–432.

El Din, A.S. (2004). Prevention and intervention in school setting. In H. Remschemidt, M.L. Belfer, & I. Goodyer (Eds.), *Facilitating pathways: Care, treatment, and prevention in child and adolescent mental health* (pp. 326–334). Berlin, Germany: Springer.

Erickson, E. (1952/1998). Eight stages of man. In C. Cooper, and L. Pervin (Eds.). *Personality: Critical concepts in psychology* (pp. 67–77). London: Routledge.

Erskine, H.E., Ferrari, A.J., Nelson, P., Polanczyk, G.V., Flaxman, A.D., Vos, T., & Scott, J.G. (2013). Research review: Epidemiological modelling of attention-deficit/hyperactivity disorder and conduct disorder for the Global Burden of Disease Study 2010. *Journal of Child Psychology & Psychiatry*, 54(12), 1263–1274.

Ertl V., Pfeiffer A., Schauer-Kaiser E., Elbert T., & Neuner F. (2014). The challenge of living on: Psychopathology and its mediating influence on the readjustment of former child soldiers. *Plos One*, 9 (7), e102786.

Evans, E., Hawton, K., Rodham, K., & Deeks, J. (2005). The prevalence of suicidal phenomena in adolescents: A systematic review of population-based studies. *Suicide and Life-Threatening Behavior*, 35(3), 239–250.

Fall, A., & Roberts, G. (2012). High school dropouts: Interactions between social context, self-perceptions, school engagement, and student dropout. *Journal of Adolescence*, 35(4), 787–798.

Fan, W., & Wolters, C.A. (2014). School motivation and high school dropout: The mediating role of educational expectation. *British Journal of Educational Psychology*, 84(1), 22–39.

Favazza, A. (1998). The coming of age of self-mutilation. *The Journal of Nervous and Mental Disease*, 186(5), 259–268.

Fayyad, J.A., Farah, L., Cassir, Y., Salamoun, M.M. & Karam, E.G. (2010). Dissemination of an evidence-based intervention to parents of children with behavioral problems in developing country. *European Child & Adolescent Psychiatry*, 19, 629–636.

Flament, M.F., Nguyen, H., Furino, C., Schacher, H., MacLean, C., Wasserman, D., & Remschmidt, H. (2007). Evidence-based primary prevention programmes for the promotion of mental health in children and adolescents: A systemic worldwide review. In H. Remschemidt, B. Nurcombe, M.L. Belfer, N. Sartorius, & A. Okasha (Eds.), *The mental health of children and adolescents: An area of global neglect* (pp. 65–135). West Sussex, UK: John Wiley & Sons.

Flisher, A.J., Townsend, L., Chikobvu, P., Lombard, C.F., & King, G. (2010). Substance use and psychosocial predictors of high school dropout in Cape Town, South Africa. *Journal of Research on Adolescence*, 20(1), 237–255.

Gale, B.M. (2011). Oppositional defiant disorder. In C. Draper & W.T. O'Donohue (Eds.), *Stepped care and e-health* (pp. 181–202). New York: Springer.

Garmezy, N. (1991). Resiliency and vulnerability to adverse developmental outcomes associated with poverty. *American Behavioral Scientist*, 34(4), 416–430.

Gordon, R. (1987). An operational classification of disease prevention. In J. Steinberg & M. Silverman (Eds.), *Preventing mental disorders: A research perspective* (pp. 20–26). Rockville, MA: US Department of Health and Human Services: National Institute of Mental Health.

Graeff-Martins, A.S., Oswald, S., Comassetto, J.O., Kieling, C., Goncalves, R.R., & Rohde, L.A. (2006) A package of interventions to reduce school dropout in public schools in a developing country. A feasibility study. *European Child & Adolescent Psychiatry*, 15(8), 442–449.

Graeff-Martins, A.S., Dmitrieva, T., El Din, A.S., Caffo, E., Flament, M.F., Nurcombe, B., Rydelius, P.-A., Remschmidt, H., Rohde, L.A. (2007). School dropout: A systemic worldwide review concerning risk factors and preventive interventions. In H. Remschemidt, B. Nurcombe, M.L. Belfer, N. Sartorius, & A. Okasha (Eds.), *The mental health of children and adolescents: An area of global neglect* (pp. 165–177). West Sussex, UK: John Wiley & Sons.

Grant, K.E., Compas, B.E., Thurm, A.E., McMahon, S.D., Gipson, P.Y., Campbell, A.J., & Westerholm, R.I. (2006). Stressors and child and adolescent psychopathology: Evidence of moderating and mediating effects. *Clinical Psychology Review*, 26(3), 257–283

Greenberg, M.T., Domitrovich, C., & Bumbarger, B. (2001). The prevention of mental disorders on school-aged children: Current state of the field. *Prevention and Treatment*, 4(1), 1–62.

Greenberg, M.T., Kusche, C.A., Cook E.T., & Quamma, J.P. (1995). Promoting emotional competence in school-aged children: The effects of the PATHS Curriculum. *Development and Psychopathology*, 7, 117–136.

Grossman, J.M., & Liang, B. (2008). Discrimination distress among Chinese American adolescents. *Journal of Youth & Adolescence*, 37, 1–11.

Gumpel, T.P. (2007). Are social competence difficulties caused by performance or acquisition deficits? The importance of self-regulatory mechanisms. *Psychology in the Schools*, 4(4), 351–372.

Hahlweg, K., Heinrichs, N., Kuschel, A., Bertram, H., & Naumann, S. (2010). Long-term outcome of a randomized controlled universal prevention trial through a positive parenting program: Is it worth the effort? *Child and Adolescent Psychiatry and Mental Health*, 4, 14.

Henry, K., Knight, K., & Thornberry, T. (2012). School disengagement as a predictor of dropout, delinquency, and problem substance use during adolescence and early adulthood. *Journal of Youth & Adolescence*, 41(2), 156–166.

Hong, Y., Li, X., Fang, X., Zhao, G., Lin, X., Zhang, J., Zhao, J., Zhang, L. (2010). Perceived social support and psychosocial distress among children affected by AIDS in China. *Community Mental Health Journal*, 46(1), 33–43.

Hosman, C., Jané-Llopis, E. (2005). Effectiveness and evidence: Levels and perspectives. In C. Hosman, E. Jané-Llopis, & S. Saxena (Eds.), *Prevention of mental disorders: Effective interventions and policy options*. Oxford: Oxford University Press.

In-Albon, T., Ruf, C., & Schmid, M. (2013). Proposed diagnostic criteria for the DSM-5 of nonsuicidal self-injury in female adolescents: Diagnostic and clinical correlates. *Psychiatry Journal*, 2013, Article ID 159208. Retrieved October 22, 2014 from http://dx.doi.org/10.1155/2013/159208.

Institute of Medicine. (1994). *Reducing risks for mental disorders: Frontiers for preventive intervention research*. Washington, DC: National Academies Press.

International Labour Organization (ILO). (2009). *Training manual to fight trafficking in children for labour, sexual, and other forms of exploitation: Understanding child trafficking*. Turin, Italy: International Training Centre of the ILO.

International Labour Organization (ILO). (2012). *ILO global estimate of forced labour 2012: Results and methodology*. Geneva: Author.

Jacobson, C.M., Muehlenkamp, J.J., Miller, A.L., & Turner, J.B. (2008). Psychiatric impairment among adolescents engaging in different types of deliberate self-harm. *Journal of Clinical Child & Adolescent Psychology*, 37(2), 363–375.

Kar, N. (2009). Psychological impact of disasters on children: Review of assessment and interventions. *World Journal of Pediatrics*, 5(1), 5–11.

Kelly, B., Longbottom, J., Potts, F., & Williamson, J. (2004). Applying emotional intelligence: Exploring the Promoting Alternative Thinking Strategies curriculum. *Educational Psychology in Practice*, 20(3), 221–240.

Kessler, R.C., Berglund, P., Demler, O., Jin, R., Merikangas, K.R., & Walters, E.E. (2005). Lifetime prevalence and age-of-onset distributions of DSM-IV disorders in the National Comorbidity Survey Replication, *Archives of General Psychiatry*, 62(6), 593–602.

Khalid-Khan, S., Santibanez, M., McMicken, C., & Rynn, M.A. (2007). Social anxiety disorder in children and adolescents: Epidemiology, diagnosis, and treatment. *Pediatric Drugs*, 9(4), 227–237.

Kieling, C., Baker-Henningham, H., Belfer, M., Conti, G., Ertem, I., Omigbodun, O., Rohde, L.A., Srinath, S., Ulkuer, N., & Rahman, A. (2011). Child and adolescent mental health worldwide: Evidence for action. *The Lancet*, 378(9801), 1515–1525.

Klasen, H., & Crombag, A. (2013). What works where? A systematic review of child and adolescent mental health interventions for low- and middle-income countries. *Social Psychiatry & Psychiatric Epidemiology*, 48(4), 595–611.

Klonsky, E.D., & Muehlenkamp, J.J. (2007). Self-injury: A research review for the practitioner. *Journal of Clinical Psychology*, 63(11), 1045–1056.

Kobau, R., Seligman, M.E., Peterson, C., Diener, E., Zack, M.M., Chapman, D., & Thompson, W. (2011). Mental health promotion in public health: Perspectives and strategies from positive psychology. *American Journal of Public Health*, 101(8), e 1–9.

Kohlberg, L., & Hersh, R. (1977). Moral development: A review of theory. *Theory Into Practice*, 12(2), 53–59.

Kumar, M., & Fonagy, P. (2013). Differential effects of exposure to social violence and natural disaster on children's mental health. *Journal of Traumatic Stress*, 26(6), 695–702.

Kusche, C.A., & Greenberg, M.T. (1994). *The PATHS curriculum*. South Deerfield, MA: Channing-Bete.

Landau, J. (2007). Enhancing resilience: Families and communities as agents for change. *Family Process*, 46(3), 351–365.

Landau, J. (2010). Communities that care for families: The LINC Model for enhancing individual, family, and community resilience. *American Journal of Orthopsychiatry*, 80(4), 516–524.

Landry, S.H., Smith, K.E., & Swank, P.R. (2006). Responsive parenting: Establishing early foundations for social, communication, and independent problem-solving skills. *Developmental Psychology*, 42(4), 627–642.

Leidy, M.S., Guerra, N.G., & Toro, R.I. (2010). Positive parenting, family cohesion, and child social competence among immigrant Latino families. *Journal of Family Psychology*, 24(3), 252–260.

Limber, S.P. (2011). Development, evaluation, and future directions of the Olweus Bullying Prevention Program. *Journal of School Violence*, 10(1), 71–87.

Luthar, S.S., & Zigler, E. (1991). Vulnerability and competence: A review of research on resilience in childhood. *American Journal of Orthopsychiatry*, 61, 6–22.

Luthar, S.S., Cicchetti, D., & Becker B. (2000). The construct of resilience: A critical evaluation and guidelines for future work. *Child Development*, 71(3), 543–562.

McClellan, J., Stock, S., & AACAP Committee on Quality Issues. (2013). Practice parameter for the assessment and treatment of children and adolescents with schizophrenia. *Journal of American Academy of Child and Adolescent Psychiatry*, 52(9), 976–990.

McDougall, Tim. (2010). Early intervention with children can prevent problems in later life. *Mental Health Practice*, 13(10), 30–32.

McMullen, J., O'Callaghan, P., Shannon, C., Black, A., & Eakin, J. (2013). Group trauma focused cognitive-behavioural therapy with former child soldiers and other war-affected boys in the DR Congo: A randomised controlled trial. *Journal of Child Psychology and Psychiatry*, 54(11), 1231–1241.

Malhotra, S., & Padhy, S. (2015). Challenges in providing child and adolescent psychiatric services in low resource countries. *Child Adolescent Psychiatric Clinics of North America*, 24, 777–797.

Manikam, R. (2002). Mental health of children and adolescents. In N.N. Singh, H.O. Thomas, & A.N. Singh (Eds.), *International perspectives on child and adolescent mental health* (Vol. 2, pp. 1–36). Oxford, UK: Elsevier Science.

Marshall, J.H., Aguilar, C.R., Alas, M., Castellanos, R.R., Castro, L., Enamorado, R., & Fonseca, E. (2014). Alternative education programmes and middle school dropout in Honduras. *International Review of Education*, 60(1), 51–77.

Masten, A.S. (2014). Global perspectives on resilience in children and youth. *Child Development*, 85(10), 6–20.

Masten, A.S., & Garmezy, N. (1985). Risk, vulnerability, and protective factors in developmental psychopathology. In B. Lahey, & A. Kazdin (Eds.), *Advances in clinical child psychology* (Vol. 8, pp. 1–52). New York: Plenum Press.

Masten, A.S., & Osofsky, J.D. (2010). Disasters and their impact on child development: introduction to the special section. *Child Development*, 81(4), 1029–1039.

Masten, A.S., & Monn, A.R. (2015). Child and family resilience: A call for integrated science, practice, and professional training. *Family Relations*, 64(1), 5–21.

Masten, A.S., & Narayan, A. J. (2012). Child development in the context of disaster, war and terrorism: Pathways of risk and resilience. *Annual Review of Psychology*, 63, 227–257.

Merikangas, K.R., Nakamura, E.F., & Kessler, R.C. (2009). Epidemiology of mental disorders in children and adolescents. *Dialogues in Clinical Neuroscience*, 11(1), 7–20.

Mitchell, D. (1924). *Psychology of the child*. New York: Robert K. Hass.

Mitchell, K., Finkelhor, D., & Wolak, J. (2010). Conceptualizing juvenile prostitution as child maltreatment: Findings from the national juvenile prostitution study. *Child Maltreatment*, 15(1), 18–36.

Muehlenkamp, J.J. (2005). Self-injurious behavior as a separate clinical syndrome. *American Journal of Orthopsychiatry*, 75(2), 324–333.

Muehlenkamp, J.J., Claes, L., Havertape, L., & Plener, P.L. (2012). International prevalence of adolescent non-suicidal self-injury and deliberate self-harm. *Child Adolescent Psychiatry Mental Health*, 6, 1–9.

Murphy, D.A., Moscicki, A.B., Vermund, S.H., & Muenz, L.R. (2000). Psychological distress among HIV(+) adolescents in the REACH study: Effects of life stress, social support, and coping. The Adolescent Medicine HIV/AIDS Research Network. *Journal of Adolescent Health*, 27(6), 391–398.

Nation, M., Crusto, C., Wandersman, A., Kumpfer, K.L., Seybolt, D., Morrisey-Kane, E., & Davino, K. (2003). What works in prevention. *American Psychologist*, 58(6/7), 449–457.

National Institute for Health and Care Excellence (NICE). (2103). *Antisocial behaviour and conduct disorders in children and young people: Recognition, intervention and management*. Manchester, UK: Author.

Nock, M.K. (2012). Future directions for the study of suicide and self-injury. *Journal of Clinical Child & Adolescent Psychology*, 41(2), 255–259.

Nock, M.K., & Kessler, R.C. (2006). Prevalence of and risk factors for suicide attempts versus suicide gestures: Analysis of the National Comorbidity Survey. *Journal of Abnormal Psychology*, 115(3), 616–623.

Nock, M.K., Kazdin, A.E., Hiripi, E., & Kessler, R.C. (2007). Lifetime prevalence, correlates, and persistence of oppositional defiant disorder: Results from the National Comorbidity Survey Replication. *Journal of Child Psychology & Psychiatry*, 48(7), 703–713.

Nock, M.K., Joiner T.E. Jr., Gordon K.H., Lloyd-Richardson E., & Prinstein M.J. (2006). Non-suicidal self-injury among adolescents: Diagnostic correlates and relation to suicide attempts. *Psychiatry Research*, 144(1), 65–72.

Norris, F.H., Friedman, M.J., Watson, P.J., Byrne, C.M., Diaz, E., & Kaniasty, K. (2002). 60,000 disaster victims speak: Part I. An empirical review of the empirical literature, 1981–2001. *Psychiatry: Interpersonal and Biological Processes*, 65(3), 207–239.

Nurcombe, B. (2007). The principles of prevention in child and adolescent mental health. In H. Remschemidt, B. Nurcombe, M.L. Belfer, N. Sartorius, & A. Okasha (Eds.), *The mental health of children and adolescents: An area of global neglect* (pp. 53–64). West Sussex, UK: John Wiley & Sons.

Olweus, D., & Limber, S. P. (2010). Bullying in school: Evaluation and dissemination of the Olweus bullying prevention program. *American Journal of Orthopsychiatry*, 80(1), 124–134.

Orban, L.A., Stein, R., Koenig, L.J., Conner, L.C., Rexhouse, E.L., Lewis, J.V., & LaGrange, R. (2010). Coping strategies of adolescents living with HIV: Disease-specific stressors and responses. *AIDS Care*, 22(4), 420–430.

Patel, V., Flisher, A., & Cohen, A. (2006). Mental Health. In M.H. Merson, R.E. Black, & A.J. Mills (Eds.), *International public health: Diseases, programs, systems, and policies* (2nd ed.) (pp. 355–391). Sudbury, MA: Jones & Bartlett.

Patel, V., Flisher, A.J., Hetrick, S., & McGorry, P. (2007). Mental health of young people: A global public-health challenge. *The Lancet*, 369, 1302–1313.

Patel, V., Flisher, A.J., Nikapota, & A., Malhotra, S. (2008). Promoting child and adolescent mental health in low- and middle-income countries. *Journal of Child Psychology and Psychiatry*, 49(3), 313–334.

Patton, G.C., Coffey, C., Sawyer, S.M., Viner. R.M., Haller, D.M., Bose, K., & Mathers, C.D. (2009). Global patterns of mortality in young people: a systematic analysis of population health data. *The Lancet*, 374, 881–892.

Paula, C.S., Duarte, C.S., & Bordin, I.A.S. (2007). Prevalence of mental health problems in children and adolescents from the outskirts of Sao Paulo City: Treatment needs and service evaluation. *Revista Brasileira de Psiquiatria*, 29(1), 11–17.

Petrosino, A., Morgan, C., Fronius, T., Tanner-Smith, E.E., & Boruch, R.F. (2015). What works in developing nations to get children into school or keep them there? A systematic review of rigorous impact studies. *Research on Social Work Practice*, 25(1), 44–60.

Piaget, J. (1952). *The origins of intelligence in children*. New York: International Universities Press.

Plener, P.L., Libal, G., Keller, F., Fegert, J.M., & Muehlenkamp, J.J. (2009). An international comparison of adolescent non-suicidal self-injury (NSSI) and suicide attempts: Germany and the USA. *Psychological Medicine*, 39(9), 1549–1558.

Pliszka, S.R., & AACAP Work Group on Quality Issues (2007). Practice parameter for the assessment and treatment of children and adolescents with attention-deficit/hyperactivity disorder. *Journal of the American Academy of Child Adolescent Psychiatry*, 46(7), 894–921.

Porter, M., & Haslam, N. (2005). Pre-displacement and post-displacement factors associated with mental health of refugees and internally displaced persons: A meta-analysis. *JAMA*, 294(5), 602–612.

Presnall, N., Webster-Stratton, C.H., & Constantino, J.N. (2014). Parent training: Equivalent improvement in externalizing behavior for children with and without familial risk. *Journal of the American Academy of Child & Adolescent Psychiat*ry, 53(8), 879–887.

Rafferty, Y. (2013). Child trafficking and commercial sexual exploitation: A review of promising prevention policies and programs. American *Journal of Orthopsychiatry*, 83(4), 559–575.

Reed, R.V., Fazel, M., Jones, L., Panter-Brick, C., & Stein, A. (2012). Mental health of displaced and refugee children resettled in low-income and middle-income countries: Risk and protective factors. *The Lancet*, 379(9812), 250–265.

Reinke, W.M., Stormont, M., Webster-Stratton, C., Newcomer, L.L., & Herman, K.C. (2012). The Incredible Years Teacher Classroom Management Program: Using coaching to support generalization to real-world classroom settings. *Psychology in the Schools*, 49(5), 416–428.

Rotheram-Fuller, E., & MacMullen, L. (2011). Cognitive behavioral therapy for children with autism spectrum disorders. *Psychology in the Schools*, 48(3), 263–271.

Rutter, M. (1987). Psychosocial resilience and protective mechanisms. *American Journal of Orthopsychiatry*, 57, 316–331.

Rutter, M. (2012). Resilience as a dynamic concept. *Development and Psychopathology*, 24(2), 335–344.

Sanders, M.R. (2008). Triple P-Positive Parenting Program as a public health approach to strengthening parenting. *Journal of Family Psychology*, 22(3), 506–517.

Sanders, M.R., & Glynn, E.L. (1981). Training parents in behavioral self-management: An analysis of generalization and maintenance effects. *Journal of Applied Behavior Analysis*, 14(3), 223–237.

Sanders, M.R., Markie-Dadds, C., & Turner, K.M.T. (2003). Theoretical, scientific and clinical foundations of the Triple P-Positive Parenting Program: A population approach to the promotion of parenting competence. *Parenting Research and Practice Monograph* (1), 1–21.

Sanders, M.R., Kirby, J.N., Tellegen, C.L., & Day, J.J. (2014). The Triple P-Positive Parenting Program: A systematic review and meta-analysis of a multi-level system of parenting support. *Clinical Psychology Review*, 34(4), 337–357.

Schwab-Stone, M., Ruchkin, V., Vermeiren, R., & Leckman, P. (2001) Cultural considerations in the treatment of children and adolescents: Operationalizing the importance of culture in treatment. *Child and Adolescent Psychiatric Clinics of North America*, 10(4), 729–743.

Shapiro, C.J., Prinz, R.J., & Sanders, M.R. (2008). Population-wide parenting intervention training: Initial feasibility. *Journal of Child and Family Studies*, 17, 457–466.

Shea, P., & Shern, D. (2011). *Primary prevention in behavioral health: Investing in our nation's future*. Alexandria, VA: National Association of State Mental Health Program Directors (NASMHPD).

Silverman, W.K., Pina, A.A., & Viswesvaran, C. (2008). Evidence-based psychosocial treatments for phobic and anxiety disorders in children and adolescents. *Journal of Clinical Child & Adolescent Psychology*, 37, 105–130.

Smetana, J., Campione-Barr, N., & Metzger, A. (2006). Adolescent development in interpersonal and societal contexts. *Annual Reviews Psychology*, 57, 255–84.

Spence, S.H. (2003). Social skills training with children and young people: Theory, evidence and practice. *Child and Adolescent Mental Health*, 8(2), 84–96.

Steiner, H., Remsing, L., & AACAP Work Group on Quality Issues. (2007). Practice parameter for the assessment and treatment of children and adolescents with oppositional defiant disorder. *Journal of the American Academy of Child Adolescent Psychiatry*, 46(1), 126–141.

Stephens, P. (2011). Preventing and confronting school bullying: A comparative study of two national programmes in Norway. British *Educational Research Journal*, 37(3), 381–404.

Strawn, J.R., Wehry, A.M., Del Bello, M.P., Rynn, M.A., & Strakowski, S. (2012). Establishing the neurobiologic basis of treatment in children and adolescent with generalized anxiety disorder. *Depression & Anxiety*, 29(4), 328–339.

Sturgeon, S., & Orley, J. (2005). Concepts of mental health across the world. In H. Herrman, S. Saxena, & R. Moodie (Eds.), *Promoting mental health: Concepts, emerging evidence, practice* (pp. 59–69). Geneva: World Health Organization.

Substance Abuse and Mental Health Services Administration, Center for Mental Health Services (2007). *Promotion and prevention in mental health: Strengthening parenting and enhancing child resilience*. DHHS Publication No. CMHS-SVP-0175. Rockville, MD: Author.

Szatmari, P., Archer, L., Fisman, S., Streiner, D., & Wilson, F. (1995). Asperger's syndrome and autism: Differences in behavior, cognition, and adaptive functioning. *Journal of the American Academy of Child and Adolescent Psychiatry*, 34(12), 1662–1671.

Taliaferro, L.A., & Muehlenkamp, J.J. (2014) Risk and protective factors that distinguish adolescents who attempt suicide from those who only consider suicide in the past year. *Suicide & Life-Threatening Behavior*, 44(1), 6–22.

Tanner-Smith, E.E., & Wilson, S.J. (2013). A meta-analysis of the effects of dropout prevention programs on school absenteeism. *Prevention Science*, 14(5), 468–478.

Thatcher, D.L., & Clark, D.B. (2008). Adolescents at risk for substance use disorders. *Alcohol Research & Health*, 31(2), 168–176.

Theunissen, M., Griensven van, I., Verdonk, P., Feron, F., & Bosma, H. (2012). The early identification of risk factors on the pathway to school dropout in the SIODO study: A sequential mixed-methods study. *BMC Public Health*, 12(1), 1033–1040.

Trotter, H., & Rafferty, H. (2014). A follow-up to the Incredible Years Parenting Programme: The reflections of mothers one to two years later. *Educational & Child Psychology*, 31(4), 40–57.

Ttofi, M.M., & Farrington, D.P. (2009). What works in preventing bullying: Effective elements of anti-bullying programmes. *Journal of Aggression, Conflict and Peace Research*, 1(1), 13–24.

United Nations. (2013). *The millennium development goals report 2013*. New York: Author.

United Nations Children's Fund. (2007). *The Paris principles: Principles and guidelines on children associated with armed forces or armed groups*. Retrieved August 7, 2014 from UNICEF website: www.unicef.org/emerg/files/ParisPrinciples310107English.pdf.

United Nations Children's Fund. (2009). *The state of the world's children, special edition: Celebrating 20 Years of the Convention on the Rights of the Child*. New York: Author.

United Nations Children's Fund. (2013). *Towards an AIDS-free generation: Children and AIDS: Sixth stocktaking report, 2013*. New York: Author.

United Nations Educational, Scientific and Cultural Organization. (2014). *EFA global monitoring report 2013/4: Teaching and learning—achieving quality for all*. Paris: UNESCO.

United Nations High Commissioner for Refugees. (2013). *UNHCR statistical yearbook 2012*. Geneva: Author.

United Nations Office on Drugs and Crime. (2010). *Compilation of evidence-based family skills programmes*. Retrieved June 17, 2014 from www.unodc.org/documents/prevention/family-compilation.pdf.

US Department of Health and Human Services. (1999). *Mental health: A report of the Surgeon General*. Rockville, MD: US 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.

Van Meter A.R., Moreira, A.L., & Youngstrom, E.A. (2011). Meta-analysis of epidemiologic studies of pediatric bipolar disorder. *Journal of Clinical Psychiatry*, 72(9), 1250–1256.

Verhulst, F.C. (2004). Epidemiology as a basis for the conception and planning of services. In H. Remschemidt, M.L. Belfer, & I. Goodyer (Eds.), *Facilitating pathways: Care, treatment, and prevention in child and adolescent mental health* (pp. 3–15). Berlin, Germany: Springer.

Walsh, F. (2003). Family resilience: A framework for clinical practice. *Family Process*, 42(1), 1–18.

Walsh, F. (2007). Traumatic loss and major disasters: Strengthening family and community resilience. *Family Process*, 46(2), 207–227.

Webster-Stratton, C. (2009). Affirming diversity: Multi-cultural collaboration to deliver the Incredible Years Parent Programs. *The International Journal of Child Health and Human Developmen*t, 2(1), 17–32.

Webster-Stratton, C., & Herman, K.C. (2010). Disseminating Incredible Years Series early intervention programs: Integrating and sustaining services between school and home. *Psychology in the Schools*, 47(1), 36–54.

Webster-Stratton, C., Rinaldi, J., & Reid, J.M. (2011). Long-term outcomes of Incredible Years Parenting Program: Predictors of adolescent adjustment. *Child & Adolescent Mental Health*, 16(1), 38–46.

Webster-Stratton, C., Reid, M.J., & Beauchaine, T.P. (2013). One-year follow-up of combined parent and child intervention for young children with ADHD. *Journal of Clinical Child & Adolescent Psychology*, 42(2), 251–261.

Weems, C.F., Pina, A.A., Costa, N.M., Watts, S.E., Taylor, L.K., & Cannon, M. F. (2007). Predisaster trait anxiety and negative affect predict posttraumatic stress in youths after Hurricane Katrina. *Journal of Consulting and Clinical Psychology*, 75(1), 154–159.

West, A.E., Weinstein, S.M., Peters, A.T., Katz, A.C., Henry, D.B., Cruz, R.A., & Pavuluri, M.N. (2014). Child- and family-focused cognitive-behavioral therapy for pediatric bipolar disorder: A randomized clinical trial. *Journal of the American Academy of Child & Adolescent Psychiatry*, 53(11), 1168–1178.

Wilkinson, P., & Goodyer, I. (2011) Non-suicidal self-injury. *European Child & Adolescent Psychiatry*, 20(2), 103–108.

Willis, B.M., & Levy, B.S. (2002). Child prostitution: Global health burden, research needs, and interventions. *The Lancet*, 359, 1417–1422.

Wondie, Y., Zemene, W., Reschke, K., & Schroder, H. (2011). Early marriage, rape, child prostitution, and related factors determining the psychosocial effects severity of child sexual abuse in Ethiopia. *Journal of Child Sexual Abuse*, 20(3), 305–321.

World Health Organization. (2003). *Caring for children and adolescents with mental disorders: Setting WHO Directions*. Geneva: Department of Mental Health and Substance Abuse.

World Health Organization. (2004). *Prevention of mental disorders: Effective interventions and policy options*. Geneva: Author.

World Health Organization. (2005a). *Atlas: Child and adolescent mental health resources—global concerns, implications for the future*. Geneva: Author.

World Health Organization. (2005b). *Mental health policy and service guidance package: Child and adolescent mental health policies and plans*. Geneva: Author.

World Health Organization. (2006). *Preventing suicide: A resource for counselors*. Geneva: Department of Mental Health and Substance Abuse.

World Health Organization. (2007). *Atlas: Nurses in mental health 2007*. Geneva: Author.

World Health Organization. (2010a). *International statistical classification of diseases and related health problems, 10th revision*. Geneva, Author.

World Health Organization. (2010b). *mhGAP intervention guide for mental, neurological and substance use disorders in non-specialized health settings: Mental Health Gap Action Programme (mhGAP)*. Geneva: Author.
World Health Organization. (2011*). Mental health atlas 2011*. Geneva: Author.
World Health Organization. (2012). *Adolescent mental health: Mapping actions of nongovernmental organizations and other international development organizations*. Geneva: Author.
World Health Organization. (2013). *Mental health action plan 2013–2020*. Geneva: Author.
Yearwood, E.L., & Bosnick, E. (2012). Deliberate self-harm: Nonsuicidal self-injury and suicide in children and adolescents. In E.L. Yearwood, G.S. Pearson, & J.A. Newland (Eds.), *Child and adolescent behavioral health* (pp. 187–204). West Sussex, UK: John Wiley & Sons.
Ying, L., Wu, X., Lin, C., & Chen, C. (2013). Prevalence and predictors of posttraumatic stress disorder and depressive symptoms among child survivors 1 year following the Wenchuan earthquake in China. *European Child & Adolescent Psychiatry*, 22(9), 567–575.
Young, R., Sproeber, N., Groschwitz, R.C., Preiss, M., & Plener, P.L. (2014). Why alternative teenagers self-harm: Exploring the link between non-suicidal self-injury, attempted suicide and adolescent identity. *BMC Psychiatry*, 14(1), 1–25.
Young, S., & Amarasinghe, J.M. (2010). Practitioner review: Non-pharmacological treatments for ADHD—a lifespan approach. *Journal of Child Psychology and Psychiatry*, 51(2), 116–133.
Yule, W., & Smith, P. (2008) Post-traumatic stress disorder. In M. Rutter, D.V.M. Bishop, D.S. Pine, S. Scott, J. Stevenson, E. Taylor, & A. Thapar (Eds.), *Rutter's child and adolescent psychiatry*, (5th ed) (pp. 686–697). Oxford: Blackwell.
Zhang, J., Zhao, G., Lib, X., Hong, Y., Fang, X., Barnett, D., & Zhang, L. (2009). Positive future orientation as a mediator between traumatic events and mental health among children affected by HIV/AIDS in rural China. *AIDS Care*, 21(12), 1508–1516.
Zhao, Q., Li, X., Zhao, J., Zhao, G., & Stanton, B. (2014). Predictors of depressive symptoms among children affected by HIV in rural China: A 3-year longitudinal study. *Journal of Child and Family Studies*, 23, 1193–1200.
Ziaian, T., de Anstiss, H., Antoniou, G., Baghurst, P., & Sawyer, M. (2013). Emotional and behavioural problems among refugee children and adolescents living in South Australia. *Australian Psychologist*, 489(2), 139–148.