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## **Psychosocial Adaptation to Disability Within the Context** of Positive Psychology: Philosophical Aspects and Historical Roots

Hanoch Livneh<sup>1</sup> · Erin Martz<sup>2</sup>

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**Abstract** *Purpose* The purpose of this article is to review the conceptual and clinical similarities that exist between the principles of positive psychology and those underlying rehabilitation counseling and psychology, occupational rehabilitation, and those espoused by the field of psychosocial adaptation to chronic illness and disability (CID). Methods Three themes were selected for review. These included the historical contributions of early scholars in the area of psychosocial adaptation to CID that later were indirectly infused into mainstream positive psychology; state and trait constructs that constitute much of the infrastructure of positive psychology and psychosocial adaptation to CID; and, finally, the philosophical congruencies between positive psychology and psychosocial adaptation to CID. Conclusion The existing literature indicates that there is a substantial philosophical and conceptual overlap between the fields of positive psychology and psychosocial adaptation to CID. Since theoreticians and researchers, from both fields, often use differing terminology and definitions to describe similar concepts, as well as seek similar research goals, it would behoove both fields to seek a closer partnership in order to establish a meaningful dialogue that focuses on human strengths and virtues in the lives of people with CID.

**Keywords** Positive psychology · Psychosocial adaptation to chronic illness · Disability

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The field of positive psychology, which has witnessed an exponential growth in both scope and depth over the past 15 years, owes its "formal birth" to the work of Martin Seligman and his colleagues [1-3]. They described positive psychology as a field that focuses on building positive qualities among people and that studies what makes normal people flourish, and further noted that positive psychology reflected a viewpoint of humans "as self-organizing, selfdirected, adaptive entities" [3, p. 8]. Yet, we would be remiss, indeed flagrantly misinformed, if we did not recognize the earlier contributions to this field by such historical psychological scholars as Maslow [4], Rogers [5], Frankl [6], and Vaillant [7], and more specifically to the field of rehabilitation psychology, the work of Wright [8] and Vash [9, 10]. The seminal work of the above researchers has been just as "positively-valenced" in its view of the human spirit and its ability to transcend adversity and stressful life events, as that of the much later work of Seligman and colleagues. The immense growth of positive psychology since the late 1990's, as is evidenced in the many books, book chapters, monographs, and journal articles [including several special journal issues on positive psychology, such as those that appeared in American Psychologist (2000), Review of General Psychology (2005), and in the field of rehabilitation, Rehabilitation Research, Policy, and Education (2013), as well as the present issue], however, must be attributed to the wellorganized, domain-focused, and energetic efforts of Seligman and his colleagues.

Our task in this paper, however, is not to trace the roots of the field of positive psychology as it is currently viewed, practiced, and researched. Instead, our aim in this paper is three-fold. First, in order to establish a linkage between two fields, we briefly pay tribute to the historical contributions of "positively-valenced" rehabilitation professionals to the field of adaptation to disability. Second, we briefly discuss the issue of examining state versus trait constructs in the context of positive psychology and adaptation to disability. Third, we discuss shared, but distinctive philosophical congruency between positive psychology and psychosocial adaptation to disability.

#### Early Contributions by "Positively-Valenced" Psychologists to Psychosocial Adaptation to Disability

The modern understanding of adaptation to disability [11] was heavily influenced by two early rehabilitation professionals, whose work can best be regarded as representing positive psychology philosophy. Foremost among them is Beatrice Wright [8, 12, 13]. In her work, Wright emphasized the importance of what is now recognized as cornerstones of the positive psychology movement, namely, positive value changes following trauma or loss, and the supremacy of positive coping over succumbing to one's disabling condition, as indicative of successful adaptation. Wright and colleagues [8, 12] coined the phrase "value changes in acceptance of disability" [8, p. 157]. In their ensuing model of disability acceptance (or acceptance of loss), the authors viewed acceptance as signaling a positive course of psychosocial development where the person with a disability regards the incurred loss as a "nondevaluating" [8, p. 163] aspect of life with disability. From that initial premise, Wright and colleagues established their now highly influential four-component system of value changes necessary for successful adaptation to disability. Briefly, the system is comprised of the following threads: (a) Enlarging the scope of values (i.e., expanding one's interests, pursuits and beliefs to include those not affected by the presence of disability); (b) subordinating physiquelinked values to other values (i.e., minimizing the importance associated with appearance and physical abilities, and instead maximizing one's personality, social interests, mastery, spiritual pursuits and the ways one can contribute to society); (c) containing disability effects (i.e., restricting the impact of any negative disability implications and combating the "spread" phenomenon); and (d) transforming from comparative to asset, or inherent, values (i.e., focusing on one's remaining capabilities and assets rather than on comparisons with others or pre-disability set standards) [8].

Wright [8] equates successful acceptance of disability, as exemplified by adoption of the four-part value change framework, with adjustment and personal maturity, and furthermore, as demonstrating that the person now possesses such characteristics as responsibility, self-worth, independence, productivity, and conscientiousness. In their totality, these value changes, when infused successfully into one's psychosocial framework, are reflective of the person with disability's success in overcoming and transcending the potentially pernicious effects of the disability and charting a new course of life.

The second important contribution made by Wright is that of contrasting coping and succumbing as two cardinal ways of responding to disability onset [8, 14]. Granted, many earlier efforts to view human nature (e.g., traits, behaviors) as anchored in dichotomies have fallen out of professional grace over the past several decades; yet, Wright's views still command much attention half a century after their inception. In her overall framework, succumbing is closely aligned with traditional non-adaptive, indeed psychopathological, functioning by the person with disability. It exemplifies the negative impact of disability, and is typified by such features as passivity, negativity, and a devalued life. Implicit in succumbing is the concept of "spread" where the individual with disability is reduced to focusing on, and even exaggerating, the negative impact of the condition on his or her daily life activities (note that the term "spread" has a dual definition, which may also be understood as a process by which individuals without disabilities view an individual's disability as the primary characteristic of an individual or as a 'master status' that defines whom the individual is). In contrast, the coping framework can be regarded as a robust precursor to the positive psychology ideology. It focuses on the successes and achievements of the person with disability, and emphasizes such characteristics as activity, intrinsic belief in personal control, ability to change one's life and environmental restrictions, problem-solving, hope, and lifesatisfaction (all of which nowadays are cornerstones of the positive psychology framework). The coping individual, therefore, appreciates his or her life accomplishments and gains satisfaction from their inherent value (i.e., adopts the asset value approach to live). He or she, further, successfully manages difficulties encountered during daily activities by eliminating environmental, societal, and attitudinal barriers, and by learning and maintaining new skills. Life with disability, therefore, becomes meaningful as the person with disability participates in valued activities and lives life to its fullest [8, 14].

The second prominent contributor to the pre-positive psychology, psychosocial adaptation to disability movement is Vash [9, 10]. In her work, Vash was one of the first rehabilitation professionals to emphasize the salience of such concepts as spirituality, transcendence, and independence when learning to appreciate the lives of people with disabilities. She thoughtfully discussed the importance of love, partnership, intimacy, sexual relationships, work, and recreation to the lives of people with disabilities. Almost 20 years prior to the formal introduction of positive psychology by Seligman and his coworkers, Vash recognized the significance of transcending the restrictions imposed by disability as a prominent step in achieving successful adaptation. Vash regarded disability as a growth experience. More specifically, she posited that the onset of disability progresses along three broad "stages" which she termed: (a) Recognition of facts, or understanding the nature and extent of one's limitations; (b) acceptance of implications, or acknowledging the realities of one's condition; and (c) embracing the experience of disability, or recognizing and appreciating the fact that the existence of disability serves as a personal growth catalyst if permitted to be internalized as such. At the third "stage," the individual embraces the experience of disability with its full present and future implications, and views it as a "positively valued" opportunity [9, p. 151]. Moreover, embracing the opportunity for growth serves to further the person's spiritual capacity and positive outlook on life. Vash's view of transcendence is rather universal in its scope and includes the ability to rise above those physical and psychological restrictions imposed by the nature and severity of the disability itself, the attitudes and expectations placed by society, and early personal psychosocial reactions to the onset of the disability and others' attitudes. When, ultimately, the person with disability achieves transcendence, he or she is able to function at a higher level of consciousness, where experiences of love, fulfillment, enlightenment, and spirituality prevail [9, 10].

#### **State Versus Trait Constructs**

#### Variable Categorizations in Positive Psychology

One of the most daunting tasks one faces, when reviewing the bourgeoning literature pertinent to psychosocial adaptation to disability within the context of positive psychology, is sorting out the many situational determinants and resources, psychological or emotional states, personality traits (or predispositions), and group strengths that have been implicated as influential in predicting successful adaptation [11]. Adding to this difficulty is the appreciable conceptual and technical overlaps among several of the constructs used by positive psychologists (e.g., definitions of, and items used on the various scales to measure such constructs as optimism, hope, sense of coherence, wellbeing, life satisfaction, pursuit of happiness, self-efficacy, self-determination, mastery, and resilience) [1–3, 15, 26].

Before discussing issues related to using state versus trait constructs in adaptation to disability research, it is necessary to clarify the categories used by the leading positive psychologists, such as Seligman, Csikszentmihalyi, and Peterson [3, 15], since their definitions of these categories evolved over time. Seligman and Csikszentmihalyi [3] proposed three levels of positive psychology variables: the subjective, the individual, and the group level. First, they asserted that the subjective level is composed of variables "about valued subjective experiences" [3, p. 5], which include a wide range of variables, such as subjective well-being, life satisfaction, optimism, hope, happiness, resilience, spirituality, humor, and self-determination. Second, they stated that the individual level category contains variables "about positive individual traits" [3, p. 5], such as courage, perseverance, spirituality, and wisdom, among others. It should be noted that Seligman and his colleagues [2, 15, 26] expanded the list of positive psychology traits in their second category (the individual level) to include 6 virtues (i.e., wisdom and knowledge, courage, humanity, justice, temperance, and transcendence) and 24 character strengths. In the 2004 classification [15], "hope" was posited as a character strength (listed under the virtue called "transcendence"), in contrast to their previous categorization of "hope" as a subjective level variable [3].

Because positive psychology rehabilitation professionals focus on more specific disability-triggered states, strengthbuilding processes, and adaptive coping-like constructs such as meaning-making, benefit-finding, resilience, mastery, post-traumatic growth, and engagement coping [16– 25], the second category of individual-level variables defined by Seligman and colleagues is not relevant for the content of the present article for the reasons that will be explicated below. Their third category, which is the group level of variables (i.e., virtues related to civic matters and institutions that "move individuals toward better citizenship" [3, p. 5]), will not be considered further in this paper because these group level variables are broadly defined constructs that are not typically included in research on the process of adapting to a disability.

## State Versus Trait Variables in Adaptation Research

When examining the contributions of positive psychology to the field of psychosocial adaptation to disability, two important issues must be addressed. These are, first, the distinction between positive traits (i.e., character strengths, virtues) and positive personal states (i.e., positive emotions), and, second, the recognition that emphasizing human strengths and positive qualities in no way should be regarded as discounting human loss, pain, suffering, and difficulties in adapting to a disability.

The distinction between positive psychological traits and states, as practiced in the field of adaptation to disability, is of utmost theoretical and clinical implications. Positive (or, for that matter, any) personality traits (also called character strengths or virtues by Seligman and colleagues) are assumed, by definition, to have existed *prior* to the onset of disability, or any significant traumatic event. Their existence prior to disability onset, however, defies valid empirical study because the only route to assessing them relies heavily on pre-disability personal memories. The latter are often tainted, indeed distorted, by the experience of the disabling condition, an experience that is marred by many cognitive, emotional, physical and environmental influences that stem from disability onset.

In contrast, more fluid, or state-experienced, positive emotions (i.e., subjective experiences, in the jargon of positive psychology), which include more traditional engagement coping strategies (e.g., planning, cognitive reframing, using humor) and other ongoing positive coping efforts (e.g., benefit finding, meaning making, growth through adversity), are typically regarded as disabilitytriggered reactions. Because these positive reactions are of more recent origin and less subject to memory distortions, they are more accessible to empirical research and can be more accurately studied and measured.

From a rehabilitation perspective, the subjective negative emotions and experiences (broadly referred to as negative affectivity) that are often experienced after the onset of a chronic illness or disability should be viewed (with some exceptions) as a "state" reaction, not an inherent personality "trait", to a stressful, if not traumatic, event related to one's body and/or mind. The distinctions between state and trait variables should be kept in mind, especially when conducting occupational rehabilitation research among individuals with disabilities who wish to return to work. Many of these individuals may experience negative states or clinical symptoms in reaction to the onset of their disability, but as they garner internal and external resources, they also experience more positive states (i.e., positive affectivity), which can help them learn how to minimize the seemingly ubiquitous presence of disability-related issues and to focus on new goals and work choices in their lives.

It is also important to address the second issue related to recognizing strengths and positive emotions in the context of disability-related trauma. Although several communalities exist between the two fields of positive psychology and psychosocial adaptation to disability, they hold slightly different perspectives that are unique but mutually complementary. For example, there is a common emphasis on asset-based and/or holistic approaches in both fields. However, one distinction in psychosocial adaptation to disability is that rehabilitation clients often have experienced tangible, medically-based issues related to chronic illness or physical disability; this is not always the case of clientele who are helped by positive psychologists to face memories of past traumatic events, painful social experiences, or difficult family interactions.

Thus, in some ways, the trauma related to chronic illness and disability seems to provide a reality check to ideas that reflect positive psychology by acknowledging the tremendous impact of disability in terms of loss, pain, and suffering. While the original writings in the field of positive psychology appeared to downplay the impact of trauma on one's positive outlook partially by its shift toward character strengths and virtues [2, 15, 26], the more current positive psychology literature has integrated ideas related to examining how to flourish after traumatic events (e.g., the construct of post-traumatic growth; see Martz and Livneh's article in the present special issue). In contrast, rehabilitation philosophy for decades has emphasized the development of positive states, traits, and skills, while recognizing that individuals with chronic illnesses and disabilities can experience negative states (e.g., depression, anxiety) as they learn to adapt to their new conditions.

In summary, most variables included in positive psychology's category of individual character traits appear to emphasize stable personality characteristics (i.e., 'traits' rather than 'states'). While positive traits and virtues certainly can facilitate the development of positive outlook in the context of disability, it is important to note that when studying the process of adapting to disability, the emergence of negative and positive affectivity experiences should be viewed as reactions to disability onset, and thus are 'states' that can and do fluctuate. For these reasons, we suggest that the positive psychology category of subjective level (or subjective experience) variables most closely align with reactions or states typically studied in the *process* of adapting to chronic illness and disability.

#### Philosophical Congruency Between Positive Psychology and Adaptation to Disability

Positive psychology has received increasing attention from rehabilitation researchers [27–31]. There is a natural philosophical overlap between positive psychology and the psychosocial theories of adaptation to disability proposed in the fields of rehabilitation psychology, occupational rehabilitation, and rehabilitation counseling. Both positive psychology and rehabilitation psychology researchers highlight positive elements in individuals' multi-faceted experiences following the onset of disability, including resilience and growth after trauma (or adversity), both emphasize a strengths-based approach to psychological research and practice, and both "seek to empower individuals to enhance what is good rather than attend to what is adverse in their lives" [29, p. 208].

Diener [32, p. 10] argued that positive psychologists "maintain that often one form of solution to problems, and in some cases the most effective one, is to build the positive rather than directly work on the problem." This approach is congruent with perspectives taken by rehabilitation professionals, because this group understands that, in most cases, the fact or existence of a "problem" (i.e., a chronic illness or disability) cannot be changed; yet, individuals' perceptions and reactions to those issues can be managed by helping them adopt and fortify their strengths and abilities (i.e., 'build the positive'). Generally speaking, the existence of disabilities indicate that certain problems and restrictions cannot be solved or 'cured,' but rather, require psychosocial and behavioral adaptation, which can be attained by building a person's internal and external resources.

The use of positive psychology philosophy and terminology within the context of loss, pain, and disability is equally important. Critiques of positive psychology (e.g., [33–35]) typically maintain that positive psychology focuses, among other areas, on a simplistic ideology, vague terminology, a political "slogan-seeking" thrust, dangerously unrestrained positivity, and, at times, also lacks empirical support for its therapeutic claims. As more pertinent to the domain of adaptation to disability, positive psychology has also been accused of unrealistic optimism in the face of human misery and focusing on normalcy, perfection, and virtues while ignoring negative emotions and cognitions (that are, in the rehabilitation field, often triggered by the trauma of disability). Some researchers argue that the term "positive" should be dropped because "an understanding of the complete human condition requires recognizing that psychological traits and processes are not inherently positive or negative—whether they have positive or negative implications depends on the context in which they operate" [35, p. 11]. We, therefore, acknowledge that despite our focus in this paper on the merits and contributions of positive psychology to the field of rehabilitation in general, and more specifically to adaptation to disability, we are fully aware of positive psychology's theoretical limitations and its imbalanced perspective on the human condition, and particularly life following the onset of severe and life-threatening disabilities.

Compared to the strong theoretical orientation toward positive traits, characteristics, and virtues (the individual level) in positive psychology, rehabilitation researchers typically address a very specific trauma anchor, that is, the existence of a chronic illness and disability and its impact on many aspects of the intrapersonal and interpersonal aspects of individuals' lives. This focus on the unchangeable stressor of having a chronic illness and disability and how individuals can experience positive emotions as they adapt to that trauma is part of the theoretical origins of the rehabilitation field. The expansion of research in positive psychology has evolved to include concepts such as posttraumatic growth, meaning making, and benefit-finding in positive psychology, although they were not listed in Seligman and co-workers' original examples of subjective level constructs. However, there is common ground between the two fields in that both investigate how people can flourish despite living through or living with unpleasant, tragic, or traumatic events.

#### Summary and Implications for Researchers

This article provided an overview of the philosophical and conceptual overlaps between the fields of positive psychology and psychosocial adaptation to disability, in addition a brief exploration of the rehabilitation theories pre-dating numerous concepts in the field of positive psychology. In view of the aforementioned commonalities between the fields of positive psychology and psychosocial adaptation to disability, rehabilitation researchers should keep in mind the following three points:

- 1. Occupational rehabilitation researchers who plan to empirically investigate positive psychology constructs, in the context of disability, should first carefully examine whether parallel concepts or theories have been studied by rehabilitation psychology researchers using differing terminology and definitions. This will not only help researchers place their work in the appropriate rehabilitation context, but will also help to bridge the existing theoretical underpinnings between positive psychology and psychosocial adaptation to disability.
- 2. When designing studies, occupational rehabilitation researchers should be cognizant of the subtle distinctions between state and trait variables, especially when investigating disability-related variables through a positive psychology lens. Measuring state versus trait variables may provide distinct types of data, and consequently, differing answers to research questions. Further, as suggested above, research on adaptation to disability should focus on states, not traits, given that the process of adaptation involves fluctuating experiences of negative and positive emotions. Therefore, if variables from positive psychology are used in a study on the process of adaptation to disability, researchers should be careful to examine whether these variables are of state or trait nature (i.e., distinguish between the subjective and individual level categories).
- 3. While the early positive psychology concepts and the early rehabilitation theories were more global (or trait-oriented) in nature, modern empirical research demands tightly-defined constructs that are measured by instruments with sound psychometric properties. This suggests that researchers should appreciate the long-standing theoretical origins of these concepts, yet

be cautious in their assessment of the data obtained from the measurement of these constructs. To wit, researchers should carefully examine the nature and structure of the theory underlying these constructs, and ascertain whether these are state or trait variables. Furthermore, they should verify first if these are regarded as subjective or individual level variables according to positive psychology.

In conclusion, there have been significant theoretical advances in the fields of positive psychology and psychosocial adaptation to disability in the past decade. The existing research basis provides a fertile ground of possibilities for expansion beyond the traditional focus on pathology and the negative aspects related to the onset and existence of functional limitations in the lives of individuals with disabilities. Since employers typically hire individuals based on their skills and strengths, then occupational rehabilitation approaches that seek to build functional and vocational abilities and strengths, and that are informed by research on positive psychological concepts and adaptation to disability can be most valuable in facilitating individuals' return to work and successfully functioning in their communities.

#### **Compliance with Ethical Standards**

Conflict of interest There are no conflicts of interests to report.

#### References

- 1. Seligman M. What is the good life? APA Monit. 1998;29(10):2.
- Seligman ME, Steen TA, Park N, Peterson C. Positive psychology progress: empirical validation of interventions. Am Psychol. 2005;60(5):410–21.
- Seligman ME, Csikszentmihalyi M. Positive psychology: an introduction. Am Psychol. 2000;55(1):5–14.
- 4. Maslow A. Motivation and personality. New York: Harper and Row; 1954.
- Rogers CR. Client-centered therapy: its current practice, implications and theory. London: Constable; 1951.
- Frankl VE. Man's search for meaning. New York: Pocket Books; 1963.
- 7. Vaillant GE. Adaptation to life. Boston: Harvard University Press; 1977.
- Wright BA. Physical disability—a psychosocial approach. New York: HarperCollins Publishers; 1983.
- 9. Vash CV, Crewe NM. Psychology of disability. 2nd ed. New York: Springer; 2004.
- Vash CL, Hohmann GW. The psychology of disability. New York: Springer; 1981.
- Livneh H, Antonak RF. Psychosocial adaptation to chronic illness and disability. Gaithersburg, MD: Aspen Publishers; 1997.
- Dembo T, Leviton GL, Wright BA. Adjustment to misfortune—a problem of social-psychological rehabilitation. Artif Limbs. 1956;3(2):4–62.
- Wright BA. Physical disability—a psychological approach. New York: Harper & Row; 1960.

- 14. Wright BA. Coping with chronic illness and disability. Paper presented at the roundtable on coping with chronic illness and disability. 2007.
- Peterson C, Seligman ME. Character strengths and virtues: a classification and handbook. Washington, DC: American Psychological Association; 2004.
- Tran V, Wiebe DJ, Fortenberry KT, Butler JM, Berg CA. Benefit finding, affective reactions to diabetes stress, and diabetes management among early adolescents. Health Psychol. 2011;30(2): 212–9.
- Danoff-Burg S, Revenson TA. Benefit-finding among patients with rheumatoid arthritis: positive effects on interpersonal relationships. J Behav Med. 2005;28(1):91–103.
- Hart S, Vella L, Mohr D. Relationships among depressive symptoms, benefit-finding, optimism, and positive affect in multiple sclerosis patients after psychotherapy for depression. Health Psychol. 2008;27(2):230–8.
- Luszczynska A, Mohamed NE, Schwarzer R. Self-efficacy and social support predict benefit finding 12 months after cancer surgery: the mediating role of coping strategies. Psychol Health Med. 2005;10(4):365–75.
- Gangstad B, Norman P, Barton J. Cognitive processing and posttraumatic growth after stroke. Rehabil Psychol. 2009;54(1): 69–75.
- Park CL, Edmondson D, Fenster JR, Blank TO. Meaning making and psychological adjustment following cancer: the mediating roles of growth, life meaning, and restored just-world beliefs. J Consult Clin Psychol. 2008;76(5):863–75.
- 22. Camacho AA, Garland SN, Martopullo C, Pelletier G. Positive and negative meanings are simultaneously ascribed to colorectal cancer: relationship to quality of life and psychosocial adjustment. Palliat Support Care. 2014;12(4):277–86.
- deRoon-Cassini TA, de St Aubin E, Valvano A, Hastings J, Horn P. Psychological well-being after spinal cord injury: perception of loss and meaning making. Rehabil Psychol. 2009;54(3):306–14.
- 24. Davis CG, Morgan MS. Finding meaning, perceiving growth, and acceptance of tinnitus. Rehabil Psychol. 2008;53(2):128–38.
- Dunn DS. Well-being following amputation: salutary effects of positive meaning, optimism, and control. Rehabil Psychol. 1996;41(4):285–302.
- 26. Park N, Peterson C, Seligman ME. Strengths of character and well-being. J Soc Clin Psychol. 2004;23(5):603–19.
- Chou C, Chan F, Chan JYC, Phillips B, Ditchman N, Kaseroff A. Positive psychology theory, research, and practice: a primer for rehabilitation counseling professionals. Rehabil Res Policy Educ. 2013;27(3):131–53.
- Buntinx WH. Understanding disability: a strengths-based approach. In: Wehmeyer ML, editor. Oxford handbook of positive psychology and disability. Oxford: Oxford University Press; 2013. p. 7–18.
- 29. Chou C, Lee E, Catalano D, Ditchman N, Wilson L. Positive psychology and psychosocial adjustment to chronic illness and disability. In: Chan FE, Da Silva-Cardoso EE, Chronister JA, editors. Understanding psychosocial adjustment to chronic illness and disability: a handbook for evidence-based practitioners in rehabilitation. New York, NY: Springer; 2009. p. 207–42.
- Dunn DS, Uswatte G, Elliott TR, Lastres A, Beard B. Positive psychology of physical disability: Principles and progress. In: Kennedy P, editor. Oxford handbook of rehabilitation. Oxford: Oxford University Press; 2013. p. 427–41.
- Shogren KA. Positive psychology and disability: a historical analysis. In: Wehmeyer ML, editor. Oxford handbook of positive psychology and disability. Oxford: Oxford University Press; 2013. p. 19–33.

- Diener E. Positive psychology: past, present, and future. In: Snyder CR, Lopez SJ, editors. Oxford handbook of positive psychology. Oxford: Oxford University Press; 2009. p. 7–11.
- Fernández-Ríos L, Pérez MN. Positive pychology:" Zeigeist"(or spirit of the times) or ignorance (or disinformation) of history? Int J Clin Health Psychol. 2012;12(2):333–44.
- Lazarus RS. Does the positive psychology movement have legs? Psychol Inq. 2003;14(2):93–109.
- McNulty JK, Fincham FD. Beyond positive psychology? Toward a contextual view of psychological processes and well-being. Am Psychol. 2012;67(2):101–10.