# ASSOCIATIONS BETWEEN COMPONENTS OF MINDFULNESS-BASED STRESS REDUCTION AND YOGIC PHILOSOPHY

by

Teresa Eve Araas

A Research Paper Presented in Partial Fulfillment of the Requirements for the Certification for Advanced Yoga Teacher

SURYA CHANDRA HEALING YOGA SCHOOL Mentors JJ Gormley-Etchells, E-YRT-500 Baxter Bell, MD

# Associations Between Components of

# Mindfulness-Based Stress Reduction and Yogic Philosophy

As mindful awareness programs, such as Mindfulness-Based Stress Reduction, become more widely accepted throughout the Western world and have found their ways into the mainstream of health care and society, it is important to consider their roots from ancient Yogic philosophy.

Jon Kabat-Zinn, Ph.D., founder and former Executive Director of the Center for Mindfulness in Medicine, Health Care, and Society – and founder and Director Emeritus of the Mindfulness-Based Stress Reduction Clinic at the University of Massachusetts Medical School, has defined mindfulness as the "awareness that emerges through paying attention on purpose, in the present moment, and nonjudgmentally to the unfolding of experience moment by moment" (2003, p. 145). As a characteristic of consciousness, mindfulness is a phenomenon that has been frequently discussed as functionally significant relative to physical health, psychological health and well-being, relationships, and accomplishments in work and during sport performance (Brown & Ryan, 2004). Specifically, mindfulness involves the observational sense of consciousness; it can be appropriately portrayed as resembling the scientific knowledge of the functioning human mind as it is correlated to attentional qualities of daily life experiences. Mindful awareness does not change the content of what is experienced, but rather alters how one encounters one's experience and, ultimately, one's behavior with increased mindful attention to experience (McCracken, Gauntlet-Gilbert, & Vowles, 2007). Thus, enhancement of mindfulness can potentially increase awareness and capacity for knowing and has been shown to contribute to a multiplicity of well-being outcomes (Brown & Ryan, 2003; Kabat-Zinn, 2005).

In his introduction of T.K.V. Desikachar's "Reflections on Yoga Sūtra-s of Patañjali", Kausthub Desikachar states that "Yoga", one of three ancient schools of thought, not only strives to achieve the goal of freedom from suffering, but also recognizes the role of the human mind in day-to-day functioning (Desikachar, 1987, p.7). T.K.V. Desikachar affirms that the Yoga Sūtra-s of Patañjali is the most universal guide to a comprehensible Yoga practice: "... it focuses on the mind – what its qualities are and how we can influence it ..." (Desikachar, 1995, p. 9). The four chapters of the Yoga Sūtra-s outline the total philosophical wisdom of Yoga, and, according to Patañjali, the innate mindfulness within humans is considered both a source of problems and their solution.

Attempts by Western scholars and researchers to understand and describe fully this complexity of the process of mindfulness has made articulating a definitive operational description difficult. Three essential components of mindfulness were proposed as a model by Shapiro, Carlson, Astin, & Freedman (2006), enhancing an operational definition proposed previously by Bishop, Lau, Shapiro, Carlson, Anderson, Carmody, *et al.* in 2004. These researchers incorporated Kabat-Zinn's widely accepted definition of mindfulness (*i.e.*, purposefully paying attention in a particular manner) when developing their model. Thus, in addition to the two proposed components of the earlier prototype by Bishop *et al.* (2004), 1) self-regulation of attention maintained on the immediate experience; and, 2) an attitude which embraces a curious, open, and accepting point of reference toward one's experience, the most current operational model also

includes the third component "intention", or purposeful vision (Shapiro *et al.*, 2006). The addition of "intention" as the third component to the operational definition of mindfulness has been considered vital for comprehending the progressive aspect of mindfulness in its entirety.

## Self-regulation of Attention

A mindful individual brings awareness to the internal and external present experience, nonjudgmentally observing changing thoughts, feelings, and sensations, by regulating attentional focus (Bishop et al., 2004). This "self-regulation" facilitates preservation of functional stability while sustaining adaptability to new situations (Kabat-Zinn, 1990). Self-regulation of attention originates from an orientation of openness, curiosity, kindness, and acceptance. It consists of the ability to: 1) attend to an entity for long periods of time; 2) intentionally "switch" attention between objects; and, 3) reduce or inhibit secondary elaborative processing (e.g., getting caught up in ruminative viewpoints about one's experience) of thoughts, feelings, and sensations in order to enhance direct experience of events (Bishop et al., 2004; Shapiro, Carlson, Astin, & Freedman, 2006). Increasing self-regulatory abilities can create a fundamental shift in perspective from "being immersed in the drama of our personal narrative or life story" to being "able to stand back and simply witness it" (Shapiro et al., 2006, p. 377). Thus, staying in the present moment (i.e., being mindful) increases an individual's attentiveness to direct experience itself and interpretations of experience are actively dispelled (Shapiro et al., 2006).

In the first chapter of the Yoga Sūtra-s of Patañjali, Yoga is defined as "*nirodha*", a specific state of mental functioning which exemplifies consistent focused attention,

considered the highest level of the mind (Desikachar, 1995, p.121). Patañjali's Yoga Sutra I.2 has been translated by T.K.V. Desikachar in "Reflections on Yoga Sutra-s of Patañjali" as: "Yoga is the ability to direct the mind exclusively towards an object and sustain focus in that direction without any distractions" (Desikachar, 1987, p. 18). Indeed, it is also pointed out that this "object" of focus may be either concrete or abstract and it is further explained that attaining the state of *nirodha* is dependent on the individual's ability to identify and take control of lower levels of the mind's activities.

Thus, the first component of mindfulness (*e.g.*, self-regulation of attention) as denoted through Western scientific evidence-based research coincides directly with explanations found in the ancient Yoga Sūtra-s of Patañjali. Kabat-Zinn mentions that bringing mindfulness to any pursuit transforms it into a form of meditation and undeniably increases the probability that one's perspective and self-understanding will be enhanced (Kabatt-Zinn, 1990). Kausthub Desikachar has likewise stated in the introduction to "Reflections on the Yoga Sūtra-s of Patañjali" that a disciplined mind that is focused and free from habitual activity can more accurately perceive moment to moment happenings, thus actions based on such attentive perceptions will not cause suffering (Desikachar, 1987). In Mindfulness-Based Stress Reduction (MBSR) programs, Kabat-Zinn and other instructors recommend various ways to practice "being in the body", and therefore being attentive with meditative awareness. Kabat-Zinn specifically cites gentle Hatha Yoga as one of the most powerful forms of focusing attention (1990, p. 95).

#### Attitude

The "orientation of experience", the manner in which attention is regulated, is also considered an indispensable element of mindfulness. The way one attends to each experience becomes qualitative in nature, essential to the attitudinal foundation of mindfulness. In many contemplative traditional languages, the words for "heart" and "mind" are the same. The combination of Japanese characters which signify mindfulness are denoted by interactive symbols for "mind" and "heart", further illustrating the importance of an attitude of friendliness, affection, compassion and openheartedness in mindful states (Santorelli, 1999). Indeed, mindfulness involves discarding "one's agenda to have a different experience" and allowing "an attitude of openness and receptivity ... to occur in the field of awareness" (Bishop et al., 2004, p. 233). Therefore, being mindful includes the effort to notice each moment, every thought, all feelings and any sensations with an attitude of patience, acceptance, non-striving, and friendliness.

In "Light on Yoga", B.K.S. Iyengar speaks of the comprehensive meaning of the second Limb of Yoga, "ahimsa", as more than merely "not killing or non-violence". Iyengar states that ahimsa is a far-reaching "attitudinal" approach to experiencing life with a much wider positive meaning — love. He specifically says that "…(the yogi) … knows that his life is linked inextricably with that of others and he rejoices if he can help them to be happy." When a conflict must be confronted, the yogi proceeds with a compassionate loving nature and "… the battle is won because he fights it with love" (Iyengar, 1979, p.32). This example from Iyengar helps to demonstrate how "attitude", the second component in the operational definition of mindfulness in Western evidentiary

science corresponds unequivocally with the ancient philosophical basis of the Yoga Sūtra-s of Patañjali.

#### Intention

It is the "intention" to focus attention on the immediate experience again and again that is an essential aspect of mindfulness for enhancing one's inherent capacity to be mindful in everyday life experiences. Kabat-Zinn wrote: "Your intentions set the stage for what is possible . . . keeping particular attitudes in mind is actually part of the training itself, a way of directing and channeling your energies so that they can be most effectively brought to bear in the work of growing and healing" (1990, p.32). As one of three central components in mindfulness-based awareness programs, "intention" augments the overall meaning of the theory of the operational definition of mindfulness by clearly establishing it as a vibrant and evolving process that progresses with time and that can ultimately expand insight and awareness. Accordingly, seven attitudinal factors that are considered critical to "right intention" (e.g., acceptance, non-judging, nonstriving, beginner's mind, patience, trust and letting go) make up the foundation of a potentially flourishing mindfulness practice that is continually purposefully nurtured and developed (Kabat-Zinn, 1990, p. 33). Thus, the quality of the attitude that is brought to the practice of mindfulness will definitively influence the long-term value to the practitioner.

This component of "intention" that is considered so important to the nurturing of one's mindfulness practice in programs such as Mindfulness-Based Stress Reduction is basically described in the second chapter (*e.g.*, *Sādhanapādah*) of the Yoga Sūtra-s of Patañjali as certain qualities that are vital in order for the Yoga practitioner to

progressively and effectively transform from a state of distraction to one of attention. T.K.V. Desikachar interpreted Patañjali's Yoga Sutra II.1 as follows: "The practice of Yoga must reduce both physical and mental impurities. It must develop our capacity for self examination and help us to understand that in the final analysis, we are not the masters of everything we do." (Desikachar, 1987, p. 46). Desikachar further explained the significance of this Sutra: "... the more we refine ourselves through Yoga the more we realize that all our actions need to be re-examined systematically and that we must not take the fruits of our actions for granted." (Desikachar, 1978, p. 46). Patañjali's Yoga Sutra II.29 contains the description of the eight components of Yoga, which bring forth greater intensity with respect to refining one's state of introspection (e.g., practicing mindfulness). Intention is primarily focused on with regard to 1) attitudes toward environment and self; 2) body and breathing practices; 3) restraint of the senses; 4) ability to direct one's mind and to develop interactions with what needs to be understood; and 5) complete integration with that which is to be understood (Desikachar, 1978, p. 61).

Ultimately, this third essential component of mindfulness (*e.g.*, intention) as defined by Western researchers also coincides with the philosophical embodiment of the Yoga Sūtra-s of Patañjali.

### Dispositional Mindfulness

Much of the literature written in reference to defining and operationalizing the mechanisms of mindfulness has focused on mindfulness practice during interventions such as the Mindfulness-Based Stress Reduction (MBSR) program. MBSR programs have gained considerable attention as successful clinical procedures to assist individuals in decreasing cognitive vulnerability to stress and have been utilized with clinical

(i.e., cancer, cardiovascular disease, chronic pain, depression) and non-clinical (i.e., health care professionals, industrial workers, students, prisoners) populations, indicating noteworthy outcomes of stress reduction and improved mental well-being (Bishop et al., 2004; Kabat-Zinn, 2003). The most definitive substantiation of the benefits of mindfulness has been this research examining positive physical and psychological effects of interventions in these various populations. However, Kabat-Zinn (2003) also points out that mindfulness is definitely an inherent human capacity and that everyone is mindful from moment to moment to one degree or another. Relatively little research has been carried out to examine the general tendency to be mindful in daily life (i.e., dispositional mindfulness) and to investigate the intra- and interpersonal distinctions of such naturally occurring aspects of mindfulness. Brown and Ryan (2003) approached mindfulness as a state of consciousness in which there is considerable variability in both quality and frequency with which individuals employ present centered attention and awareness. Comparably, Baer, Smith, and Allen (2004) identified four constructs that may be involved in dispositional mindfulness: 1) describing or labeling the experience without judgment; 2) accepting, allowing, or being non-evaluative about present moment experience; 3) observing or noticing internal (e.g., body sensations) or external (e.g., sound) stimuli; and, 4) acting with awareness rather than on "automatic pilot". These two groups of authors have developed instruments for assessing the general tendency of mindfulness for use in various populations.

Research by Thompson and Waltz (2007) revealed that dispositional mindfulness was found to be positively associated with individuals being conscientious and agreeable, and inversely related to neuroticism. Another investigation examined the association of

dispositional mindfulness to "enhanced neural regulation of affect during an affect labeling versus gender labeling control task" (Creswell, Way, Eisenberger, & Lieberman, 2007, p. 560). Results showed that dispositional mindfulness was associated with widespread prefrontal cortical activation, which potentially links it to reduced mood disturbance and decreased negative affect, and also implies that dispositional mindfulness can possibly improve physical health (Creswell *et al.*, 2007).

In "Full Catastrophe of Living", Kabat-Zinn points out the advantages of utilizing gentle Hatha Yoga as part of the MBSR program curriculum, confirming that it can be beneficial at any level of physical conditioning: it is very gentle, it can be modified to accommodate a variety of levels of physical capability, and it can be done standing up, lying down or sitting (Kabat-Zinn, 1990, p. 100). He refers to Yoga as a type of "full-body" conditioning that helps improve strength and flexibility of the whole body. Kabat-Zinn mentions that, above and beyond the physically valuable aspects of Yoga, the most remarkable thing about it is its ability to boost energy level as one achieves greater connectedness and begins to realize integration of mind and body, as well as completeness through disciplined practice (Kabat-Zinn, 1990, p. 101).

Baer and Krietemeyer (2006) indicate that programs aimed at encouraging application of mindful awareness to daily activities cultivate heightened self-awareness and enhance capabilities in making decisions about difficult situations as they arise. Through attentive practicing of Yoga, Kabat-Zinn believes one can begin to perceive subtle changes in perspective in regard to body, thoughts, and whole sense of self, thus enhancing ability to enrich inner work enormously, and, therefore, potentially moving far beyond physical benefits (Kabat-Zinn, 1990, p. 103).

In essence, mindfulness practice is something that deals with our daily lives. As a scientist, writer and meditation teacher passionately engaged in bringing mindfulness meditation practice into mainstream medicine and society as a means of empowering individuals to find ways to cope with stress, Jon Kabat-Zinn has been able to integrate Patañjali's profound philosophical understanding of the mind as explained through the Yoga Sūtra-s into MBSR programs. And his efforts, among others in the field of objective, evidence-based research, have engendered other viable mindful awareness programs. More and more, mindfulness meditation is becoming a natural part of Western civilization, and the ancient yogic philosophy of the Yoga Sūtra-s of Patañjali has been the catalyst for creating the means by which mindfulness has found its way into Western civilization.

#### REFERENCES

- Baer, R. A., Smith, G. T., & Allen, K. B. (2004). Assessment of mindfulness by self-report: The Kentucky Inventory of Mindfulness Skills. *Assessment*, 11(3), 191-206.
- Bishop, S. R., Lau, M., Shapiro, S., Carlson, L., Anderson, N. D., Carmody, J., *et al.* (2004). Mindfulness: A proposed operational definition. *Clinical Psychology: Science and Practice*, 11(3), 230-241.
- Brown, K. W., & Ryan, R. M. (2004). Perils and promise in defining and measuring mindfulness: Observations from experience. *Clinical Psychology: Science and Practice*, 11(3), 242-248.
- Brown, K. W., & Ryan, R. M. (2003). The benefits of being present: Mindfulness and its role in psychological well-being. *Journal of Personality and Social Psychology*, 84(4), 822-848.
- Creswell, J. D., Way, B. M., Eisenberger, N. I., & Liebermann, M. D. (2007). Neural correlates of dispositional mindfulness during affect labeling. *Psychomatic Medicine*, 69, 560-565.
- Desikachar, T.K.V. (1987). *Reflections on Yoga Sūtra-s of Patañjali*. India: Krishnamacharya Yoga Mandiram
- Desikachar, T.K.V. (1995). *The heart of yoga: Developing a personal practice*. Vermont: Inner Traditions International.
- Iyengar, B.K.S. (1979). *Light on yoga: The bible of modern yoga its philosophy and practice*. New York: Schocken Books, Inc.
- Kabat-Zinn, J. (2005). Coming to our senses: Healing ourselves and the world through mindfulness. New York: Hyperion Books.
- Kabat-Zinn, J. (2003). Mindfulness-based interventions in context: Past, present, and future. *Clinical Psychology: Science and Practice*, 10(2), 144-156.
- Kabat-Zinn, J. (1990). Full catastrophe living: Using the wisdom of your body and mind to face stress, pain, and illness (15th ed.). New York: Random House, Inc.
- McCracken, L. M., Gauntlett-Gilbert, J., & Vowles, K. E. (2007). The role of mindfulness in a contextual cognitive-behavioral analysis of chronic pain-related suffering and disability. *Pain*, 131(1-2), 63-69.
- Santorelli, S. (1999). *Heal thy self: Lessons on mindfulness in medicine*. New York: Crown Publishers

- Shapiro, S. L., Carlson, L. E., Astin, J. A., & Freedman, B. (2006). Mechanisms of mindfulness. *Journal of Clinical Psychology*, 62(3), 373-386.
- Thompson, B. L., & Waltz, J. (2007). Everyday mindfulness and mindfulness meditation: Overlapping constructs or not? *Personality and Individual Differences, 43*, 1875-1885.