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Human Development Through the Lifespan

Every human being is the author of his own health or disease.

Buddha

he study of human development is complex and involves an in-depth analysis of the processes of change and stability through one's lifespan. These processes require a comprehensive and systematic scientific inquiry to investigate human development while considering growth, development, and maturation through the lifespan. Scientists refer to the elements of change and constancy over the lifespan as development, which is defined as the orderly and sequential changes that occur with the passage of time as an organism moves from conception to death. Development occurs through processes that are biologically programmed within the organism and processes of interaction with the environment that transform the organism. Human development over the lifespan is a process of becoming something different while remaining in some respects the same. Perhaps what is uniquely human is that we remain in an unending state of development. Life is always an unfinished business, and death is its only cessation. The study of human development, from earlier days, grows out of Darwin's desire to understand evolution. The field of human development research became a recognized discipline when scientists from different disciplines demonstrated interest in better understanding human growth and development through the lifespan, as it relates to the contributions of genetic traits and composition, physical and psychological development, parental influence, and school and learning contributions, including cultural, community, and societal contributions. Scientists who pursue the study of human development intend to describe, explain, predict, and modify human growth development through the lifespan (Bornstein & Lamb, 2005).

The objective of this textbook is to present human development from a counseling perspective and to show how this unique perspective can be applied through the lifespan. According to the 2016 Standards of the Council for Accreditation of Counseling and Related Educational Programs (CACREP), it is essential to understand human development as students, educators, and professional counselors in the counseling field.

This chapter provides an overview of those factors influencing consistency and change and highlights the complexity and multidimensional nature of human development as it unfolds

through one's lifespan. In addition, this chapter describes the importance and essential contribution that the knowledge and understanding of human development provides to counselors and their effective practice. Specifically, after completing this chapter, readers will be able to

- 1. describe what is meant by viewing development from a lifespan perspective,
- 2. explain the multidimensional and multidirectional nature of lifespan development,
- 3. describe what is meant by viewing development within a contextual framework,
- 4. discuss the biopsychosocial approach to defining human development and the multiple interactive forces that shape human development, and
- 5. explain the value of understanding human development across the lifespan for the counseling process.

THE COUNSELING CONNECTION

Counselors, by the very nature of their vocational calling, tend to be doers. As professionals, we review the research and the emerging theories in an attempt to better understand the human condition. However, it is more than for the sake of understanding that we pursue these endeavors. Counselors seek to translate theory, research, and knowledge into practice. As such, the question to be asked as you proceed through this text is: "What value does understanding human development through the lifespan, or more specifically this theory, have for me, as I attempt to make practice decisions in service of another?"

While this question may be challenging and difficult to answer, it needs to be asked. This question can serve as a guide to extracting meaning throughout the remainder of this text. And it is a question that we feel will not only be answered in the pages that follow but will be answered in a way that makes you a more effective counselor.

Uniqueness of the Counseling Profession Identity

Professional counseling has been defined as "the application of mental health, psychological, or human development principles, through cognitive, affective, behavioral or systemic **intervention** strategies, that address wellness, personal growth, or career development, as well as pathology" (American Counseling Association, 1997). Further, as noted in the **ACA Code of Ethics**, counselors are dedicated to the promotion of human growth and development across the lifespan, engage in practices that are developmentally appropriate in nature, and act as advocates against any barrier that limits human development (American Counseling Association, 2014). Professional counselors have distinguished themselves among helping professionals through their focus on different aspects of human growth and development over the lifespan. It is in our DNA and is the core of our professional identity.

In contrast to other helping professionals, counselors dedicate their professional lives to issues of wellness, prevention, and personal growth and development. This is not to suggest that we are not engaged in processes that help those experiencing major disruptions to their lives. Certainly, as counselors, we engage in remediation and therapeutic interventions with those who present with problems, dysfunctions, or pathology. However, even when counselors serve in that capacity, they seek to not only assist clients back to the path of stability but to do so in a way that prevents future disruption and promotes or fosters their clients' ongoing wellness and development.

Essential to Counseling Practice

As noted above, counselors engage in practices that foster ongoing wellness and development and act as advocates against barriers that limit human development. Such a professional calling, or mission, is both noble and valuable. However, this mission is clearly impossible to fulfill without (a) professional knowledge of the nature of human development across the lifespan, (b) the understanding of both normative and exceptional challenges that can be and are experienced, and (c) the use of research and theory on human development to guide professional practice decisions.

Without a full understanding of what defines the nature of human development across the lifespan, counselors would be unable to discern that which is normative from that which is a deviation or to engage in processes that continue to support healthy development or intervene when behaviors are less than healthy or optimal. Knowledge of the theory, principles, and research of human development is essential to professional counseling practice. Guided Practice Exercise 1.1 highlights the value of understanding human development when confronted with client concerns. As you review this exercise, ask yourself whether knowledge of human development would influence your responses.

To be effective as a counselor and to truly understand one's client, a counselor must understand the various elements and processes that impact human growth and development. It is important to understand how factors such as an individual's experiences, life maturation processes, and **culture** shape the individual's life at any one stage of human development. Further, it is important to know (a) how individuals cope with and make sense of their environment and surroundings, (b) how they use their learning experiences to cope with adversity and stress, (c) how they develop **resilience** and coping skills, and (d) how all of this could be affected by gender, cultural, physical, psychological, and sociological factors.

Integrated in Our Studies

The importance of understanding human development is highlighted by the fact that most professional bodies or associations require formal training in developmental theory and research. For example, CACREP, the premier accreditation body of counselor education programs, has articulated standards (see Table 1.1) and requires its accredited programs to include at least a course in human growth and development in their curricula (Council for Accreditation of Counseling Related Educational Programs, 2016; Korsmo, Baker-Sennett, & Nicholas, 2009).

Even without a specific course in human development, the value of this information is evident by the very fact that numerous courses within the counseling professional training experience find grounding in human development theory and research. For example, consider the following brief sampling of course titles typically found in a counselor education program. Although these courses are unique, each offers insight into the nature and dynamics of human development and provides critical information to better understand the nature and needs of individuals at all developmental levels in a diverse cultural and psychosocial context.

- Counseling Theory: theories of human and personality development, including how genetic, psychosociological, neurobiological, and cognitive factors contribute to behavior and learning development.
- 2. *Family Counseling:* theories of family and individuals as related to the transition across the lifespan.
- 3. *Abnormal Psychology:* theories of human behavior, both normal and abnormal behavior, to be affected in the development stages of happiness, sadness, loss, crises,

GUIDED PRACTICE EXERCISE 1.1

REFLECTIONS ON SPECIFIC BEHAVIORS

Below is a description of a specific behavior. Reflect on the questions and consider the changing nature of your response as additional (developmental) data are provided.

Situation 1: Your client presents as noncommunicative, has poor social skills, and appears as if totally occupied by and within his or her own mental constructs and fantasies.

- a. Do you feel this client is in need of counseling?
- b. If engaged in counseling, what might be a target or goal for the intervention?
- c. What type of approach might you try?

How might your responses change if you knew that

- a. The client was 9 months old?
- b. The client was 14 years old?
- c. The client was 41 years old?

Situation 2: The client presents with behaviors related to dressing up in female attire. The client is particularly attracted to feminine undergarments and has been reported to have been stimulated while wearing these garments.

- a. Do you feel this client is in need of counseling?
- b. If engaged in counseling, what might be a target or goal for the intervention?
- c. What type of approach might you try?

How might your responses change if you knew that

- a. The client was a 13-year-old female?
- b. The client was a 27-year-old male?
- c. The client was 4 years old (gender unknown)?

Situation 3: Your client has been described as sullen, moody, withdrawn, and exhibiting a dark side that includes focusing on issues of death and dying.

- a. Do you feel this client is in need of counseling?
- b. If engaged in counseling, what might be a target or goal for the intervention?
- c. What type of approach might you try?

How might your responses change if you knew that

- a. The client was a 14-year-old self-described gothic male?
- b. The client was a 27-year-old postpartum female?
- c. The client was a 96-year-old patient with cancer?

TABLE 1.1 CACREP 2016 Human Growth and Development Standards

Human Growth and Development: Provide an understanding of the nature and needs of individuals at all developmental levels, including all of the following:

- a. theories of individual and family development across the lifespan
- b. theories of learning
- c. theories of normal and abnormal personality development
- d. theories and etiology of addictions and addictive behaviors
- biological, neurological, and physiological factors that affect human development, functioning, and behavior
- f. systemic and environmental factors that affect human development, functioning, and behavior
- g. effects of crisis, disasters, and trauma on diverse individuals across the lifespan
- a general framework for understanding differing abilities and strategies for differentiated interventions
- ethical and culturally relevant strategies for promoting resilience and optimum development and wellness across the lifespan

Source: Council for Accreditation of Counseling Related Educational Programs (2016).

The parts of the CACREP Standards that SAGE Publications, Inc. reproduces in its Work represent only selected parts of the 2016 CACREP Standards; that inclusion of the CACREP Standards in the SAGE Publications, Inc. Work is in no way intended to imply CACREP endorsement or approval of the SAGE Publications, Inc. Work and that use of the SAGE Publications, Inc. Work as a teaching tool does not establish or connote compliance with CACREP Standards for purposes of determining CACREP accreditation of any education program.

health, disability, and situational and environmental factors that may contribute to growth and development stages.

- 4. *Addiction:* theories of addictions and addictive behaviors, including strategies for prevention, intervention, and treatment.
- 5. Counseling Intervention and Prevention: theories for the study of facilitating optimal development, enhancing **quality of life**, and maintaining wellness over the lifespan.
- Crises Intervention: theories of individuals, families, and communities coping with disasters and post-traumatic stress and how resilience contributes to the transition of healing and recovery.
- 7. Assessment: theories of psychosocial, cultural, and economic contributions to the **holistic** assessment of human growth and development.
- 8. *Theories of Counseling and Psychotherapy:* theories that guide proper diagnoses and appropriate counseling treatment to enhance and optimize the counseling outcome, all placed within the context of the human condition and normative challenges.

The recognition by accrediting bodies of the need for and the value of knowledge of human development, along with the integration of developmental principles and concepts throughout the counselor education curriculum, speaks to the value of this knowledge for professional practice. As you continue with your training and reading this chapter, it is our hope that you will come to see that it is more than knowledge that is gained by studying human development across the lifespan. As you begin to understand the complexity of human development, it is our intention that you will also develop an increased appreciation for and value of uniqueness and commonality, strength and vulnerability, and the simple wonder of the human condition.

THE COMPLEXITY OF HUMAN DEVELOPMENT

Human development, while so natural, is very complex and multidimensional. It means developing mentally and socially through growing and experiencing life and learning new things through the lifespan. As such, the study of human development is challenging and requires an in-depth analysis of the processes that contribute to change while maintaining stability, as uniquely experienced and evidenced throughout one's lifespan. The study of human development attempts to define the elements that contribute to the healthy as well as less than healthy unfolding of the human condition. Identifying and defining all of the factors that come together to stimulate growth, development, and change in what is anticipated to be an orderly fashion is quite a task.

The magnitude and complexity implied by the previous statement may be lost to our understanding unless we take time to reflect on our own experience of human development. Consider the apparent seamlessness and fluidity of moving from a two-celled organism to a state of infancy, sleeping in a cradle and depending fully on a caregiver, to the development of



PHOTO 1.1 New York's
Times Square, known as the
"Crossroads of the World,"
represents the numerous
factors that impact human
development, including
socioenvironmental and
multigenerational diversity.

Source: Courtesy of the author.

abilities such as walking, talking, remembering, imagining, hypothesizing, empathizing, and even reflecting on one's very being. Certainly, we all celebrate these markers of development, but for most, we also simply take them for granted unless or until something goes wrong. It is at those times of developmental disruption that we seek understanding. And it is that need for understanding and the following direction for intervention that leads to the study of development through the lifespan.

Development: Change and Stability

For the purposes of this chapter and theme, development is defined as the orderly and sequential changes that occur with the passage of time as an organism moves and adapts from the very beginning until the end of life. These changes occur through complex interactions between processes that are biologically programmed within the organism and elements presented within the environment. These interactions transform the organism through the process of orderly, sequential change.

This interactive process is complex, multidimensional, and not always clear-cut or easily understood. Guided Practice Exercise 1.2 highlights the complexity of this process of development as it gives form to the intricate interplay and interaction between biological and environmental processes.

Perhaps what is so uniquely human is that we remain in an unending state of development throughout our lifespan. Life is always an unfinished business, and death is its only cessation. Even having stated that change is the essence of the human condition, our understanding of human development highlights the fact that we exhibit stability during change and the nature of this change is predictable.

Understanding this orderly, sequential nature of human development not only allows us to understand when development has been thwarted, but it also provides us with the markers that serve as beacons to guide our decisions as we attempt to facilitate the continuation of healthy growth and development. As a simple illustration, consider the sequence of moving from being an infant to being a toddler. When you reflect on this transition, what changes would you expect to observe? Would you assume increased mobility? Would language and social interaction improve? Would you be concerned if these changes were not evident?

While we can appreciate the realities of individual differences and that development does not adhere to a rigid time structure, our knowledge of human development helps to establish markers denoting expected orderly sequential change and our concerns are heightened when these changes do not occur.

Development: The Result of Interactive Forces

Human development involves growth, maintenance, and regulation of loss and is constructed through the interaction of biological, cognitive, sociocultural, environmental, and individual factors working together interactively throughout one's lifespan. Human development is both multidimensional and multidirectional. Our development reflects the internal direction of our biological substrate while at the same time is responsive to environmental and contextual demands. Throughout it all, our development demonstrates a unique plasticity that allows each of us to adapt and to promote positive change when confronted with challenges (Baltes, Lindenberger, & Staudinger, 2006; Baltes & Smith, 2003).

The complexity of developmental interactive forces and the interaction of elements can be seen by simply considering a child's initiation into the world of crawling (see Case Illustration 1.1).

GUIDED PRACTICE EXERCISE 1.2

HUMAN DEVELOPMENT: A PRODUCT OF COMPLEX INTERACTIONS

To more fully appreciate the complexity of human development, respond to each of the following questions. After responding, read what is presented. Was this a surprise? Did it change your view? Does it highlight the interactive and complex nature of development?

- 1. Identical Twins: Identical twins share the same genetic makeup and thus share physical traits. Many have tried and proved successful in fooling friends and family who may confuse their identities. Can they fool a forensic specialist employing fingerprint analysis?
- 2. Sex Role Behaviors: Much has been written and discussed about the development of sex role behaviors. Some emphasize the cultural influence of boys learning to be boys and girls enculturated to be girls. Others have pointed to the influence of the unique XX and XY genetics. What is your position: nature (genetics), nurture (cultural influence), or perhaps something else?
- 3. The Adolescent Brain: It is likely that you have read about or heard discussions about the storm-and-stress nature of adolescence, which depicts adolescents as hormonally driven, emotional, unpredictable, and impulsive. Some have argued that the emotional and social liability and upheaval experienced in adolescence is a function of biological/hormonal changes, whereas others suggest that it is merely a function of adolescents' frustration of being socially in between childhood and adulthood. What is your position?

Here are some additional data for consideration. Does the following information reshape your initial opinions or expand your view of the complexity of these developmental issues?

- 1. Identical Twins: While identical twins could certainly be said to be genetic carbon copies, their fingerprints are not. Research shows that the fine details of ridges, valleys, and swirls that define one's fingerprints are influenced by random stresses experienced in the womb. Even a slightly different umbilical cord length can change one's fingerprints.
- 2. **Sex Role Behaviors:** Research provides evidence regarding the prenatal influences of gonadal steroids on human sexual orientation, as well as sex-typed childhood behaviors that predict subsequent sexual orientation. The evidence supports a role for prenatal testosterone exposure in the development of sex-typed interests in childhood, as well as in sexual orientation in later life, at least for some individuals. However, other factors. in addition to hormones, appear to play an important role in determining sexual orientation. These factors have not been well characterized, but possibilities include direct genetic effects and effects of maternal factors during pregnancy. Although a role for hormones during early development

has been established, there may also be multiple pathways to a given sexual orientation outcome, and some of these pathways may not involve hormones.

- 3. The Adolescent Brain: Some of the most exciting new discoveries in neuroscience focus on adolescent brain development. Researchers now know that the adolescent brain is different from an adult's brain and that development continues well into a person's 20s. One finding sheds light on the characterization of adolescents as dramatic and overly emotional.
- 4. Neuroscience research has shown that adolescents process information differently than do adults. While adults usually rely on the frontal lobes, the center of reasoning and language, to respond to situations, adolescents rely more on the amygdala, which controls a wide range of emotions. As a result, teens are more likely than adults to respond emotionally to a situation.

CASE ILLUSTRATION 1.7

The simple act of initiating crawling highlights the multidimensional and multidirectional nature of development as well as the unique contribution of biological and environmental forces. An infant's engagement in crawling not only signals amazing changes that have occurred but also serves as the source, or the impetus, for additional change to come. Crawling is evidence that the infant is strong enough to sit and to support himself or herself on hands and knees. Crawling indicates the infant's ability (and environmental support) for risk-taking, even when the risk is to trust one hand or one knee being placed one before the other. Once the infant is engaged, crawling contributes to the infant's ongoing development. Crawling contributes to the development of balance, to the practice of bilateral motion, and to the strengthening of muscles that will eventually be used in walking. The increased mobility afforded by crawling provides the

infant with increased, and sometimes scary, independence. Being able to move, sit, and hold the body stable and erect changes the infant's visual perspective and invites new experiences, which in turn stimulates new cognitive development. Increased mobility results in increased social interaction, such as playing with the family pet or siblings or responding to parents and caretakers who encourage the infant to crawl while at the same time remove obstacles and potential danger.

Reflect on the following: What appears to be such a small thing moving—from sitting up, to learning and trusting to rock back and forth, to eventually finding the ability to push off one's knees in order to become a crawler—is anything but simple or small. The effects of engaging with these new competencies impact physical development, cognitive development, social engagement, and even development of a worldview with its joys and risks.

Case Illustration 1.1 is certainly simple but, upon reflection, dramatically poignant. The subtle yet impacting interplay between the infant's internal drives, developing muscles, perceptual awareness, environmental supports and encouragers, and the leap of faith exhibited in those first few movements speaks to the multifaceted and multidimensional nature of our development. Further, in reviewing the illustration of the crawling infant it becomes apparent that often these forces are bidirectional, where the biological influences can affect the development of the cognition and vice versa.

This bidirectional quality becomes apparent when one considers what is required and what results from developing the ability to speak, to reflect on one's own thoughts, to balance and ride a two-wheeled bike, or to feel sympathy, empathy, or loss. Each of these new abilities serves as both the result of the complicated process called development and at the same time is the stimulant, contributor, and even foundational element for what is to follow.

Development: A Lifespan Perspective

There was a time when we viewed children as merely miniature replications of adults. Early pictorial presentations of children, at least those before the 17th century, showed them in adult dress, with eerily adult facial features—truly mini adults. It has been argued that the idea of *childhood* was a social creation that appeared during the 1600s (Cunningham, 2006). It is not until the 1600s that we see evidence of children being presented as unique and different from adults. Thus, the study of human development, prior to the 1600s, would have focused simply on the adult experience, generalizing that experience to children as miniature expressions of adults. It could be argued that, somewhat reactively, once childhood was viewed as a unique stage of development, the pendulum swung too far to the emphasis of childhood experience as if development ended with one's passage to adulthood from adolescence.

We now understand that while these early years and experiences are critical, they are not the entire story. As will be presented in the upcoming chapters, research has provided us with ample evidence of the continuing nature of our development. Our developmental journey and the changes encountered as we move from childhood to old age are not merely changes of quantity but changes in quality.

Cognitively, for example, an adult not only has more information stored (i.e., quantity) but is also able to employ that information in ways (e.g., hypothetico-deductive reasoning) that are qualitatively different from those used by a school-age child. Similarly, the socioemotional motives that drive people in their 30s are qualitatively different from those that direct life and decisions for people in their 70s. Our development (i.e., the adjustments we make and the changes we experience) is truly a lifelong process (Charles & Carstensen, 2010; Hoyer & Roodin, 2009).

Lifespan: A Series of Human Developmental Periods

In the upcoming chapters, you will see how the interplay between biological, cognitive, and socioemotional processes that impact development takes on unique characteristics as defined by specific time frames within a person's life. These time frames, or developmental periods, are marked by the appearance of unique features, tasks, capabilities, and challenges. For the purposes of this text's organization, we have identified 11 periods where developmental changes and challenges appear to be somewhat unique. Table 1.2 provides a classification of these periods of human development.

As you scan these periods of development, begin to consider the challenges, those tasks encountered by an individual at each period, and the role that you, as counselor, could play in facilitating the individual's development through that period. Your thoughts on these issues will take greater form as you proceed in your reading.



PHOTO 1.2 The journey of human development, from infancy to elderhood, continues to evolve during the lifespan.

Source: Stockphoto.com/Tana26

Development as Contextual

While Table 1.2 points out some generalized tasks or challenges confronting individuals at each period of their development, the nature of the challenges as well as the quality of the responses can be influenced by the context in which the development is occurring. Simply consider the situation of two individuals entering a late adult period of their development. Imagine that one has a healthy retirement plan, wonderful physical health, the support of an intimate partner and extended family, and job-related health benefits. Addressing the tasks of this period will be different for that individual as opposed to one who is without family support, living on Social Security and food stamps, and has to employ emergency hospital services as his or her only form of health care. These are contextual variables, and they clearly impact the continuity of development.

Whether it is our local neighborhood or global community, our development occurs and is influenced by the setting and conditions as context. Factors such as culture, ethnicity, social values, histories, and economics come into play in the unfolding of our personal stories. We are developing, but we as people of the 21st century are developing in a different context than that of our **ancestors**. As such, when viewing development, one must appreciate the influence that context contributes.

According to Baltes and Smith (2003), context exerts three types of influences on human development: (a) normative age-graded influence that presents individuals as similar to those within their age group; (b) normative history-graded influences, such as the widespread impact of major sociopolitical events like world war, the civil rights movements, or even the terrorist attacks of September 11, 2001; and (c) nonnormative or highly individualized life events, such

TABLE 1.2 Periods of Human Development

Period	Estimated Age Range	Description
Conception/ prenatal	0	Period involving rapid and extensive growth from a single cell to a human with neurological capabilities
Infancy	Birth to 24 months	While highly dependent, the development of language, symbolic thought, social skills, and modeling takes place
Toddler	1 to 3 years (overlap)	Increasing mobility and independence; "the terrible twos"
Early school age	4 to 6 years	Increasing self-sufficiency, peer interest and interaction, and school-readiness skills
Middle childhood	7 to 12 years	Achievement drive becomes evident; the fundamental skills of reading, writing, and arithmetic are mastered
Early adolescence	13 to 18 years	Rapid physical changes and the development of sexual characteristics; increased peer interaction and influence; cognitively moving into formal, abstract reasoning
Late adolescence	19 to 25 years	The pursuit of independence (socially, psychology, and financially) and desire to identify vocational direction and personal identity
Early adulthood	26 to 35 years	Focus on establishing personal and economic independence, career development, and, for many, selecting a mate, possibly starting a family, and rearing children
Middle adulthood	36 to 50 years	While maintaining a satisfying career, interest turns toward social responsibility and in assisting the next generation
Late adulthood	51 to 75 years	Adjusting to post-work identity and retirement; adjusting to challenges of changing health
Elderhood (oldest-old)	≥75 years	Reflection and life review; preparing for the end of life

as the death of a loved one, the experience of being abandoned or abused, or even something like winning the lottery.

LIFE DOMAINS OF HUMAN DEVELOPMENT

As you proceed in your readings, you will see that the upcoming chapters discuss development by way of reviewing the theories and research targeting specific domains of development within the context of a particular developmental period. These domains refer to specific aspects of growth and change as noted in socioemotional, physical, linguistic, and cognitive development.

There are times when it appears that growth in one domain is dominant, even to the point of overriding development in other domains. For example, consider the case of the crawler who almost magically transitioned to taking her first steps. While the physical

expression of this child's development may gather attention, the truth is that other domains are changing, perhaps more gradually and less prominently but changing nonetheless. The child's new physical capabilities interact and benefit from improved sensory perception and stimulate increasing cognitive development by way of infusion of new experiences. Change across domains is occurring often but sometimes not in obvious ways.

Consider the changes accompanying adolescence. While one can see and most certainly experience the physical changes (deepening of the voice, **physical development**, body hair growth, etc.) and emotional liability (adolescent moodiness) that accompany puberty, the cognitive changes that are occurring may be less apparent. Changes that are qualitative in nature provide the adolescent with an increasing ability to think about his or her own thinking and to operate in the world of the hypothetical.



PHOTO 1.3 Healthy lifestyles, including good nutrition, contribute to a healthier longevity.

Source: Digital Vision/Photodisk/Thinkstock.

Development is a multifaceted process consisting of growth, regression, and change in many different domains. Understanding the uniqueness of these changes across domains, as they take form at different chronological periods of development, is essential if counselors are to know what is *normative* and what to do when help is needed.

A BIOPSYCHOSOCIAL APPROACH

For years, the question of the degree to which our development is the product of our biological inheritance or our lived experience has been debated. The question of nature (biological forces) versus nurture (environmental/experiential/learning forces) and the influence of each continues to rear its head, especially when addressing issues of intelligence and behavioral aberrations. Do we simply write off developmental variations and deviations as a function of the luck of genetics, positioning ourselves somewhat impotently on the sidelines and allowing nature to run its course? Or do we argue for sociopolitical and environmental changes that will ensure the proper nurturance for all in the human condition? Is it really that simple: either nature or nurture? Review of the literature and research outcomes tells us that it is not.

As noted above, human development is complicated. Development is multifaceted, multidimensional, and contextual. Our development is, at any one point, the result or outcome of the interaction of biological, cultural, and uniquely personal factors (Baltes, Reuter-Lorenz, & Rösler, 2006). As such, development should be viewed and studied from an interactive perspective valuing the influence of biology, psychology, and social context in the same environment.

In the upcoming chapters, the unique biological conditions, cognitive capabilities, and psychosocial and emotional dispositions characteristic of a specific period of development are discussed. Further, research highlighting the factors both positively and negatively affecting development through that period of one's life will also be discussed. Throughout each chapter, the unifying theme is that changes occurring in any one domain do not happen in isolation; rather, each affects the other, and the outcome of development is the result of the interplay between these various factors. This integrative model is not new.

George Engel (1980) was one of the pioneers in bringing an integrative model to the field of medicine. Engel (1980) formulated the biopsychosocial model as a dynamic, interactional view of human experience in which there is a mutual influence of mind and body, by way of the interactive forces found within the biological, psychological, and sociocultural systems.

Consider the issue of heart disease (Engel, 1977). While it is true that there is a **pathophysiological** component to heart disease (biological system), this biological state is often the end point of a large variety of sociocultural and psychological factors impinging on the **cardiovascular system**. Thus, it is important to view the condition not only from a perspective of the client's genetic vulnerability or biological makeup but also through the perspective of social and cultural conditions (e.g., poverty, nutrition, marginalization, etc.) or psychological dispositions (e.g., lifestyle choices, stress encounters, and stress management strategies). It is in employing all systems—biological, psychological, social, and cultural—that one gets a full and accurate understanding of what is and what needs to be done.

Biological System

The biological system, as we know it, consists of a group of organs that work together to perform certain tasks. When applied to the biopsychosocial model, the need is to investigate how the biological or neurological basis affects human growth and development with respect to behavioral issues—that is, how each individual responds to his or her world or has different levels of neurotransmitters in the brain. As such, the biological component of the biopsychosocial model seeks to understand how the functioning of one's body, or biological system, contributes to the developmental difficulties encountered.

Psychological System

The psychological component of the biopsychosocial model looks for potential contributions from psychological issues that have caused or contributed to developmental difficulty and result in mental and physical health problems, including issues such as **irrational thinking**, emotional distress, lack of self-control, and **excessive distress** (Ilham, 2000).

Sociocultural System

The social system aspect of the biopsychosocial model directs one to consider how various social contextual factors, such as social environment, interactive patterns, socioeconomic status (SES), culture, family structure, and religion, contribute to healthy or unhealthy development. The social system draws attention to the effects of patterns of social roles and norms as well as the timing and sequence of important life events.

Application to Counseling Skills

The perspective gained from such a biopsychosocial model of development is that normative growth and development, as well as pathology, is influenced by a number of factors. For example, age-graded sociocultural factors (race, ethnicity, family, educational setting, friendships, religion,

peer pressure, etc.), age-graded biological factors (puberty, maturation, menopause, etc.), historical factors (natural disasters, wars, etc.), and nonnormative factors (death of siblings, death of a child, early death of parents, etc.) contribute to the formation and development of any one individual at any one of his or her developmental periods.

This integrative approach parallels what we know about the multidimensional and integrative nature of development and thus will be integrated throughout the upcoming chapters of this book. While investigating the uniqueness of the human experience as encountered at each of the periods of development, the focus will remain on understanding the interplay of the biological, psychological, and social and cultural processes contributing to that uniqueness and promoting growth and development through that particular period. It is our belief that understanding of lifespan development in the absence of its biological substrate, psychological components, and sociocultural context is not possible. This is brought to life in the presentation of Charlie's case (Case Illustration 1.2).

HUMAN DEVELOPMENT KNOWLEDGE APPLIED TO COUNSELING

The noted developmental psychologist, Lawrence Kohlberg, believed that counseling is important for the development of both the counselor and the client. Kohlberg's explanation for this relationship was established in his moral development theory, originating from his earlier work and writings on **moral development** and moral education that was applied to the process of schooling, particularly as it relates to teaching and not counseling. After studying Jean Piaget's views on the **cognitive development** of children's thinking about the physical world, Kohlberg asserted that all the basic processes involved in physical cognition in stimulating developmental changes are fundamental to social development (Kohlberg, 1969). He further asserted that the counseling process between a counselor and a client is a fundamental social activity, and thus, this process should be considered a developmental process of social interaction. Kohlberg also believed that the skill of listening requires the empathy and role-taking that are important for both moral and psychological growth between the counselor and the client. Kohlberg offered the view of **progressivism**, which encourages the nourishment of the individual's natural interaction with a developing society or environment and cognitive-developmental psychology as compared to other theories offered.

While the case has been made for the value of a counselor's understanding of human development, as he or she differentiates that which is normative from that which is problematic, what might also be obvious is that knowledge of those factors impeding development positions a counselor to serve as an advocate or agent of prevention.

As you read on and begin to identify those biological, cultural, environmental, and psychological forces that influence one's development, it will become clear that some individuals, by nature of their conditions of birth or circumstances of life, are more vulnerable to the interferences of healthy development. Whether it is the absence of prenatal medical care and nutritional support or the bullying violence experienced by a teen, some individuals encounter stressors that exceed their ability to cope and thus impede development. Environmental pollution, infectious diseases, poverty, the absence of early childhood stimulation, or the experience of abuse and abandonment are only a few of the more dramatic forms of assault to human development that many people experience. While these are noted and noteworthy, there are threats that can be much more subtle yet just as insidious. Consider the situation of a student experiencing undue pressure to succeed, or the young adult displaced without social support, or the aging adult confronting physical limitations and medical needs within restricted financial resources. All of these conditions restrict individuals' ability to enjoy their current state of development and grow to the next.

CASE ILLUSTRATION 1.2 BIOPSYCHOSOCIAL CONSIDERATIONS

The following case illustration demonstrates and highlights the biopsychosocial model as it depicts the elements contributing to the client's well-being. As you read the case illustration, highlight the biopsychosocial variables that you feel contribute to Charlie's depression, anxiety, and other concerns. Discuss your observations with a colleague or your instructor.

Charlie's Case

Charlie is a 28-year-old Caucasian female presenting with symptoms of possible depression and anxiety. Charlie reports that her boyfriend, Jack, asked her to marry him 2 months ago, but she has not yet accepted the proposal. Ever since, she has been feeling anxious, overeating, and sleeping 10 to 12 hours at a time. Charlie has been withdrawn from her friends because she knows that they do not support her relationship with Jack, as they believe that he is an alcoholic and has abused her. She also lacks interest in her work, has been taking numerous days off, and has demonstrated very low performance on her job duties. Charlie grew up in a very rigid and religious family. She states that her parents are very supportive of her, but they were always very critical toward her while she was growing up. Her father is very authoritative, and he is also a heavy drinker. While drunk, he often exhibits extremely violent and abusive behavior toward his wife and Charlie. Charlie's relationship with her mother is strained because she is critical of her father's behavior and often voices her disapproval of her father's actions toward her mother. Charlie reports that her relationship with Jack has been rocky, with multiple breakups and a history of heated augments. Jack becomes extremely violent when intoxicated, and it reminds her of her father's behavior and how that affected her family. Charlie's religious beliefs cause her to feel guilt over her father and Jack's drinking problems. She reports having a few good friends whom she sees "from time to time." She expresses that she can "rely on them to vent her frustrations" but has recently "pulled back from them" because they do not approve of her relationship with Jack. Charlie and Jack have a history of domestic violence. She reported one incident of domestic violence to the police, in which Jack was arrested and referred to participate in anger management counseling. Although there has not been an incident since then, Charlie is worried that he might do it again when he drinks. Charlie reports no homicidal ideation, plan, or intent to do so. She also denies any personal alcohol or substance abuse.

In summary, Charlie is presenting symptoms of depression and anxiety. The symptoms and findings are prominent and clinically significant: oversleeping, overeating, isolative behavior, and feelings of anxiety. The symptoms are relatively acute. Protective factors include a supportive mother and friends, as well as Charlie's insight and motivation for treatment. Significant biopsychosocial stressors absences from work and her relationship with her supervisor and coworkers. Other stressors include her relationship with her boyfriend, Jack, and her traumatic experience while growing up with an abusive alcoholic father, a demanding mother, and also a history of domestic violence with her father and her boyfriend.

 You may want to use this case for roleplaying activities in class and for discussion purposes.

As you begin to more fully understand the natural challenges experienced throughout the various periods of development, you will also come to appreciate those factors and elements that can facilitate and support healthy growth and development. With that knowledge, you will be better positioned to not only intervene as a counselor when called upon but also to proactively engage as an advocate for those who need your support.

The objective of this textbook is to present human growth and development from a counseling perspective and to show how this unique perspective can be applied through the lifespan of individuals. As discussed in this chapter, to define human development is to define the growth of humans throughout their entire lifespan. The principle of the study of human development is to understand and explain how and why people change throughout the lifespan, and this includes all aspects of human development, including psychological, physical, emotional, intellectual, social, perceptual, and personality development. These are all variables to be taken into consideration for effective therapeutic intervention. There is an urgent need to augment research in these areas and place this knowledge in the hands of educators and students.

Understanding human development is important for having a clear concept of how factors such as individuals' experiences, life maturation processes, and changes in time, including cultural implications, shape the stages of human development. This process also includes (a) how individuals cope with and make sense of their environment and surroundings; (b) how individuals use their learning experiences to cope with adversity and stress; (c) how individuals develop resilience and coping skills affected by gender, cultural, physical, psychological, and sociological factors; (d) how individuals behave and perceive life expectations; and (e) how life events and changes, transitions, and transformations form from one stage to another to contribute to individuals' identity and integration into their community and society. This is a complex process with multiple factors that are all equally important, and they need to be emphasized not only during counselor training but also during counseling practice.

Human development awareness is about creating an environment in which people can develop their full potential and have a healthy, active, creative, and productive lifestyle. The advancement of science and technology has contributed greatly to the acceleration of human progress during the past decades. According to many recent studies, although modernization and globalization, with the advancement of technology, are generally good for societies, they can also create many disadvantages for some sectors of the population. Some individuals are more vulnerable to the wider effects of environmental degradation and social problems because of more significant stressors and fewer coping tools that weaken resilience. Vulnerable individuals must also deal with threats to their immediate environment from pollution, contaminated water, and unimproved sanitation. Forecasts suggest that a continuing failure to reduce grave environmental risks and deepening social inequalities threatens to slow decades of sustained progress by the world's poor majority and can even reverse the global convergence in human development. This is perhaps an urgent warning to develop and strengthen the safety networks of society to make sure that they reach everyone and prevent the physical and mental decline of all people. The counseling profession, with its many roles such as working with, assisting, and advocating for its clients, also has a responsibility to act and contribute.

The challenges ahead for counselor education are numerous. However, significant challenges are to conduct more evidence-based research to study this very complex topic of the relationship between counseling and human development through the lifespan; to conduct research with cultural responsibility in reference to the increased cultural and ethnic diversity among populations in the United States; and to explore and study the interaction among learning, physical ability, cultural influence, SES, environmental and ecological factors, genetic composition, and biopsychosocial implications with respect to human development through the lifespan.

The world has become a global community, and the proliferation of cultural and knowledge exchange among peoples and nations has provided great incentives for researchers and scholars to study human development from a multidimensional and multilevel perspective, with respect to cultural, psychological, and sociological factors. It is very important for helping professionals, such as counselors, to continue to apply and promote the study of human

development through the lifespan today and in the future. It is essential not only to understand human development in order to understand the individual but also to acquire knowledge of individual differences, abilities, disabilities, and other diverse characteristics that can enhance and optimize the outcome of counseling services.

SUMMARY

- Human development is an interdisciplinary field dedicated to understanding human constancy and changes throughout the lifespan.
- The study of human development requires a comprehensive and systematic approach.
- The study of human development involves the explanation of both change and continuity.
- The field of human development has four major goals: (a) to describe the changes that occur across the human lifespan, (b) to explain these changes, (c) to predict developmental changes, and (d) to intervene in the course of events in order to control them.
- It is important to discuss human development through the lifespan perspective, consisting of the multidimensional, multidirectional, multidisciplinary, plastic, and contextual development of humans.
- The domain of human development refers to specific aspects of growth and change, and the major domains of development include psychosocial, emotional, physical, language, and cognition.
- Understanding human development is important to the counselor's competence because this knowledge will enhance the counselor's ability to apply best practices during the particular life stage of the client and to serve as an advocate for those in need of advocacy.

ADDITIONAL RESOURCES

The following resources include readings and websites that may be useful to readers in their search for more information and in-depth knowledge on human development and the lifespan. However, readers should be aware that the information found on websites may not always be reliable and should be verified before the source is used as a reference.

Websites

United Nations

https://www.un.org/en/

The United Nations (UN) is an international organization whose stated aims are to facilitate cooperation in international law, international security, economic development, social progress, human rights, and achievement of world peace. The UN was founded in 1945 after World War II to replace the League of Nations, to stop wars between countries, and to provide a platform for dialogue. It contains multiple subsidiary organizations to carry out its missions. The UN currently has a total of 193 member states.

World Bank

https://www.worldbank.org

The World Bank is an international financial institution that provides loans to developing countries for capital programs. The World Bank's official goal is to reduce poverty around the world. The World Bank differs from the World Bank Group in that the World Bank comprises only two institutions, the International Bank for Reconstruction and Development (IBRD) and the International Development Association (IDA), whereas the latter incorporates these two in addition to three more: the International Finance Corporation (IFC), the Multilateral Investment Guarantee Agency (MIGA), and the International Centre for Settlement of Investment Disputes (ICSID).

National Association of School Psychologists

https://www.nasponline.org

The mission of the National Association of School Psychologists (NASP) is to empower school psychologists by

advancing effective practices to improve students' learning, behavior, and mental health. The core values of NASP are advocacy, collaborative relationships, continuous improvement, diversity, excellence, integrity, student-centered priority, and visionary leadership.

Council on Social Work Education

https://www.cswe.org

The Council on Social Work Education (CSWE) is a nonprofit national association representing more than 2,500 individual members, as well as graduate and undergraduate programs of professional social work education. Founded in 1952, this partnership of educational and professional institutions, social welfare agencies, and private citizens is recognized by the Council for Higher Education Accreditation as the sole accrediting agency for social work education in the United States.

Centers for Disease Control and Prevention

https://www.cdc.gov

The Centers for Disease Control and Prevention (CDC) is a federal agency under the U.S. Department of Health and Human Services. The CDC is headquartered and based in Atlanta, Georgia. The CDC works to protect public health and safety by providing information to enhance health decisions, and it promotes health through partnerships with state health departments and other organizations. The CDC focuses national attention on developing and applying disease prevention and control (especially infectious diseases and foodborne pathogens and other microbial infections), environmental health, occupational safety and health, health promotion, injury prevention, and education activities designed to improve the health of the people of the United States. The CDC is the United States' national public health institute and is a founding member of the International Association of National Public Health Institutes.

Council for Standards in Human Services Education

https://cshse.org

The Council for Standards in Human Service Education (CSHSE) is committed to assuring the quality, consistency, and relevance of human service education through researchbased standards and a peer-review accreditation process. The vision of CSHSE is to promote excellence in human service education, provide quality assurance, and support standards of performance and practice through the accreditation process.

Council for Accreditation of Counseling and Related **Educational Programs**

https://www.cacrep.org

The Council for Accreditation of Counseling and Related Educational Programs (CACREP) accredits graduatelevel counseling programs offered by institutions throughout the United States and some international programs. CACREP accredits many programs, including addiction counseling, clinical mental health counseling, family counseling, school counseling, and rehabilitation counseling. The vision of CACREP is to provide leadership and to promote excellence in professional preparation through the accreditation of counseling and related educational programs. As an accrediting body, CACREP is committed to the development of standards and procedures that reflect the needs of a dynamic, diverse, and complex society.

National Institute on Aging

https://www.nia.nih.gov/health/topics/healthy -aging

The National Institute on Aging (NIA), one of 27 National Institutes of Health (NIH) institutes and centers, leads a broad scientific effort to understand the nature of aging and to extend the healthy, active years of life. In 1974, Congress granted authority to form NIA to provide leadership in aging research, training, health information dissemination, and other programs relevant to aging and older people.

Annenberg Learner

https://www.learner.org

Annenberg Learner uses media and telecommunications to advance excellent teaching in American schools. This mandate is carried out chiefly by the funding and broad distribution of educational video programs with coordinated web and print materials for the professional development of K-12 teachers. It is part of the Annenberg Foundation and advances the foundation's goal of encouraging the development of more effective ways to share ideas and knowledge. Annenberg Learner's multimedia resources help teachers increase their expertise in their fields and assist them in improving their teaching methods. Many programs are also intended for students in the classroom and viewers at home. All Annenberg Learner videos exemplify excellent teaching.

RECOMMENDED SUPPLEMENTAL READINGS

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