Chapter 3
Multicultural Considerations in Measurement and Classification of Positive Psychology

Cristalis Capielo, Lauren Mann, Bailey Nevels, and Edward Delgado-Romero

Ligaya is a 33 year-old Filipina attorney practicing in a large northeast metropolitan area. Despite Ligaya's professional successes, she often feels lonely and guilty. Ligaya immigrated to the U.S. in her mid-twenties to attend law school, but her immediate family is still in the Philippines. She is currently single and living with a female roommate who is her best friend from Law School. Ligaya has many friends and a good support network at her job. Her friends tell her she has bright future ahead of her and should enjoy being single. In contrast, whenever Ligaya calls home, her mother is critical that she is single and insists that she should meet a man and get married or return home to the Philippines. According to Ligaya's family, she should have married long ago, and the longer she waits, the harder it will be for Ligaya to find a husband. Ligaya has become increasingly frustrated and her roommate suggests that Ligaya should speak to a therapist.

As part of the intake assessment, Ligaya's counselor, a positive psychologist, gives Ligaya the Values In Action Inventory of Strengths (VIA-IS). She completes the measure and scores low in certain leadership and teamwork constructs, but high on constructs of gratitude and humor. When discussing the results of the assessment Ligaya tells her counselor that she feels that she is a great leader, as she is the first in her family to move away from the Philippines, and the first to obtain a graduate degree. In addition, she reports that collaboration is an important piece of her identity as she often takes into account the opinions and views of her family members when making decisions. Ligaya reports that she doesn't understand her test results and that maybe the test is wrong. The counselor struggles to understand Ligaya's difficulty with the assessment, as he has successfully used the assessment with culturally diverse clients previously.

C. Capielo, M.S. • L. Mann • B. Nevels • E. Delgado-Romero (✉)
Department of Counseling and Human Development Services, The University of Georgia,
402 Aderhold Hall, Athens, GA 30602, USA
e-mail: edelgado@uga.edu

J. Teramoto Pedrotti and L.M. Edwards (eds.), *Perspectives on the Intersection of Multiculturalism and Positive Psychology*, Cross-Cultural Advancements in Positive Psychology 7, DOI 10.1007/978-94-017-8654-6_3,
© Springer Science+Business Media Dordrecht 2014

3.1 Introduction

Positive psychology encourages psychologists to focus research efforts on the prevention of disease, the development of strengths, and virtues that lead to optimal human functioning (Pedrotti and Edwards 2010; Sandage et al. 2003). The joining of strengths, virtues and multiculturalism "is both logical and necessary" (p. 166) as multiculturalism becomes a strength in and of itself (Pedrotti and Edwards 2010). Although the combination of strengths, virtues and multiculturalism is logical, it is also important to consider variance in cross-cultural applications and definitions of positive psychology constructs and subsequent measurements of these constructs. For example, in the case above, Ligaya's unique perspective and cross-cultural experiences may lead her to view strengths differently than someone from the dominant culture in the United States. Although successfully navigating the dominant culture, Ligaya is struggling to integrate the strengths and virtues of her culture of origin with those of the mainstream. Her ability to mediate these often competing values, although frustrating, can be viewed as a strength in and of itself. Ligaya's case will be revisited at the end chapter to illustrate how to incorporate multicultural considerations in measurement of positive psychology into the therapeutic process.

Carter (1991) stated, "mismatches in cultural values may affect the delivery of mental health and educational services, the communication process, and interactional dynamics" (p. 165). Carter's point is also applicable to the way that positive psychological constructs are operationalized across diverse groups. That is, strengths and virtues derived from the experiences of a subset of the U.S. population (e.g., Euro-Americans) are not necessarily generalizable to either U.S. minority populations or the 95 % of human beings who live outside the U.S. Additionally, given Carter's (1991) statement that differing cultural values impact mental healthcare services, and given that assessment and measurement are important aspects of mental healthcare service, it is important to consider how differing cultural values may affect the assessment and measurement of positive psychological constructs.

This chapter will give a broad overview of measurement in positive psychology and multicultural applications of these measurements. In addition, we will discuss strengths and limitations of assessment in positive psychology especially in terms of how they address equivalence of measures including linguistic and construct equivalence. Examples of specific measures will be given to illustrate applicability to cross-cultural populations. Finally, we will suggest future research areas for these measures including creating cultures-specific measures and utilizing qualitative and innovative research methods.

3.2 Critical Issues with Multicultural Populations in Research and Practice

Multicultural perspectives raise important concerns about the connection between cultural specificity, definitions and expressions of strengths and virtues (Sandage et al. 2003). Before discussing the cultural implications of positive psychology, it is

critical to first consider the issues that continue to permeate multicultural research: conceptualization of race and ethnicity; within-groups differences; exclusion of diverse population from research and exclusion of data related to race and ethnicity of samples; and the use of White control groups.

Understanding the relationship between race, ethnicity, and culture to human functioning can positively impact interventions that promote growth and change (Delgado-Romero et al. 2005). However, defining race and ethnicity when examining psychological phenomena, has also been problematic. Race is a widely used social identity construct use to assign people to distinct groups based on phenomenological resulting in “caste-like” (Robinson, p. 128) categories (Helms and Talleyrand 1997; Robinson 2005). In the United States, Whites have often benefited from this style of categorization; as the dominant group, Whites enjoy numerical, political, economic, and social power (Delgado-Romero et al. 2005). Although Phinney (1996) argued that race and ethnicity be used interchangeably, Helms and Talleyrand (1997) contended that although “crudely assessed” (p. 1246) race has a clear meaning. Though ethnicity has been conceptualized as shared culture, traditions and values (Phinney 1996), it is an imposed construct that continues to perpetuate minority status and inferiority (Trimble et al. 2002). Given that race and ethnicity are concepts that are grounded in political and not scientific rationales, social scientists that blindly use these categorical variables as constructs often produce research that is of questionable scientific merit and in fact may cause harm by reinforcing political or social prejudice. Thus, it is no surprise that many researchers often avoid the issue of race and ethnicity altogether, and this avoidance is problematic in and of itself (see Delgado-Romero et al. 2005).

A common practice by researchers is to use broad and generic labels ignoring important within-group differences. An example of this questionable action is the usage of the term Latino. Latino subgroups in the United States share commonalities such as the use of the Spanish language, Catholic religious roots, and a history of Spanish colonialism (Baker 2002). Despite similarities, important economical and sociopolitical distinctions exist among Latinos. For example, in the U.S. the three largest Latino subgroups, Mexicans, Puerto Ricans, and Cubans, represent a broad range of diversity both across and within these subcategories. These differences are often blurred when the Latino or Hispanic label is used. Portés and Truelove (1987) called this label “a term of convenience for administrative agencies and scholarly researchers” (p. 359). This continued practice further perpetuates the myth of homogeneity (Rinderle and Montoya 2008) among Latinos/as in the United States. Trimble and Dickson (2001) called this practice ethnic gloss and posited that the “use of an ethnic glosses provides little or no information on the richness and cultural variation within ethnocultural groups” (Trimble and Dickson 2001). Data disaggregation by relevant contextual factors (e.g., time in the U.S., historical factors, circumstances of immigration) will help explain examine within group differences (Delgado-Romero et al. 2005).

In social science research, the burden to obtain high internal validity regularly supplants the also important need for external validity (Sue 1999). Recruitment difficulties and funding constraints are often cited as reasons to exclude diverse groups from experimental and non-experimental designs (Delgado-Romero et al. 2005;

Sue 1999). In addition, the omission of the racial and ethnic characteristics of the sample investigated is another frequent solution. This failure was highlighted by Delgado-Romero and colleagues (2005), which found that 43 % (N=796) of the studies published in three main counseling journals did not provide racial or ethnic information on their participants at all. These methodologies result in the inadequate generalization of psychological findings across different racial, ethnic and cultural groups and fail to understand the role of culture on psychological functioning (Delgado-Romero et al. 2005; Sue 1999).

Racial and ethnic diverse groups continue to be compared to the White standard or White sample groups without consideration of equivalence before comparisons are made (more on this in a later section). Studies interested in racial and ethnic minority groups are often rejected for publication if a White control group is not included in the sample (Sue 1999). This idea continues to portray individuals of non-majority backgrounds in a model of deficiency (Sue and Sue 2008) and they continued to be discussed "in relation to their weaknesses much more often than their strengths and branded as pathological in comparison to the majority group" (Pedrotti and Edwards 2010, p. 166).

3.3 Defining Strengths and Virtues: Value Orientation Differences

Constructs associated with optimal human functioning like self-efficacy, individuality, optimisms, hope and happiness are highly valued by Euro-American individuals including researchers and clinicians (Wong et al. 2006). However, these definitions might not tap into how other cultures define or express optimal functioning (Constantine and Sue 2006). For positive psychology to be relevant to racial and ethnic minority groups, it is pivotal that researchers and clinicians examine the role of culture in the diverse expression of strengths and virtues (Sandage et al. 2003). To understand definitions of strengths and virtues we must attend to the value orientations of different cultures, including relational, time, spirituality, and activity orientations.

Relational orientation concerns how we relate to others (Wong et al. 2006). Individuals with an individualistic relational orientation may value self-efficacy, autonomy, and personal achievement over group goals (Wong et al. 2006; Sandage et al. 2003; Constantine and Sue 2006). Those with a collectivistic relational orientation on the other hand, are more likely to give priority to family and group goals over individual goals (Sandage et al. 2003). For example, among Latinos/as, relational orientation may be expressed through *personalismo* (a preference for close personal relationships), *respeto* (respect for elders and authority), *familismo* (an emphasis on the family, including the extended family and friends), *simpatia* (need for behaviors that promote pleasant and non-conflicting social relationships), and *allocentrism* (high levels of conformity, mutual empathy, willingness to sacrifice for the welfare of the group, and high levels of personal interdependence;

Delgado-Romero et al. 2013; Marín and Marín 1991). In the case of Latinas specifically, self-sacrificing and submissiveness may be expected (Arredondo 2002). These attitudes should not be dismissed as weaknesses, however, as there are also strengths inherent in female gender roles, such as having a family orientation and being a keeper of tradition (Delgado-Romero et al. 2013). Dismissing these cultural values as weaknesses because they do not match Euro-American individualistic traits is clearly problematic.

A second value orientation is termed by Wong et al. (2006) as *time orientation,* and is described as the transient focus of human life; it can be divided into past, present, and future. American Indians and African Americans tend to view time in a present orientation. For instance, present orientation among some American Indian cultures is evinced by the absence of future tense in some American Indian languages (Hamme 1995) On the other hand, Asian Americans and Latinas/os have a present-past focus (Sue and Sue 2008). Individuals with a traditional Chinese background, for example, might hold a past orientation, valuing traditions, the role of ancestors and elders (Sue and Sue 2008; Wong et al. 2006). White Americans, in contrast, might relate better to future orientation thus emphasizing the importance of present sacrifices and hard work to achieve happiness in the future (Wong et al. 2006).

Spirituality orientation is concerned with the existence of a supreme being. Spirituality and religion are salient factors across different cultures but groups and individuals may differ in the way they define and express their spiritual beliefs (Schlosser et al. 2010; Sue and Sue 2008; Wong et al. 2006). For example, spirituality is central to the Hmong culture and values ancestral worship (Sandage et al. 2003). Sandage and colleagues state that in this culture ailments and suffering can result from offending ancestors or the deceased for whom they must seek forgiveness. Thus, as part of their healing process and forgiveness, Hmong individuals resort to spiritual healers who assert that suffering signifies the beginning of healing and forgiveness (Sandage et al. 2003). However, because the construct of forgiveness defined by clinicians and researchers is rooted in the Euro-American idea of forgiving others as a way to ameliorate suffering (e.g., VIA-IS measures whether or not a person can forgive other who have done wrong; Sandage et al. 2003) an individual from the Hmong culture who is asked to complete the VIA-IS might find this forgiveness item very confusing.

Finally, *activity orientation* focuses on the activities or experiences people value and thus practice in order to achieve optimal functioning (Delle Fave and Bassi 2009; Wong et al. 2006). Delle Fave and Bassi examined which activities 159 first-generation African, Indian, South American, and Eastern Europe immigrants in Italy chose as activities that symbolized optimal living. Participants could select from four activities: productivity (work, study, volunteer work), social relations (family, relating with friends), leisure (hobbies, use of media), and personal care (resting, body care, and self-care). Results showed that Indians and Africans highly endorsed productivity and leisure activities while South Americans and East Europeans preferred productivity and social activities (Delle Fave and Bassi 2009). U.S. clinicians and researchers must also be aware of potential multicultural implications of activity orientation that

can be derived from such cross-cultural studies. Activities that are compatible with the person's activity orientation are salient and important. Ignoring these differences might lead a clinician from a productivity activity orientation judge a client from a personal care activity orientation as apathetic and unambitious. We present these value orientations as important considerations to address when attempting to measure positive psychological constructs in diverse populations. It is within the context of these differing value orientations that we will provide an overview of existing measures of positive psychological constructs and their strengths and weaknesses.

3.4 Overview of Assessments in Positive Psychology

Duckworth et al. (2005) noted that the assumptions of positive psychology are only as valid as their measures. Therefore, developing assessments that measure human strengths has been an important step in the positive psychology movement. Historically, negative symptoms of psychological disorders have been perceived as clinically informative, whereas a person's strengths are considered to be the "by-products of symptom relief or clinical peripheries that do not need assessment" (Rashid and Ostermann 2009, p. 489). However, in the past three decades we have seen an increase in the development and use of assessments related to human strengths. In fact, as a result of an increased focus on positive qualities, an Axis VI for the DSM has been proposed to evaluate human strengths to gain a more comprehensive picture of a client's life in the diagnostic phase of treatment (Lopez et al. 2006).

There are clear benefits to assessing human strengths. Within the clinical realm, for example, researchers have suggested that assessing strengths provides psychologists with a holistic picture of the client and decreases negative bias in treatment. These benefits, in turn, enable psychologists and clients to enhance client strengths to increase well-being (Rashid and Ostermann 2009). The idea is to build upon the client's established strengths in order to combat psychopathology. Furthermore, assessing a client's strengths enables alternate conceptualizations to drive psychological treatment. For example, diagnoses such as anxiety or depression may not exclusively represent a presence of symptoms but a deficit in strengths and coping strategies (Rashid and Ostermann 2009). There exists great potential for positive psychological assessments to enhance psychological treatment.

Positive psychological constructs were originally conceptualized to fall into the three overarching domains: (a) subjective, (b) individual, and (c) social context (Seligman and Csikszentmihalyi 2000). As research, practice, and assessment related to positive psychology have evolved, these overarching domains have been reconceptualized into categories of positive psychological assessments. Specifically, Duckworth et al. (2005) divided strengths-based assessments into those whose purposes are measuring subjective well-being, measurement of character strengths, measurement of engagement and flow, and measurement of meaning. In addition to

these broad categories, multiculturally diverse groups can also benefit from research activities investigating how specific psychological factors, such as resilience, growth and ethnic identity, relate to optimal living. Given this great potential, it is imperative that positive psychological assessments adequately assess the strengths of multicultural populations.

Psychologists can utilize both formal and informal strengths-based assessments. At present there are a variety of formal measurements that have been created to assess human strengths and subjective well-being. For example, the most popular and most researched measure of human strength assessment is the Values in Action-Inventory of Strengths (VIA-IS; Peterson and Seligman 2004). The VIA-IS is a self-report measure based on a 5-point Likert scale measuring the degree to which test-takers agree with strength based statements (ranging from 1 = very much unlike me, 5 = very much like me). Likewise, there exist other formal measurements such as the Curiosity and Exploration Inventory (CEI; Kashdan et al. 2004) which measures openness and engagement with novel experiences. However, it is important for assessors to know the psychometric properties of these instruments with multicultural populations, keeping in mind that most of these assessing tools have not had representative norming samples. For instance, many of these measures are normed on a convenience sample comprised of primarily White, undergraduate psychology majors. Some of the measures do not even report demographic characteristics of the sample; therefore, it is unclear as to the norming practices of that measure.

Multiple questionnaires developed by researchers at the University of Pennsylvania (e.g., VIA-S) are available to consumers and clients online. The consumer must have access to a computer and email address to complete some of them. Furthermore, full reports for each measure can cost up to $50 each, a price that may likely serve to exclude lower SES groups, which may have higher percentages of non-White individuals or individuals from rural communities in the U.S. This financial situation demonstrates that even if a measure can be normed for specific cultural groups the access to the measures following stringent testing may still be limited.

3.5 Cultural Equivalence of Measurement

With respect to measurement in positive psychology, scholars often have dichotomous viewpoints. Some argue that the empirical investigation of strengths can transcend cultures and approach universality (e.g., Seligman and Csikszentmihalyi 2000) while others argue that strengths, similar to other psychological constructs, must be examined within a cultural context and framework (e.g., Sue and Constantine 2006). Although the universality hypothesis and the specificity hypothesis may have relevance with regard to specific constructs, there is little current research or data to fully support either of these viewpoints. Current measurements of strengths and positive psychological constructs tend to include U.S. population normative data, that are primarily centered on White Americans, and therefore do not provide concrete evidence to bolster either viewpoint exclusively.

Historically, group differences of psychological constructs are measured using mean scores, assuming measurement equivalence across groups (Miller and Sheu 2008). This assumption is often predicated on psychometric properties such as reliability (Miller and Sheu 2008); whereas invariance is frequently overlooked (Miller and Sheu 2008). Although reliability provides information about a test's consistency across items, times and/or examiners, it does not offer evidence about the consistency of the construct (e.g. happiness, satisfaction) the test purposes to measure. In other words, if a test is found to lack invariance, the meaning of the construct will vary across groups thus confounding the interpretation of results (Cheung and Rensvold 2002). Thus ensuring that measurements operate equally across groups is imperative. Measurement invariance (also known as measurement equivalence or factorial invariance) can be defined as the equality of measurement or assessment of a construct across two or more cultural groups thus ensuring the same constructs are being assessed across groups (Chen 2008). Measurement equivalence includes construct equivalence, scalar equivalence, and linguistic equivalence. It is important to note that different facets of equivalence are discussed by different researchers in the field, and different terminology is sometimes used by different authors (please see Chap. 4, this volume, for additional discussion of equivalence issues). Miller and Sheu (2008) report that measurement invariance analyses (e.g. exploratory and confirmatory factor analyses) are powerful ways to enhance understanding of diverse cultural groups and specific multicultural constructs above and beyond the use of mean scores.

The most often cited type of measurement equivalence is construct equivalence (in scale construction this is known as factor-form equivalence), which tests the ability of similar, but not equivalent measures, to assess similar constructs. More specifically, construct equivalence is transition from theory to measurement (Hui and Triandis 1985) or the operationalization of an identified strength (e.g., self-esteem). Following the example of self-esteem, we found that much of the current research related to self-esteem measurement focuses on inner aspects of self-esteem (e.g., "I am a good person"). However, the social aspect of self-esteem (i.e. feeling accepted and valued by others) might be more important given the collectivistic orientation of certain cultural groups (e.g., "I am a good neighbor"). Chen (2008) has suggested that future research with self-esteem should address the construct in a culturally appropriate manner by including both inner- and social aspects of self-esteem.

If researchers are able to construct a scale that has similar, but equal constructs, a next step for comparisons across groups would be to establish scalar equivalence. Scalar equivalence refers to numerical equivalence from one scale to another such that the ratio scale is the same in each cultural group (Caprara et al. 2000). Specifically, a numerical value on one scale refers to the same degree, intensity, or magnitude regardless of the population to which the respondent belongs (Hui and Triandis 1985). Scalar equivalence is the most difficult to achieve as this type of equivalence requires hierarchical analyses and large sample sizes for testing, although it is ideal for cross-cultural comparisons among populations.

Another important aspect in measurement equivalence is linguistic equivalence, which refers to the process by which a scale or measure is translated to a language

Table 3.1 Sample characteristics of commonly used positive psychology measures

Measurement name	Constructs	Sample characteristics
Attributional Style Questionnaires (ASQ) (Hjelle et al. 1996)	Explanatory style for good and bad events	N=436 (ages 17–35) U.S. only 22 % male, 78 % female Race/ethnicity not reported
Meaning in Life Questionnaire (MLQ) (Steger et al. 2007)	Presence of meaning & search for meaning	N=154 (μ=21.8, s.d.=3.9) 30 % male, 70 % female 79 % White, 9 % Asian, 4 % Native American, 3 % African American, 2 % Asian American, 1 % Hispanic
Quality of Life Inventory (QOLI) (Frisch et al. 2005)	Life satisfaction and well-being	N=3,638 (μ=23, s.d.=5.42) U.S. only 43 % male, 57 % female 86 % white, 5.5 % International students, 4.7 % African American, 2.2 % Hispanic, 1.3 % Asian American, .3 % Native American
Subjective Happiness Scale (SHS) (Lyubomirsky and Lepper 1999)	Global characterization of subjective happiness	N=2,732 (ages 14–94) U.S. and Russia sample 36 % male, 64 % female, >1 % unknown Race/ethnicity not reported
Values in Action Inventory of Strengths (VIA-IS) (Park et al. 2006)	Character strengths and core virtues	N=117,676 (ages 18–65+) U.S. and 54 Countries (English speakers only) 28 % male, 72 % female (U.S.) 38 % male, 62 % female (non-U.S.) Race/ethnicity not reported

other than the language to which a measure was originally normed and tested (for example translating from English to Spanish). Language affects the meaning of scales, thus possibly preventing comparisons between linguistically diverse groups (Sanchez et al. 2006). When using self-report measures is it crucial for psychologists to determine whether the endorsement of different values and or virtues (e.g. happiness, forgiveness) are equivalent, meaning that psychologists need to question whether these claims convey the same meaning across languages and cultures different from the ones from which they were originally conceptualized (Caprara et al. 2000). For instance, when translating an English Likert-scale response with the word 'slightly' to Spanish, might be a difficult task, as there is not direct translation for this word. Hui and Triandis (1985) were among the first to examine cross-cultural differences in measurement and to propose future directions for assessment and research to better facilitate development of measurement equivalence. Given that most of the scales related to positive psychological constructs (e.g. VIA-IS; Peterson and Seligman 2004) were created in the U.S. and normed with U.S. samples, basic English language skills are required to complete the assessments (see Table 3.1).

3.6 Future Directions and Conclusions

Returning to our original example of Ligaya, there are many potential implications of this case with respect to understanding and interpreting strengths within a cultural context. For the clinician working with Ligaya it is important to allow Ligaya to subjectively define her perception of strengths by asking open-ended questions during an intake or assessment phases in addition to the use of the VIA-IS. Doing so provides additional, more in-depth, measurement of Ligaya's strengths that will prove helpful in conceptualizing her concerns. Questions might include, "*What qualities do you see as strengths in yourself*?, *What would your friends and family members consider to be your strengths*?, and *Who or what can support you throughout the process of therapy*?" The clinician should consider addressing how his/her cultural values differ from Ligaya's, and what impact those differences may have on the therapeutic process.

When interpreting the VIA-IS the therapist should consider inviting Ligaya to be a collaborator in discussing the results so that she can report which results she considers to be relevant and useful. Psycho-education about what the results mean, strengths and weaknesses of the assessment, and how Ligaya's values may manifest themselves in the results may also be important to address. The counselor should also ask Ligaya if including friends or family members in the assessment or treatment process would be helpful. Finally, it is imperative that the counselor continuously conducts self-assessments of his/her own potential biases. While the notion of error in psychological testing is often related to instrumentation, accurate assessment interpretation is also predicated upon clinical errors, including bias and ethnocentricity (Suzuki et al. 2005). For example, if the counselor working with Ligaya comes from a European-American background, his or her interpretation of Ligaya's assessment results will likely reflect this background. Therefore to minimize these clinician errors in interpretation of results, it is imperative that the clinician include self-evaluation of biases when interpreting measures (Pieterse and Miller 2010).

Our understanding of diverse definitions and manifestations of optimal functioning can further be strengthened by focusing on how untoward circumstances can lead to growth. Constantine and Sue (2006) postulate that these unique stressors have led to a unique strength-based resilience, which they have termed "strengths gained through adversity" (p. 231). Diverse cultural groups within the United States (e.g., African Americans during the Civil Rights Movement) have been faced with unique challenges that have resulted in distinct strengths and virtues not currently recognized by positive psychology assessment. For example, an area of research that has received little attention is the history of immigration in the United States and its effects on mental health and wellness (Weiss and Berger 2006). Immigration has been associated with acculturative stress and negative mental health outcomes (Henkin et al. 2011). However, challenging situations associated with immigration can also create opportunities for development of strengths and resiliency (Weiss and Berger 2006). For instance, the Latino health paradox states that Latino/as with stronger Latino/a cultural orientation experience better mental and physical health outcomes compared to those who have a more American orientation (Torres 2010).

This example illustrates how ethnic and cultural pride may facilitate a sense of belonging and community within those groups (Constantine and Sue 2006).

Research and measurement development with positive psychological instruments and constructs can be divided into three important areas of future study: adaptation of measurements, creation of culturally specific instruments, and use of qualitative and innovate methods. Specifically, research in positive psychological assessment should involve testing existing measures on diverse populations in order to demonstrate external validity of these assessments. Sue (1999) noted that the United States produces the majority of research and represents the majority of participants in that research. This trend is problematic in that we cannot assume data from United States samples generalize to the population at large. If external validity of positive psychological measures cannot be established, then adapting measures to incorporate differing cultural values would be the next step for research. For example, if a study were to reveal that different results emerge when strengths-based instruments such as the Satisfaction with Life Scale (Diener et al. 1985) are administered to people from differing cultures, economic levels, and educational levels, then scale construction research could be conducted to adapt the measure so that it could be generalized to different cultures. Given the impact that cultural differences may have on assessment performance, it could be beneficial for future research to address the benefit of adapting existing instruments so that one's cultural identity does not negatively impact assessment results.

Additionally, as we have demonstrated, culture informs our definition and expressions of strengths and virtues. Thus, positive psychology researchers and clinicians must avoid imposing their own culture's values and theoretical constructs as the standard to study in other cultural groups (Wong et al. 2006) and instead they should identify and understand unique factors that contribute to optimal living in people of color (Constantine and Sue 2006; Sandage et al. 2003). To meet this goal, Constantine and Sue posited that positive psychology conceptualizations should include: collectivism; racial and ethnic pride; spirituality and religion; interconnectedness of mind, body, and spirit, and; family and community. The addition of these constructs is not meant to supplant already established constructs. Instead, researchers and clinicians can help by making these constructs more reflective of the life experiences of individuals belonging to different groups (Pedrotti and Edwards 2010).

In addition to cultural adaptation and creation of culture specific measurement, Sue (1999) suggested that ethnic minority research should include a variety of research methodologies such as qualitative and ethnographic studies. Over time, there has been a shift away from logical positivism and blind acceptance of the objectivity of quantitative assessment (Duran et al. 2008). The movement toward applied research and more socially and culturally derived research has led to an increase in qualitative and mixed-methods research promoting a more culture sensitive, subjective, and emancipatory approach to studying strength-based behaviors and social relationships (Tashakkori and Teddlie 2003). In relation to measurement with positive psychology and culturally diverse groups, exploratory qualitative research could offer scholars and clinicians a better understanding of culturally defined strengths.

Overall, there will likely be continued discrepancy between the cultural specificity and cultural universality hypotheses related to assessment of positive psychological constructs, as the constructs are generally broad, continuous variables. In essence, most strength-based constructs can have individual, subjective meanings, and can be treated as such using innovative or qualitative measurement methods. However, this is not to say that specific constructs cannot be measured or evaluated for specific populations or universally. We merely attempt to show the scope of the task at hand for researchers and clinicians within the positive psychology movement.

References

Arredondo, P. (2002). Mujeres Latinas-santas y marquesas. *Cultural Diversity and Ethnic Minority Psychology, 8*(4), 308–319. doi:10.1037/1099-9809.8.4.308.

Baker, S. S. (2002). *Understanding mainland Puerto Rican Poverty*. Philadelphia: Temple University Press.

Caprara, G. V., Barbaranelli, C. B., Bermudez, J., Maslach, C., & Ruch, W. (2000). Multivariate methods for the comparison of factor structures in cross cultural research: An illustration with the big five questionnaire. *Journal of Cross-Cultural Research, 31*(4), 437–464.

Carter, R. T. (1991). Cultural values: A review of the empirical research and implications for counseling. *Journal of Counseling and Development, 69*(1), 46–50.

Chen, F. F. (2008). What happens if we compare chopsticks with forks? The impact of making inappropriate comparisons in cross-cultural research. *Journal of Personality and Social Psychology, 95*(5), 1005–1018. doi:10.1037/a0013193.

Cheung, G. W., & Rensvold, R. B. (2002). Evaluating goodness of fit indexes for testing measurement invariance. *Structural Equation Modeling, 9*(2), 233–255.

Constantine, M. G., & Sue, D. W. (2006). Factors contributing to optimal human functioning in people of color in the United States. *The Counseling Psychologist, 34*(2), 228–244. doi:10.1177/0011000005281318.

Delgado-Romero, E. A., Galván, N., Maschino, P., & Rowland, M. (2005). Race and ethnicity in empirical counseling and counseling psychology research: A 10-year review. *The Counseling Psychologist, 33*(4), 419–448. doi:10.1177/0011000004268637.

Delgado-Romero, E. A., Nevels, B. N., Capielo, C., Galván, N., Hunter, M. R., & Torres, V. (2013). Latino/a Americans. In G. McAuliffe (Ed.), *Culturally alert counseling: A comprehensive introduction*. Thousand Oaks: Sage.

Delle Fave, A., & Bassi, M. (2009). Sharing optimal experiences and promoting good community life in a multicultural society. *The Journal of Positive Psychology, 4*(4), 280–289. doi:10.1080/17439760902933716.

Diener, E., Emmons, R. A., Larson, R. J., & Griffin, S. (1985). The satisfaction with life scale. *Journal of Personality Assessment, 49*, 71–75.

Duckworth, A. L., Steen, T. A., & Seligman, M. E. P. (2005). Positive psychology in clinical practice. *Annual Review of Clinical Psychology, 1*, 629–651. doi:10.1146/annurev.clinpsy.1.102803.144154.

Duran, E., Firehammer, J., & Gonzalez, J. (2008). Liberation psychology as the path toward healing cultural soul wounds. *Journal of Counseling & Development, 86*, 288–295.

Frisch, M. B., Clark, M. P., Rouse, S. V., Rudd, M. D., Paweleck, J., & Greenstone, A. (2005). Predictive and treatment validity of life satisfaction and the Quality of Life Inventory. *Assessment, 12*(1), 66–78. doi:10.1177/1073191104268006.

Hamme, L. V. (1995). American Indian culture and the classroom. *Journal of American Indian Education, 35*(2), 21–36.

Helms, J. E., & Talleyrand, R. M. (1997). Race is not ethnicity. *American Psychologist, 52*(11), 1246–1247. doi:10.1037/0003-066X.52.11.1246.

Henkin, S., Tucker, K. L., Gao, X., Falcon, L. M., Qawi, I., & Brugge, D. (2011). Association of depression, psycho-social stress and acculturation with respiratory disease among Puerto Rican adults in Massachusetts. *Journal of Immigrant and Minority Health, 13*(2), 214–223. doi:10.1007/s10903-009-9307-y.

Hjelle, L., Belongia, C., & Nesser, J. (1996). Psychometric properties of the life orientation test and attributional style questionnaire. *Psychological Reports, 78*, 507–515. doi:10.2466/pr0.1996.78.2.507.

Hui, C. H., & Triandis, H. C. (1985). Measurement in cross-cultural psychology. *Journal of Cross-Cultural Psychology, 16*(1), 131–152. doi:10.1177/0022002185016002001.

Kashdan, T. B., Rose, P., & Fincham, F. D. (2004). Curiosity and exploration: Facilitating positive subjective experiences and personal growth opportunities. *Journal of Personality Assessment, 82*(3), 291–305. doi:10.1207/s15327752jpa8203_05.

Lopez, S. J., Magyar-Moe, J. L., Petersen, S. E., Ryder, J. A., Krieshok, T. S., O'Byrne, K. K., Lichtenberg, J. W., & Fry, N. A. (2006). Counseling psychology's focus on positive aspects of human functioning. *The Counseling Psychologist, 34*(2), 205–227. doi:10.1177/0011000005283393.

Lyubomirsky, S., & Lepper, H. S. (1999). A measure of subjective happiness: Preliminary reliability and construct validation. *Social Indicators Research, 46*, 137–155. doi:10.1023/A:1006824100041.

Marín, G., & Marín, B. V. (1991). *Research with Hispanic populations*. Newbury Park: Sage.

Miller, M. J., & Sheu, H. (2008). Conceptual and measurement issues in multicultural psychology research. In S. D. Brown & R. W. Lent (Eds.), *Handbook of counseling psychology*. Hoboken: Wiley.

Park, N., Peterson, C., & Seligman, M. E. P. (2006). Character strengths in fifty-four nations and the fifty US states. *The Journal of Positive Psychology, 1*(3), 118–129. doi:10.1080/17439760600619567.

Pedrotti, J. T., & Edwards, L. M. (2010). The intersection of positive psychology and multiculturalism in counseling. In J. G. Ponterotto, J. M. Casas, L. A. Suzuki, & C. M. Alexander (Eds.), *The handbook of multicultural counseling* (3rd ed.). Thousand Oaks: Sage.

Peterson, C., & Seligman, M. E. P. (2004). *Character strengths and virtues: A handbook and classification*. New York: Oxford University Press.

Phinney, J. S. (1996). When we talk about American ethnic groups, what do we mean? *American Psychologist, 51*, 918–927. doi:10.1037/0003-066X.51.9.918.

Pieterse, A. L., & Miller, M. J. (2010). Current considerations in the assessment of adults: A review and extension of culturally inclusive models. In J. G. Ponterotto, J. M. Casas, L. A. Suzuki, & C. M. Alexander (Eds.), *The handbook of multicultural counseling* (3rd ed.). Thousand Oaks: Sage.

Portes, A., & Truelove, C. (1987). Making sense of diversity: Recent research on Hispanic minorities in the United States. *Annual Review of Sociology, 13*, 359–385. doi:10.0360-0572/87/0815-0359.

Rashid, T., & Ostermann, R. F. (2009). Strengths-based assessment in clinical practice. *Journal of Clinical Psychology, 65*(5), 488–498. doi:10.1002/jclp.20595.

Rinderle, A. D., & Montoya, S. R. (2008). Hispanic/Latino identity labels: An examination of cultural values and personal experiences. *The Howard Journal of Communications, 19*, 145–164. doi:10.1080/10646170801990953.

Robinson, T. L. (2005). *The convergence of race, ethnicity, and gender: Multiple identities in counseling* (2nd ed.). Upper Saddle River: Pearson.

Sanchez, J. I., Spector, P. E., & Cooper, C. L. (2006). Frequently ignored methodological issues in cross-cultural stress research. In P. T. P. Wong & L. C. J. Wong (Eds.), *Handbook of multicultural perspectives on stress and coping*. New York: Springer.

Sandage, S. J., Hill, P. C., & Vang, H. C. (2003). Toward a multicultural positive psychology: Indigenous forgiveness and Hmong culture. *The Counseling Psychologist, 31*(5), 564–591. doi:10.1177/0011000003256350.

Schlosser, L. Z., Foley, P. F., Stein, E. P., & Holmwood, J. R. (2010). Why does counseling psychology exclude religion?: A content analysis and methodological critique. In J. G. Ponterotto,

J. M. Casas, L. A. Suzuki, & C. M. Alexander (Eds.), *The handbook of multicultural counseling* (3rd ed.). Thousand Oaks: Sage.

Seligman, M. E. P., & Csikszentmihalyi, M. (2000). Positive psychology: An introduction. *American Psychologist, 55*(1), 410–421. doi:10.1037/0003-066X.60.5.410.

Steger, M. F., Kawabata, Y., Shimai, S., & Otake, K. (2007). The meaningful life in Japan and the United States: Levels and correlates of meaning in life. *Journal of Research in Personality, 42*(1), 660–678. doi:10.1016/j.jrp.2007.09.003.

Sue, S. (1999). Science, ethnicity, and bias. *American Psychologist, 54*(12), 1070–1077. doi:10.1037//0003-066X.54.12.1070.

Sue, D. W., & Sue, D. (2008). *Counseling the culturally diverse: Theory and practice* (5th ed.). Hoboken: Wiley.

Suzuki, L. A., Kugler, J. F., & Aguiar, L. J. (2005). Assessment practices in racial-cultural psychology. In R. T. Carter (Ed.), *Handbook of racial-cultural psychology and counseling* (Vol. 2). Thousand Oaks: Sage.

Tashakkori, A., & Teddlie, C. (2003). *Handbook of mixed methods in social and behavioral research*. Thousand Oaks: Sage.

Torres, L. (2010). Predicting levels of Latino depression: Acculturation, acculturative stress, and coping. *Cultural Diversity and Ethnic Minority Psychology, 16*(2), 256–263. doi:10.1037/a0017357.

Trimble, J., & Dickson, R. (2001). *Ethnic gloss*. Retrieved from http://pandora.cii.wwu.edu/trimble/research_themes/ethnic_gloss.htm

Trimble, J., Helms, J., & Root, M. (2002). Social and psychological perspectives on ethnic and racial identity. In G. Bernal, J. Trimble, K. Burlew, & F. Leong (Eds.), *Handbook of racial and ethnic minority psychology*. Thousand Oaks: Sage.

Weiss, T., & Berger, R. (2006). Reliability and validity of a Spanish version of the posttraumatic growth disorder. *Research and Social Work Practice, 16*(2), 191–199. doi:10.1177/1049731505281374.

Wong, P. T. P., Wong, L. C. J., & Scott, C. (2006). Stress and coping: The positive psychology of transformation. In P. T. P. Wong & L. C. J. Wong (Eds.), *Handbook of multicultural perspective in stress*. New York: Springer.