SPECIAL ISSUE

Multicultural and Diversity Training Considerations for Biofeedback Practitioners

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This report identifies curricular considerations related to multicultural and diversity training. Various models of cultural diversity are discussed that are useful for research, education, and clinical professionals who use biofeedback tools, whether those tools are used to educate clients and students in instructional settings or diagnose and/or treat patients in clinical settings. The report begins by describing a practical framework for discussing terms such as “multicultural” and “diversity training,” and continues with describing curricular components for increasing awareness of diverse cultural perspectives encountered by biofeedback practitioners in various settings.

Background: Useful Models and Terminology for Discussing Multicultural Diversity Training

Educators (e.g., teachers, trainers, advisors, coaches, and mentors) working with clients and using biofeedback techniques, and state-licensed health professionals using biofeedback tools in working with patients (e.g., licensed mental and physical health practitioners with credentials, certifications, or proficiency designations in biofeedback) have opportunities for exposure to evidence-based practices that focus on fostering cultural competence, cross-cultural efficacy, and cultural humility (Kirmayer, 2012; Tervalon & Murray-Garcia, 1998). Within the context of this article, the term patient refers to someone seeking a diagnosis or treatment from a state-licensed practitioner and the term client refers to someone seeking education to learn skills of self-regulation. There may be overlap when someone who is diagnosed and treated as a patient is also educated in self-regulation skills as a client, however, the term is meant to differentiate the functional role of a biofeedback practitioner who may or may not be limited in their scope of practice by a state-licensing board. Regardless of their role as an educator or a state-licensed health professional, all practitioners using biofeedback tools with clients and patients must not only be familiar with the ways that factors like nervous system stimulants and suppressants influence the interpretation of psychophysiological signals, they must also develop a level of cultural competence, efficacy, and humility to understand how a client or patient is motivated to develop self-regulation skills using biofeedback protocols.

An example of how health educators and clinical professionals may intersect with diverse multicultural communities and individuals is interactions related to alcohol, tobacco, and other drugs use. For example, there are a range of cultural norms, attitudes, and beliefs surrounding substance use, or abuse that may influence the experiences of biofeedback practitioners, wherein some cultures permit limited use of stimulants (e.g., caffeine, nicotine) or suppressants (e.g., alcohol) but forbid abuse to the point of intoxication (Room, 2005). Biofeedback practitioners not only must be aware of simple physiological facts related to how substance use (or abuse) will influence the biofeedback process, they must also take into account how a client’s or patient’s use (or abuse) of substances might reflect cultural beliefs about future or continued use of substances that will influence any biofeedback (operant) learning process.

According to the U.S. Department of Health and Human Services (USDHHS) Substance Abuse and Mental Health Services Administration (SAMHSA), and Health Resources and Services Administration (HRSA), there are three basic models for training multicultural diversity awareness among mental and physical healthcare providers who address morbid and comorbid issues related to substance use and abuse related to exposure to alcohol, tobacco and/or other drugs. The three basic models are:

Cultural Competence
The level of a provider’s knowledge, attitude, and skills about cultural values and health-related beliefs, disease incidence and prevalence, and treatment efficacy for diverse cultural groups.
Cross-Cultural Efficacy
Providers learn how their own culture and behaviors can impact others of different cultures, and understand how patients’ culturally based behaviors may impact the provider.

Cultural Humility
Providers engage in regular self-evaluation and self-critique. The goal is to develop power-balanced relationships with patients of different cultures.

Training Considerations: Toward a Culturally Competent System of Care
There have been various efforts describing specific aspects of the three multicultural models above. For example, while at the National Center for Cultural Competence, Cross, Bazron, Dennis, and Isaacs (1989) authored a monograph entitled *Towards a Culturally Competent System of Care*, which asserts that cultural competence occurs on a continuum of six stages identified as:

1. Cultural destructiveness (e.g., attitudes, policies, and practices that are undermining of a cultural group);
2. Cultural incapacity (e.g., lack of ability to respond to culturally and linguistically diverse groups);
3. Cultural blindness (e.g., treating all people as the same without resources for acquiring knowledge about diverse cultures);
4. Cultural precompetence (e.g., commitment to supporting civil and human rights; however, without a plan for achieving organizational or individual multicultural diversity training);
5. Cultural competency (e.g., dedicated resources for ongoing training and support of multicultural diversity);
6. Cross-cultural efficacy and proficiency (e.g., active pursuit of social justice and advocacy for disadvantaged diverse multicultural experiences. Tervalon and Murray-Garcia (1998) extend the list with another term,
7. Cultural humility (e.g., engaging in regular self-evaluation about power imbalances between service providers and receivers).

Cross et al. (1989) further suggested that multicultural diversity training efforts incorporate curricular components that: “(1) value diversity, (2) conduct self-assessment, (3) manage the dynamics of difference, (4) acquire and institutionalize cultural knowledge, and (5) adapt to diversity and the cultural contexts of communities they serve” (p. 8).

American mental and physical health associations include statements that endorse the Cross et al. (1989) list, shown above, for fostering multicultural diversity. For example, these associations include the American Medical Association (AMA), American Nurses Association (ANA), American Psychological Association (APA), American Public Health Association (APHA), American Counseling Association (ACA), American Association for Marriage and Family Therapy (AAMFT), American Physical Therapy Association (APTA), American Osteopathic Association (AOA), American Association of Oriental Medicine (AAOM), National Ayurvedic Medical Association (NAMA), American Association of Naturopathic Physicians (AANP), Association for Applied Psychophysiology and Biofeedback (AAPB), and others. The listed organizations have standards and position statements promoting competence, efficacy, and humility when understanding and interacting with clients and patients from diverse cultures (see Engbretson, Mahoney, & Carlson, 2008), and all endorse strategies for educating professionals about multicultural diversity topics.

In some Asian countries, mental and physical health associations follow the North American model. For example, the Taiwanese Psychological Association, Taiwan Association of Clinical Psychology, and Taiwanese Society of Psychiatry are aligned with the North American standards. Some of the European mental and physical health associations predominantly align with the North American standards; however, there is some heterogeneity. For example, in European countries where clients and patients speak many different languages and have experience with a variety of cultural norms, cultural standard may vary by country and region.

Privacy and Modesty Considerations
Biofeedback educators and clinical professionals must also affirm client and patient privacy and modesty rights. Clients and patients must be informed about any actions related to the biofeedback practices. Actions also include a loss of modesty that can occur when clothing is moved or even removed during a session. The modesty risk, as well as any other risk, requires close and careful communication about personal expectations as well as legal, ethical, and cultural norms of clients and patients that may even require getting them involved in the process of sensor or electrode placement. For example, placing a respiratory belt or strain gauge around someone’s chest may require careful communication that guides the appropriate placement and adjustment.

Take, for instance, a physical therapist describing motor or action verbs to patients. The therapist may palpate or touch particular muscles for the patient to assist him or her to fully understand the meaning of a movement or muscle action. The patient’s cognitive understanding of “somato-
sensory” words may be facilitated by the touch of a physical therapist (De Grauw, Willems, Rueschemeyer, Lemhöfer, & Schriefers, 2014). Whereas some physical therapists may request their patients to wear loose clothing or ask them to partly to remove some clothing, making it easier to apply biofeedback sensors and electrodes during a therapeutic procedure, it is consistent across all cultures, countries, regions, and cities that mental health practitioners utilize biofeedback techniques while the patient or client is wearing his or her own clothes.

Both individual history and subcultural norms may make some of these sensor placements more or less threatening for a given individual. Abuse victims, for example, can experience any torso placement as violating their sense of safety. Careful communication with the patient or client can determine which sensor placement (if any) best preserves modesty and a sense of safety.

When a chest placement with a strain gauge is not appropriate, a surface electromyography (SEMG) sensor over the neck muscle (e.g., scalene, sternocleidomastoid) to reflect breathing processes is also possible. For those who are comfortable with placing SEMG sensors to measure lower, deeper breathing muscle activity, Peper, Booiman Lin, Harvey, & Mitose (2015) suggest placing SEMG electrodes on an area near the lower abdominis muscles that reflect deeper respiratory muscle patterns occurring when the diaphragm and pelvic floor muscles contract and release. The SEMG sensor placement techniques also emphasize careful communication with clients and patients by acknowledging modesty concerns when positioning the sensors and electrodes.

### Particular Curriculum Components for Multicultural Diversity Training

Research by Welbie et al. (2009) in the Netherlands about physical therapists with immigrant clients showed that there are several core problems. The language barrier and differing perspectives on the treatment process are frequently mentioned problems in clinical practice. These people are often less able to describe their complaints. The research suggests that these problems of first generation immigrants are also related to lower health literacy, which limits their understanding of prescribed treatment options and hinders the self-management of their health (Welbie, 2011).

Empirical evidence suggests that multicultural education can lead to both positive delivery of service and positive client and patient outcomes, ranging from medication adherence and symptom reduction to increased patient and client well-being and satisfaction (Johnson, 1990; Kulik & Roberson, 2008; Stevens, Plaut, & Sanchez-Burks, 2008).

Three key curricular components for didactic and experiential training include materials and experiences that: (a) address attitudes related to cultural sensitivity, (b) increase knowledge about multiculturalism, and (c) develop practical skills in approaching patients and clients from diverse cultural backgrounds. For example, Kozak, Boynton, Bentley, and Bezy (2010) and others (e.g., Broome & McGuinness, 2007) have described various curricula for training health educators and healthcare professionals about cross-cultural diversity. For example, Broome and McGuinness (2007) have proposed a CRASH course for multicultural diversity training with the following emphases: “consider Culture, show Respect, Assess and affirm differences, show Sensitivity and provide care with Humility” (p. 293), where each component subdivides into various course objectives.

During assignments about providing care with Humility, the trainee must follow a LEARN model (see Berlin & Fowles, 1983) that values Listening with sympathy and understanding, while Explaining points of view in understandable, nontechnical language and Acknowledging the similarities and differences in the approach to education and treatment. This leads to Recommending a mutually acceptable course of action and makes it easier to Negotiate other aspects of care (Broome & McGuiness, 2007, p. 293).

These models indicate that communication has to be clear and mutual. The listener has to understand the whole content of the message as the sender of the message has intended. When the message fails to connect with the belief world of the other, the message will have no impact. A successful communication is only possible when there is a minimal gap between the meaning of the message as the sender intended it and the message as the recipient receives it (Booiman & Peper, 2010). Verbal and nonverbal information are both important (van Ravensberg, 2008). We have to realize that the nonverbal information like hand gestures from the mother language are still carried over and used, and can mean something very different from the hand gestures in the language spoken (Willems, Özyürek, & Hagoort, 2007).

The following passage expresses the difficulty reported by one first generation Turkish immigrant to the Netherlands, in communicating with her healthcare team.

> Trying to make clear what I feel and what is happening in my body and mind, during a sick period is so challenging. To be honest, the communication with health professionals is the most difficult part in taking care of my lung disease.

—Hulya, 43 years of age
Further Training Considerations about Multicultural Diversity

Training opportunities that address diverse multicultural experiences must be made practical and practicable, otherwise the values of achieving a cultural competence, efficacy, and humility become lip service spoken by individuals, corporations, mental/physical health associations, organizations, or societies (Hoobler, 2005). Whereas some organizations simply say they “value” cultural diversity in the workplace, other organizations are more specific in stating their implementation of values related to cultural diversity. For example, the Association for Applied Psychophysiology and Biofeedback (AAPB), the International Society for Neurofeedback and Research, and the Biofeedback Certification International Alliance (BCIA) require that certification-related didactic education cover several categories addressing multicultural and diversity matters, including topics such as professional responsibility, professional relationships, client rights, and how to act during supervision and consultation.

The core belief in the AAPB and BCIA training model is suggested by Maze (2005), who asserts that “professional responsibility and competence training for educators and health care providers should embrace diversity not only of culture, but also among individuals or groups” (p. 547; Badger, Gagan, & McNiece, 2001).

Individuals who are a part of underserved groups must be provided with enough information to make informed decisions about their options during biofeedback training. Leaflets with information in their own language can make this process easier. In the Netherlands, it is common practice to have leaflets about the therapy in multiple languages including Turkish, Arabic, and Spanish. A client or patient, independent of diversity in multicultural background, has the right to know about options related to alternate types of service. Practitioners must consider the whole person as described by Serlin (2007), when addressing not only techniques for placing sensors and electrodes or a specific set of symptoms or educational goals, but also the holistic system of their lives.

Consider the example of an older woman of Chinese descent who believed in karmic debt and assumed that her breast cancer was caused by the gods as punishment for past-life misdeeds. The woman had an optimistic attitude because she felt that if she suffered enough with the cancer symptoms, then her life would be spared. In contrast, the practitioner’s explanation of the breast cancer might be in terms of the woman’s exposure to carcinogenic chemicals over a lifetime of work in a chemical factory, being a lifelong smoker, drinker, or poverty-level wage-earner who could afford only inexpensive, highly processed foods for daily calories. The woman in this example began seeking alternative and complementary approaches for her cancer pain symptoms, including therapies that ranged from acupuncture and Chinese herbs to increased prayer and biofeedback approaches for her pain symptoms. Understanding the client’s exploration of approaches for dealing with her cancer required an intimate knowledge of her personal, community, and religious viewpoints related to health and healing.

Serlin (2007) suggested that understanding the belief system of clients and patients can increase the likelihood they will find an internal motivation to practice what they learn in a clinic and not necessarily depend on others for personal development or for healthcare.

Conclusion

The goal of presenting various educational, diagnostic, and treatment options to clients and patients is facilitated by developing a network of professional relationships that can result in consultation and, sometimes, supervision when learning new skills. Participating in programs that provide continuing education about multicultural diversity considerations will benefit ongoing professional development.

This article is intended to reflect a point of view that knowledge of multicultural diversity goes beyond knowing client or patient race or ethnicity. Rather, the article is intended to emphasize holistic, multidimensional views of culture, in which understanding terminology as well as client belief systems takes into consideration “a multiplicity of contexts, such as rural, urban or suburban setting; language, age, gender, cohort, family configuration, race, ethnicity, religion, nationality, socioeconomic status, employment, education, occupation, sexual orientation, political ideology; migration; and stage of acculturation” (Falicov, 1995, p. 375). With steady effort, multicultural diversity training will help biofeedback practitioners move from cultural competence and efficacy to cultural humility in their practice. Broadly speaking, understanding cultural differences can at times be very subtle, analogous to using the wrong fork or spoon during a formal dinner. Other times, while trying to understand cultural differences, we may have to make time to communicate the socially constructed norms reflected in cultures so cultural differences are mutually acknowledged.

References


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