

# Office of the Senior Practitioner

## *Positive Solutions in Practice:*

# Mindfulness

Issue No. 1, 2007

*'Mindful staff increase learning and reduce aggression in adults with developmental disabilities'*

Mindfulness training has been shown to be an effective way to defuse anger and can be used by parents, staff and people with a mild intellectual disability. Nirbhay Singh and his colleagues have shown that staff and carers who teach and use mindfulness increase learning, happiness and reduce aggression in children and adults with an intellectual disability.

Singh and colleagues developed a mindfulness training, which they called "Meditation on the Soles of the Feet". This meditation technique encourages an individual to stop and think before acting by changing their attention from thing that made them angry to a neutral emotion (e.g., focus on the soles of their feet). The individual is taught that when they get angry they need to stop, focus their mind on a neutral part of their body (soles), calm down and make a choice how to react. Once learnt, the technique can be used successfully by people with a disability, parents and support workers to defuse anger.

There are several types of mindfulness training, all originating from Buddhist traditions. Singh and colleagues use a form developed by Jon Kabat-Zinn.

### **The main steps involved in Mindfulness training**

1. Work out the triggers to verbal or physical aggression.
2. Learning to be mindful of the soles of their feet until they are calm.\*
3. Walking away from the situation without anger.

#### **\* Mindful training**

- Stand or sit with soles of feet flat on the floor
- Breathe normally
- Thinking of something that lead to an angry feeling
- Shift focus to soles of feet and wait until calm

1. Singh, N.N., Wahler, R.G., Adkins, A.D., Myers, R.E., Mindfulness Research Group. (2003). Soles of the feet: a mindfulness-based self-control intervention for aggression by an individual with mild mental retardation and mental illness. *Research in Developmental Disabilities, 24*, 158-169

# Mindfulness

No.1, 2007

## Methods and results

Using a case study and pre-test, training, follow-up design, Singh and his colleagues (2003)<sup>2</sup> found that a mindfulness-based self-control intervention worked for a 27 year old man who had a mild intellectual disability and a mental illness and who had been institutionalised several times for uncontrolled aggression.

Following observations of behaviour, “James” was taught “soles of the feet” meditation for 30-minute role-plays and practice sessions, twice a day for 5 days, homework practice assignments were given for another week. Observations were made of his behaviour both by behaviour specialists and trained care providers for an 8-hour period every 3 months for 12 months. James was followed up for another 12 months and during this time both staff-rated and self-rated observations were collected.

The results showed major declines in aggressive behaviour during the treatment period and declines continued during the 12 months after training had finished. In addition, James was taking two medications prior to the training. These were replaced with one medication and then gradually reduced over time to none. The reduction of the medication had no effect on behaviour, and his treatment team felt he no longer showed signs of having a mental illness. These results suggest that mindfulness-based training may be a better alternative to traditional interventions.

In another study, Singh and his colleagues (2004)<sup>3</sup> used mindfulness training with staff who supported three men who had profound multiple disabilities (as well as profound intellectual disability, all had severe quadriplegia and none had functional speech). A staff member or carer who was trained in mindfulness. Regardless of the level of “happiness”, men who spent their leisure time with one of the trained staff were rated as happier being with that staff member or carer after the carer had received training than before training.

More recently Singh and his colleagues (2006) found that mindfulness training in addition to intensive behavioural training lead to decreases in aggressive behaviours and in the use of physical restraints and increased learning daily living skills.

Finally, mindful parenting has also been found to lead to a reduction of aggression, non-compliance and self-injury in children with autism and to lead to increases in mother’s satisfaction with their own parenting skills (Singh and colleagues, in press).

***Singh and colleagues found that mindfulness training was much more effective than behavioural training alone***

- 
2. Singh, N.N., Lancioni, G.E., Winton, A.S.W., Wahler, R.G., Singh, J., & Sage, M. (2004). Mindful caregiving increases happiness among individuals with profound multiple disabilities. *Research in Developmental Disabilities, 25*, 207-218.
  3. Singh, N.N. Lancioni, G.E., Winton, A.S.W., Singh, J., Curtis, W.J., Wahler, R.G., & McAleavey, K.M. (in press). Mindful parenting decreases aggression and increases social behaviour in children with developmental disabilities. *Behavior Modification*

# Mindfulness

No.1, 2007

Although it is unclear what it is about mindfulness training that is effective changing behaviour, Singh and colleagues (2006) speculate that mindfulness training is beneficial because it:

- Encourages acceptance of acceptance of self and others.
- Produces calm attention to self and others.
- Encourages reflection and responsiveness to others.
- May encourage improved brain and immune functioning (Davidson and colleagues, 2003).<sup>4</sup>

## Practice implications and applications

- Training staff in mindfulness can lead to increases in levels of happiness and quality of life of clients with profound multiple disabilities.
- Mindfulness training results in changes behaviour in the long term (at least over 12 month period).
- Mindfulness training may be a better alternative, or a useful addition, to traditional forms of controlling aggressive behaviour.

## Limitations

- Most of the studies use small numbers of participants (1 – 18 people); however the results of 13 studies have now been published, and all show that mindfulness training has positive outcomes.
- It is likely that mindfulness training will only be useful for individuals with a mild intellectual disability, because people need have the cognitive ability to learn the mindfulness technique.

## Other references on mindfulness

- Singh, N.N., Lancioni, G.E., Winton, A.S.W., Adkins, A.D., Singh, J., & Singh, A. (in press) Mindfulness training assists individuals with moderate mental retardation to maintain their community placements. *Behavior Modification*.
- Singh, N.N., Lancioni, G.E., Winton, A.S.W., Adkins, A.D., Wahler, R.G., Sabaawi, M., & Singh, J. (in press). Individuals with mental illness can control their aggressive behavior through mindfulness training. *Behavior Modification*.
- Singh, N.N., Lancioni, G.E., Joy, S.D.S., Winton, A.S.W., Sabaawi, M., Wahler, R.G., & Singh, J. (in press). Adolescents with Conduct Disorder can be mindful of their aggressive behavior. *Journal of Emotional and Behavioral Disorders*.
- Singh, N.N., Lancioni, G.E., Winton, A.S.W., Curtis, W.J., Wahler, R.G., Sabaawi, M., Singh, J., & McAleavey, K. (2006). Mindful staff increase learning and reduce aggression by adults with developmental disabilities. *Research in Developmental Disabilities*, 27, 545-558.

---

4. Davidson, R.J., et al., (2003). Alterations in Brain and Immune Function Produced by Mindfulness Meditation. *Psychosomatic Medicine* 65:564-570.

# Mindfulness

No.1, 2007

## Other references on mindfulness (continued)

- Singh, N.N., Lancioni, G.E., Winton, A.S.W., Fisher, B.C., Wahler, R.G., McAleavey, K., Singh, J., & Sabaawi, M. (2006). Mindful parenting decreases aggression, noncompliance and self-injury in children with autism. *Journal of Emotional and Behavioral Disorders*, 14, 169-177.
- Singh, N.N., Singh, S.D., Sabaawi, M., Myers, R.E., & Wahler, R.G. (2006). Enhancing treatment team process through mindfulness-based mentoring in an inpatient psychiatric hospital. *Behavior Modification*, 30, 423-441.
- Singh, N.N., Winton, A.S.W., Singh, J., McAleavey, K., Wahler, R.G., & Sabaawi, M. (2006). Mindfulness-based caregiving and support. In J.K. Luiselli (Ed.), *Antecedent assessment and intervention: Supporting children and adults with developmental disabilities in community settings* (pp. 269-290). Baltimore, MD: Paul H. Brookes.
- Singh, N.N., Wahler, R.G., Winton, A.S.W., Adkins, A.D., and the Mindfulness Research Group. (2004). A mindfulness-based treatment of obsessive-compulsive disorder. *Clinical Case Studies*, 3, 275-288.
- Singh, N.N., Wahler, R.G., Sabaawi, M., Goza, A.B., Singh, S.D., Molina, E.J., and the Mindfulness Research Group. (2002). Mentoring treatment teams to integrate behavioral and psychopharmacological treatments in developmental disabilities. *Research in Developmental Disabilities*, 23, 379-389.
- Singh, N.N., Wechsler, H.A., Curtis, W.J., Sabaawi, M., Myers, R.E., & Singh, S.D. (2002). Effects of role-play and mindfulness training in enhancing family friendliness of admissions treatment team process. *Journal of Emotional and Behavioral Disorders*, 10, 90-98.

---

Written by Lynne Webber, Ph.D., Practice Leader, Research and Service Development, Office of the Senior Practitioner. For more information contact Lynne at [Lynne.webber@dhs.vic.gov.au](mailto:Lynne.webber@dhs.vic.gov.au)