Mindfulness (2024) 15:230–241
https://doi.org/10.1007/s12671-023-02279-1

ORIGINAL PAPER

Assessing the Effect of a 2-Year Mindfulness-Based Training Programme on Personal and Professional Functioning: A Mixed-Methods Study

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Accepted: 29 November 2023 / Published online: 18 December 2023

Abstract

Objectives Mindfulness-based interventions are increasingly a part of mainstream society. The training of professionals to teach these programmes is an important element in maintaining the quality and integrity of this approach. The objective of this study was to examine the experience of trainees undertaking a 2-year training curriculum and how this supported adaptation when they began teaching.

Method The study was a convergent mixed-methods design, including a descriptive survey of trainees using a questionnaire and a descriptive phenomenological exploration of trainees' experiences using focus group interviews.

Results A significant majority of graduates were women and either health professionals or coaches. Most graduates continued to teach after completion of the training, predominantly Mindfulness-Based Stress Reduction (MBSR) or an adapted MBSR. Qualitative analysis revealed themes related to the structure and content of the curriculum, changing identity, sensitivity to local context, the importance of learning this approach in a community, and embodied experience. The latter two themes were particularly significant when navigating challenging emotional and somatic experiences.

Conclusions Teachers-in-training internalised the essential qualities of mindfulness as an awareness practice. This capacity required the effort of personal practice alongside theoretical understanding, the support of community and a willingness to be present with a wider range of experience. These factors combined to support the embodiment of the essential qualities of mindfulness. A majority of graduates actively explored teaching MBIs in their professional contexts after completion, and the personal shifts that they experienced through the cultivation of mindful living during the training provided a robust foundation on which to begin teaching a contemporary mindfulness approach to others in a context sensitive way.

Preregistration This study is not preregistered.

Keywords Mindfulness · Mindfulness-based interventions · Context sensitivity · Teaching methods · Curriculum · South Africa

Mindfulness as a practice and a way of being has been around for millennia, mostly within the Buddhist tradition (Bodhi, 2011). In the last 40 years, mindfulness has become increasingly mainstream, driven to a large degree by a growing body of research (Baminiwatta & Solangaarachchi, 2021) and the availability of mindfulness-based programmes (Cullen, 2011; Kabat-Zinn, 2019; Bishop et al., 2004). These are characterised by a structure, process, language, and content that support broad uptake in heterogenous populations.

From its humble beginnings in the basement of a tertiary teaching hospital in Worcester, Massachusetts, in the late 1970s, Mindfulness-Based Stress Reduction (MBSR) and its subsequent adaptations have become a part of the healthcare environment in many countries across the globe (Kabat-Zinn, 2013). Mindfulness has also contributed to the normalising of meditation as a practice in the broader population, from which anyone might potentially benefit. The value of mindfulness in supporting the well-being of individuals is supported by an increasing evidence base (Zhang et al., 2021). Despite this, concerns have also

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been raised about "misinformation and poor methodology associated with past studies of mindfulness", a need to also consider possible harms, and to be clearer about the degree to which mindfulness-based approaches are helpful and for whom (Van Dam et al., 2018, p. 1).

One unintended consequence of this popularisation is a dilution of the practice and approach, often referred to as "McMindfulness" (Anālayo, 2020). The recognition of this potential for the dilution of mindfulness, has led senior teachers, trainers, and academics to pay particular attention to the way mindfulness-based approaches are taught. The skill with which teachers of mindfulness programmes create an environment conducive to effective learning of the practice and its application in daily living are critically important to ensure that a core thread of substance pervades the field. The natural corollary of this is the recognition that the training of teachers plays a pivotal role in this endeavour (Crane et al., 2010).

There is a dialectic in approaches to teaching mindfulness between focusing on knowledge and theoretical frameworks, and learning mindfulness as an experiential process (Grossman, 2010, 2019). Teacher competency should include direct experience of the practice (Crane et al., 2012) and, significantly, the challenges of practice. A significant influence on learners' capacity to authentically lead a mindfulness-based intervention (MBI) is witnessing and experiencing teachers/trainers model compassionate and insight-informed present-moment awareness, and, as such, the degree to which the qualities of mindfulness are embodied in a teaching setting (Kabat-Zinn, 2003).

One of the central principles of teaching mindfulness-based approaches is that teachers embody the essential qualities and attitudes of the practice (Crane et al., 2010; Kabat-Zinn, 2013; Santorelli, 1999). This requires a deep personal commitment to developing these qualities to "embody the spirit and essence of the meditation practices being taught" (Crane et al., 2010, p. 77). The last decade has seen an emerging body of literature in the pedagogy of mindfulness-based approaches to begin to address the "thorny question" of training MBI instructors (Dimidjian & Segal, 2015). The focus has been on developing effective ways to objectively assess core teaching competencies (Crane et al., 2013). The six aspects to be assessed include coverage, pacing, and organisation of a session; relational skills; embodiment; guiding practices; conveying course themes through interactive enquiry and didactic teaching; and holding the group learning process. In addition, these mindfulness-based intervention teacher assessment criteria (MBI:TAC) can be used to map the development of teachers as well as supporting the teacher-in-training to identify where they are on their learning journey.

There are several tertiary institutions globally—mostly in high-income countries—offering training for those wishing to become teachers of mindfulness-based programmes. While there is some evidence on the effectiveness of MBIs in low-to-middle-income countries (Robinson, 2020), the current study is the first to consider the effect of the *training* on professionals to offer mindfulness interventions in the LMIC context.

Irrespective of where mindfulness approaches are taught, individual and collective stress and suffering of one form or another are pervasive (Feldman & Kuyken, 2011). In Southern Africa, this is shaped and informed by a variety of complex, intersecting social, cultural, and historical dynamics, which require a relatively high level of context sensitivity (Pillay & Eagle, 2021). As such the training of mindfulness teachers in this environment should effectively take this into account. The desired outcome is to maintain the integrity of the approach alongside a flexible response to the community context.

With the focus on competence and integrity in teacher training, there has been little investigation of the experience of the trainees themselves. An initial study (Bowden et al., 2021) investigated the experiences of trainee MBI teachers while they delivered an MBI (Bowden et al., 2021). They found that these trainees were deeply motivated to teach with a high degree of integrity to the approach, and that they practised what they taught and used their personal mindfulness practice to work with challenges that arose while teaching.

Previous studies of the first module of this South African-based training described significant development of a personal mindfulness practice, enhanced self-compassion, and reduced perception of stress, and that the integrated teaching modalities supported effective learning. This initial analysis provided the foundation to proceed with the current research (Whitesman & Mash, 2015, 2016). Here we evaluated students as they exited the 2-year training programme, to assess whether the course curriculum translated into embodied learning and implementation of MBIs.

Method

Study Design

The study was a convergent mixed-methods design, including a descriptive survey of trainees using a questionnaire and a descriptive phenomenological exploration of trainee's experiences using focus group interviews.

Setting

The training consisted of four modules, structured as a series of 8–10-week short courses. By the end of the fourth module, all students were required to teach one 8-week MBI, under weekly supervision. The curriculum used the first-generation MBI, MBSR, as a foundation, with a strong

emphasis on group learning and sensitivity to the context. The four modules are outlined in Table 1.

Descriptive Survey

Participants

All 110 graduates of the first three cycles of the training course were invited to complete an online questionnaire. The entire study population was included.

Procedure

The questionnaire was designed in REDCap and trainees were sent an electronic link to complete the questionnaire.

Measures

A questionnaire was designed to collect basic demographic information and whether graduates had gone on to actually offer MBIs. In addition, the Kentucky Inventory of Mindfulness Skills (KIMS) was completed to assess their practice of mindfulness after exiting the course. The KIMS is an internationally validated scale for measuring mindfulness that was previously used to measure this in a group of trainees at the end of module 1 (Baer et al., 2004; Whitesman & Mash, 2015). The KIMS is a 39-item inventory in which participants rate each item on a 5-point Likert-like scale ranging from 1 (*never or very rarely true*) to 5 (*almost always or always true*). The items described either the presence or absence (reverse scored) of the core components of mindfulness being measured: Observing, Describing, Acting with Awareness, and Acceptance without Judgement.

Data Analyses

The data was exported from REDCap and imported into the SPSS (Version 27) for analysis. Categorical data was analysed descriptively and reported as frequencies and percentages. The four constructs in the KIMS were calculated using the instructions from the manual and reported as mean scores (Baer et al., 2004). The KIMS describes four core mindfulness skills:

1. Observing refers to the importance of noticing or observing internal and external phenomena
2. Describing refers to non-analytical labeling or naming of phenomena
3. Acting with awareness refers to focusing on the current activity with undivided attention
4. Accepting (or allowing) without judgement refers to being nonevaluative about present experience and to allow this experience to be as it is

Descriptive Phenomenological Study

Participants

The study population was all graduates that had completed the course during the first three cycles. They were all invited to participate in the focus group interviews. Participation in the group was self-selected. All graduates were considered equally valid sources of information. Graduates were invited via email and the intention was to interview a minimum of 24 graduates, eight per cycle. The final sample size was determined when data saturation was achieved. In the first cycle, all graduates living around Cape Town were invited to be interviewed as the interviews were held face to face. In the second and third cycles, during the COVID-19 pandemic, all graduates were invited to be interviewed virtually.

Procedure

Three semi-structured focus group interviews (FGI) took place between February 2018 and November 2020. The first group from the first cycle met in person at the Colleges of Medicine of South Africa in Cape Town and the interview was digitally recorded. The second two interviews were conducted on Zoom due to the lockdown during COVID-19 and were also recorded. Each FGI lasted approximately 90 min and was facilitated by RM (FGI 1) and a research assistant (FGI 2 and 3) from the Division of Family Medicine and Primary Care at Stellenbosch University, both of whom were experienced in qualitative interviewing. All interviews were conducted in English.

Data Analyses

An interview guide defined the opening question as "please tell me about your experience of the course on mindfulness-based interventions, which you have just completed?". The guide then explored which aspects of the curriculum were effective, and the degree to which the curriculum became internalised (embodied) and *lived* in both a personal and professional context.

Verbatim transcripts were checked and corrected. The transcripts were then entered into Atlas-ti and analysed using the Framework Method. This method involved five steps (Pope et al., 2000):

Table 1 Overview of the training curriculum

	Module 1	Module 2	Module 3	Module 4
Name	Mindfulness from the inside-out: an introduction to mindfulness and mindfulness-based approaches	Blending form and essence: exploring the key elements of a mindfulness-based intervention	The courage to teach: the person and presence of the teacher	The ground beneath our feet: the foundations of mindfulness
Duration	10 weeks	10 weeks	8 weeks	6 weeks
Aim	For participants to begin to explore the practice of mindfulness experientially and to understand the theoretical basis and context of its application	To understand the architecture, essential content, and process of a mindfulness-based intervention	To examine and experience the skills and attitudes that make up the person of the teacher of a mindfulness-based intervention/programme To plan, organise, teach, and critique a mindfulness-based intervention/programme	To experience the depth of mindfulness practice and the ethos from which it arose To consider the connections between the source of these teachings and their contemporary expression
Learning outcomes	1. Engage in, reflect on, and discuss the foundational formal practices of mindfulness 2. Engage in, reflect on, and discuss the application of mindfulness during daily life 3. Appreciate and demonstrate a basic understanding of the core theoretical and philosophical aspects of mindfulness 4. Appreciate the contextual application of mindfulness-based interventions 5. Connect the theoretical elements of mindfulness with personal experience	1. Develop an understanding of the metastructure of the Mindfulness-Based Stress Reduction (MBSR) programme as the foundation for all mindfulness-based interventions (MBI) 2. Develop a basic understanding of how the curriculum builds on itself through the interaction of meditation practices, enquiry, and didactic input 3. Develop an understanding of the rationale behind the use and integration of core elements of the curriculum in MBSR 4. Develop an understanding of weekly themes in MBSR 5. Develop a basic understanding of Mindfulness-Based Cognitive Therapy (MBCT) and the similarities and differences between MBSR and MBCT 6. Develop a basic insight into the intent and nature of the enquiry process 7. Become trauma-informed 8. Explore and understand the basic principles of trauma-sensitive mindfulness 9. Begin experimenting with guiding formal mindfulness practices	1. Explore, experience, and reflect on the skills and attitudes that make up the person of the teacher of a mindfulness-based intervention 2. Plan a mindfulness-based intervention under supervision 3. Reflect on and write up the ethical foundations for teaching a mindfulness-based intervention 4. Guide and record a formal mindfulness practice in your own voice and style 5. Teach an MBI by the end of module 4 with weekly supervision	1. To strengthen attentional capacity 2. To deepen the capacity for self-compassion 3. To increase capacity to effectively and healthily engage with personal suffering and its transformation 4. To understand the relationship between the historical roots and contemporary application of mindfulness 5. To appreciate the connections between personal experience and self-knowledge with teaching a mindfulness-based approach 6. To appreciate the relationship between personal experience and common/universal experience
Learning methodologies	Each online module was combined with a face-to-face retreat. Online modules included theoretical content, webinars, video material, asynchronous online discussion forums, and synchronous chat room discussions. Retreats focused on personal and group mindfulness practices. In addition, there was a system of learning partner practice and support, group and individual supervision			
Assessment	Each module was assessed with a written assignment 60%, engagement with distance learning process 20%, engagement with supervision 20%			
Retreat	5-day	5-day	5-day	7-day silent

1. Familiarisation with the data
2. Construction of a coding index
3. Application of the codes in the index to all qualitative data
4. Charting of the same codes or code families together
5. Interpretation of the charts in terms of the types of themes and range of different opinions/experiences within these themes and possible associations between themes

The first author of this paper is also the convenor of the 2-year training programme as well as the curator of most of the curricular content. He is a medical doctor and psychotherapist who is a thought leader in the field of mindfulness in South Africa. Such proximity to the course material and participants brought both strengths and weaknesses to the analytical process. The data were collected by independent interviewers who were not involved in the course, but the analysis of the data was largely conducted by the first author. The author's familiarity with the topic enabled a deeper interpretation of the data, but at the same time had to guard against an overly positive interpretation. The analysis was supervised by the second author, particularly the construction of the coding index and the final interpretation.

Results

A contiguous approach with separate sections is taken to present both the quantitative results and qualitative findings.

Results of the Descriptive Survey

Overall, 74 graduates responded to the survey, which gave a response rate of 74/110 (67%). Table 2 presents the results of the survey. Out of these graduates, the majority were women (81.7%) and the commonest professional groups were psychologists and coaches. Out of the graduates, 71.6% had gone on to offer a MBI and the majority offered MBSR or an adapted version of this (61.9%). Another 27.3% reported they had offered some other type of MBI.

Findings of the Phenomenological Study

Twenty-seven people who completed the training programme participated in one of three focus group discussions held in February 2018, October 2020, and November 2020. Out of this group, 22 were women and 26 were from South Africa, with one person from Zimbabwe. There were 25 health professionals including doctors in general medicine and psychiatry, psychologists, physiotherapists, and dieticians. The two non-health professionals were involved in executive leadership and coaching in the business environment.

The findings are presented as seven themes:

1. Structure, content, and progression of the curriculum
2. Embodied experience as the foundation of mindfulness
3. The attitudinal quality of compassion and non-judgement
4. The ways in which the training contributed to changing sense of identity and personal healing
5. The impact of learning in a community of practice
6. The importance of sensitivity to local context and issues
7. The experience of teaching MBIs beyond the training

Structure, Content, and Progression of the Curriculum

Overall, the course structure and content were reported as a helpful vehicle for learning about and practising mindfulness and beginning to teach it to others. The respondents described a learning environment in which their own subjective experiences, relationships with other students, and engagement with the academic learning material, mutually reinforced, and enhanced each other. The 2-year duration of the course allowed the various curricular elements to integrate and evolve, which the students reported as an unfolding process:

> *I also found for me the balance between the academic and the practice was so, so helpful that it was very clear right up front, this course is you know 50/50 and I set an intention for myself at that beginning of the course that I would read the material after I had practiced or I would, so it was very helpful to have that balance very clearly defined and to grow then with the stimulation of the, the intellectual stimulation and where that in a way can be the practice, with the practice being the grounding thing. (FGI Feb 2018)*

> *I just thought the design was phenomenal … the way it all hung together in terms of the practice and the readings and then having to do an assignment at the end, which wasn't always fun, but it just helped to bring all the learnings together. (FGI Nov 2020)*

The theoretical material created a conceptual understanding of mindfulness, which enabled students to make sense of and embrace their practice. The structure as well as the content was described and experienced as integrated within and across modules, with theory reinforcing practice:

> *I think the strong theory connects the experience, so when you are aware of something you can go ahh I know now about it, how I can relate. So that's why I*

Table 2 Results of the descriptive survey

Variables	*n*	%
Gender (*n*=71)		
Male	13	18.3
Female	58	81.7
Year completed (*n*=73)		
2014	14	19.2
2016	29	39.7
2018	30	41.1
Profession (*n*=74)		
GP/family medicine	4	5.6
Psychiatrist	3	4.2
Other Medical Specialist	4	5.6
Psychologist	19	26.8
Counsellor	5	7.0
Physiotherapist	2	2.8
Dietician	2	2.8
Occupational therapist	1	1.4
Coach	14	19.7
Educator	6	8.5
Faith-based minister	2	2.8
Other	9	12.7
Teach MBIs post training (*n*=72)		
No	19	26.4
Yes	53	71.6
Form of MBI (*n*=74)		
Mindfulness-based stress reduction	20	36.4
Mindfulness-based cognitive therapy	6	10.9
Adapted mindfulness-based stress reduction	14	25.5
Other	15	27.3
Kentucky Inventory of Mindfulness Skills (*n*=74)	**Mean** (***SD***)	**95%CI**
Observe	49.0 (4.2)	48.1-50.0
Describe	32.0 (4.5)	31.3-33.3
Act with awareness	34.5 (4.9)	33.4-35.7
Accept without judgement	34.7 (6.0)	33.3-36.1

> *think the strong theory is so important because the… factors they tend to just light up, okay we are working with trust here, and okay we are working with judgement here and oh I see greed popping up, or hatred or, so that's really just been softening…just being open to the experience. (FGI Feb 2018)*

Learning was not without challenges, which varied from struggling with different aspects of group learning (e.g. retreats, online discussion fora), the scientific content, especially for those who did not have background training in science, and the demands of daily mindfulness practice. Many students were challenged by the nature of online group learning, including technical skills, internet stability, and sharing personal narratives in a digital format. In particular, the practice and process of enquiry was cited as the most challenging skill to develop:

> *This is also not to say that it didn't have its many pitfalls and many times when it felt like nobody is listening to how hard this is sometimes and the many times technology …would fail and the many ways in which it was difficult to plough through the complicated scientific papers that sometimes didn't make any sense as to why do I have to read this. It came together in the end… what I think one of the highlights of my life and definitely one of the best investments I've ever made.* (FGI Oct 2018)

As the course progressed, students reported an evolving perspective and growing clarity on the relevance of different curricular elements, with respect to how these related to their practice and the teaching of mindfulness to others:

> *Reading all the articles and moving through them, I absolutely enjoyed, it was what I wanted to do, and it was the information I was looking for. But gee-whiz the meditations and needing to sit in meditation and needing to learn to allow time for meditation. I just initially felt this is a lot of time that I have to give away. And I've got a lot to do and now I need to just sit and do nothing. So it was a huge learning curve for me, but as it started developing and I started feeling the change within myself, and I then started really understanding what it was like to be a mindful therapist and being present…truly present and truly embodied. (FGI Oct 2020)*

In retrospect, students observed how the modules were connected and enabled a progressive learning journey towards becoming a teacher of mindfulness. The course used different learning methods, such as group learning with different group sizes and structures, theory presented in various ways (e.g. readings, webinars, and documentaries), discussion for a, and personal exploration of formal and informal mindfulness practices. Participants reported that these methods often catalysed a quality of curiosity that advanced learning into domains not only connected to, but also beyond the scope of the curriculum. For example, awareness of trauma, through direct personal experience of this arising during personal practice, exposure to others in the group who shared traumatic experiences, and prescribed articles in the emerging area of trauma-sensitive mindfulness increased interest in becoming more trauma-informed.

Respondents reported that retreats were significant parts of the learning journey. They described that the way in which the teachers modelled non-judgemental, authentic responses to the challenges that emerged during intensive

practice was immediate and palpable with the "modelling of the facilitators, the way they taught us (being) really useful for me in knowing how to teach others…how to hold space." (FGI Nov 2020) The retreats offered a space for students to observe both individual and collective growth, and to experience compassion, quietude, and stillness. This deepened and enriched their experience of practice. The retreat was a space that supported self-discovery through an embodied collectivism, a felt-sense that one's immediate experience was witnessed and shared in an increasingly refined and accepting way that was both grounding and containing:

> *For me the presence of our teachers was impeccable. They really held the space with a realness and honesty, that allowed us to touch into our suffering, because they had an ability to touch into themselves and into their own hearts and it was a permission to just be real in that moment.* (FGI Feb 2018)

Embodied Experience as the Foundation of Mindfulness

Students explored their personal mindfulness practices as the course progressed, in which they described consistent recognition of and reflection on a sense of embodiment. That is, a moment-to-moment awareness of subjectively inhabiting a dynamic and sensate landscape within one's own body:

> *I really feel that the course was laid out as such that, that certainly for myself even though I am not quite sure you know where I know what I want to do, because it looked like in the future, it's the real sense of something having shifting and I think it's the embodiment that has shifted and you know there is a sense of no longer being the same or, that I was two years ago and that fundamentally is for me just remarkable, it's just, and I think it really I gives me the confidence to know deeply that this is something I want to continue working with. (FGI Feb 2018)*

This involved the cultivation of a variety of practices, both formal and in everyday life, which were reported as supporting body awareness (such as the body scan, mindful movement, and pausing during daily life to attend to posture and breath) as well as providing a variety of anchors (that is specific, focal objects of attention such as the breath) that opened new possibilities of being with, rather than reacting to, unpleasant experiences:

> *When you feel you getting reactive to just drop into and to feel the feet and to just breath you know, so those are the skills that are really helpful in my own life, not just to teach that skill to other people. (FGI Nov 2020)*

Students consistently reported the impact of the teachers' modelling of embodiment and how that would inform their own teaching going forward. These included qualities of authenticity, care, and vulnerably, expressed through embodied practice:

> *With regards to the embodiment…the presence of our teachers was impeccable. They really held the space with a realness and honesty, that allowed us to touch into our suffering, because they had an ability to touch into themselves and into their own hearts and it was a permission to just be real in that moment. (FGI Oct 2020)*

The Attitudinal Quality of Compassion and Non-judgement

There was a broad range of experiences reflected in the data, which conveyed the sense of a developmental arc towards increasing compassion, with a "deeper sense of caring I think for myself and for my own mind" (FGI Oct 2020). There was consistent reporting of a sense of transformation as a consequence of enhanced self-compassion in particular over the course of the training:

> *I find that I'm also less judgmental about other people, and that I can hold space for a variety of people. It's like you see their essence of who they really are. And that was a huge change for me. And it's, it's freed me to a great extent, and I'm very grateful for that. And I also find that these greater kindness towards other people, and also towards myself, and it almost begins with myself I can, I can bring it into a relationship as well. And a lot more patience as well in relationships.* (FGI Nov 2020)

Congruent with growing self-awareness, respondents recognised the absence of self-compassion, predominantly in the form of identification with a self-critical voice:

> *You know, like look at this, hell can't she just sit on that cushion and… now it's not that, now it's more the sense of actually this is necessary, this is self-care… it's hard, but just go and sit on it, because it's part of the self-care. (FGI Oct 2020)*

Many of the students reported that they noticed self-compassion evolving along a continuum as the course evolved. This changing relationship with sense of self and inner experience was viewed as constructive, positive, healthy, and even at times transformative. The course content and processes, particularly the retreats, were described as supporting the growth and development of this essential quality of mindfulness:

I think I became a lot less hard on myself and a lot more self-compassion and self-acceptance. And I think that means I have a lot more compassion for people around me, and I think I'm a little bit less reactive, and so I am a little bit less and a little bit slower to jump in, than I would have been before. I think I gave a little bit more space for people just to be human. (FGI Nov 2020)

There were a few reports, albeit uncommon, that the course did not pay sufficient attention to self-compassion, that this component was "missing from the course" (FGI Oct 2020) and needed to be more explicit, although this feedback was uncommon. Witnessing the teachers modelling authenticity and vulnerability, and responding in these moments with self-compassion, was an important way for students to learn about compassion and begin to internalise this:

During the retreat…I was sitting watching her [teacher] thinking how extraordinary, how much time she is spending, now I understand what she was doing…the level of self-care required to do this work is starting to dawn on me…in order to embody this without that, it is almost impossible to do. (FGI Feb 2018)

The Ways in Which the Training Contributed to Changing Sense of Identity and Personal Healing

A consistent finding in the data was the impact of the course on personal development. This covered several domains including insight into the nature of the mind, reduction in self-judgement, increased self-compassion, and increased response flexibility (skillful or wise choices and actions). The consequences were reported as a changing perception of self and the world, a shift in relationship with internal phenomena, and inter-subjectivity (i.e. relationships with others) and, as such, a shift in sense of identity:

I now understand my mind just even a tiny bit more, and it's so interesting, the perspective that my thoughts are not facts, and that I can continuously check myself, and actually it's a very liberating thing for me. (FGI Oct 2020)

I grew as a person, I discovered things about myself in the course that I kind of repressed or just never acknowledged, and what I found now, after completing the course, is that I'm definitely more grounded every day. (FGI Nov 2020)

The Impact of Learning in a Community of Practice

Respondents reported a sense of belonging, connectedness, being part of a community, and practising mindfulness together, allowed for a growing sense of authenticity and vulnerability to emerge and be held within the group. This supported individual learning as well as motivation to practise mindfulness on a daily basis:

It was quite surprising for me how such a group of diverse people could come together and meet in this way and unfold so many different things for each other in such an authentic way. It was really deeply authentic connections and vulnerabilities and courage. (FGI Oct 2020)

There was something around that time, and that length of time that we were together …I just loved the way it unfolded. I think that's the word, the whole process just unfolded… (FGI Feb 2018)

The experience of being and belonging in community over time was a common experience across all cycles, with "the length of time that we were together…and the way the whole process unfolded" (FGI Feb 2018). It was not invariable that students experienced this from the beginning, but rather developed over time. This was made possible by a curricular structure that made use of different-sized groups and different group learning formats:

I certainly didn't feel held by the teachers in the first semester. And then the second semester what saved me was…we got into geographically-based study groups and that was when the sense of community really started. (FGI Oct 2020)

Many students reported experiencing significant relationality through the group experience, which supported ongoing formal practice and application in daily life. The importance of the community was paradoxically highlighted by the effect of its absence once the course ended as some students found it "…difficult to maintain the meditation every day… because there was no real accountability for me. So that community I missed" (FGI Nov 2020).

The Importance of Sensitivity to Local Context and Issues

As students engaged with the curriculum and began to offer MBIs in their own communities towards the end of the training period, they reported a growing awareness of the importance of becoming contextually sensitive. The realities of language barriers (including teaching and translating mindfulness into different languages or teaching in English when this was not the participants' home language), access to resources like transport, cell phones and data, the frequent lack of a (quiet) physical space to practise formal mindfulness, and the pervasiveness of trauma were some of the challenges that graduates had to consider. Respondents described

that it was important to be sensitive to these issues, both before teaching, and along with their participants during the teaching process. Despite these challenges, there was an emergent flexibility within these groups, allowing for creative, realistic, and practical responses, which served to enhance the way that the practice could be understood and engaged with:

> *Obviously they couldn't practice for half an hour because they leave home at five, they get home at seven, so we had to adapt those practices for them. Like put it on their phone so that they can sit in the taxi and do their mindfulness practice while they were driving to and from work, or walking to and from work… (FGI Feb 2018)*

> *I have managed to take my diversity and inclusion and equity and anti-racism work and help people through a mindfulness lens take care of how they are being in the moment how they are … responding to hard situations. (FGI Oct 2020)*

The data reflected some of the social dynamics prevalent in South and Southern Africa, most especially issues related to privilege and access to resources, which included the student body itself not being racially diverse relative to the region's demographics. Some of the students articulated that they were "really disappointed by the demographic… It's another lot of white people and not enough diversity so…it was a lot of judgment and reactivity within me…" (FGI Oct 2020).

These data underscored the need for ongoing curricular development, particularly to enhance racial diversity and to offer more trauma-sensitive and informed teaching in future cycles, to make sure "that you can have more voices who bring a lived experience that is outside the status or the dominant group in the course would provide for a richer more contextually situated, authentic experience to the whole course" (FGI Oct 2020).

The Experience of Teaching MBIs Beyond the Training

After completion of the training, the data showed a range in the degree of integration of mindfulness practice into their lives, although graduates overall reported maintaining an ongoing practice, which is essential when teaching others.

For those who continued teaching after graduation, a significant insight was a recognition that the training itself was the beginning of a journey of learning, and that in fact, teaching was its own learning process, that "every teaching moment is a learning experience…the awareness that while you are teaching that this is also a learning experience" (FGI Feb 2018). This learning took various forms, predominantly around enhancing self-awareness, impacting on how they worked with others in a different context:

> *I did a community-based programme voluntarily, we both did it. It was a youth development program in one of the township areas…and I think what was so heartening at the end of that was to realise that this program can easily be done in any sort of community. I just feel that it's totally transferable. (FGI Feb 2018)*

Respondents described that both practising and teaching mindfulness revealed layers of suffering for both themselves and their participants. While this sometimes presented a challenge if they did not feel ready to teach or sufficiently trained to manage what emerged for their participants (for example, a physiotherapist navigating psychological trauma), graduates were able to recognise what was occurring, an essential element of mindfulness, and either ask for support through supervision or make the necessary referral. This demonstrated a capacity to honestly self-reflect and respond skilfully and compassionately to both themselves and their participants:

> *At the end of last year I felt quite burned out by teaching…going into this year very differently, even checking in with myself now, very differently, asking for help from my teacher, the person that I teach with and asking for help from my supervisor and asking for help from my family. (FGI Feb 2018)*

Discussion

Significant changes in personal functioning and the quality of lived experience were reported by the trainees. Mindfulness may be understood as a skill that can be developed through training (Davidson & McEwen, 2012), using standardised scores to measure whether baseline levels of mindfulness, or trait mindfulness, change as a result of an intervention (Nyklíček & Kuijpers, 2008; Shapiro et al., 2011). The KIMS does not have a threshold score to determine competence, but relies instead on changes in the scores to determine changes in mindfulness skills. In this study, we did not have a baseline set of scores for the whole cohort to compare with and therefore it is difficult to interpret the scores obtained. A previous study, on a sub-cohort of learners entering the programme, also measured their KIMS scores (Whitesman & Mash, 2015). This previous study reported their baseline or trait mindfulness scores prior to the training (Observe 40.9, Describe 28.4, Acting with awareness 31.4, Accept without judgment 32.7) and demonstrated a significant improvement in scores after the first module. If one assumes that the entire cohort of learners in

the current study would have similar baseline KIMS scores then the implication is that their KIMS scores after the end of the course reflect a sustained improvement in their mindfulness practice. While trainees found it challenging to learn how to teach a mindfulness-based approach, irrespective of their professional background and previous training, these data suggest that the training supported the internalisation of mindfulness as a skill that was sustainable and affected both functioning and well-being.

Embodiment, defined as the "quality of instantiating into one's being, actions, and phenomenological experience the skills that are cultivated through mindfulness practice" (Dobkin et al., 2014; p. 713), was an essential characteristic of trainees' learning experience. They found that witnessing a trainer embody the attitudes of mindfulness was both encouraging and a necessary component of understanding the role of a teacher in this approach. This was especially impactful in a retreat setting. They recognised how important this quality was when they began teaching themselves as their participants looked to them to communicate the implicit attitudes of mindfulness through *how they were, not simply what they knew*.

One of the most significant findings can be encapsulated in the words of a previous student that "mindfulness heals as it reveals". This was described as an emerging process over the course of the training. It was essential that a safe container was created, initially by the trainers, and then subsequently co-created by trainers and trainees as a group. Through individual and collective practice, and reflection in the online forums, supervision, and on retreats, what was often revealed was emotional vulnerability, as difficult and painful feeling states emerged. The group was effectively contained through mindful presence and compassionate acceptance which allowed co-regulation to occur and be experienced as individual self-regulation (Dana, 2018). This allowed trainees to increasingly *be with* (or tolerate) painful or difficult emotional and feeling states rather than react to them through defensive or self-critical narrative, projection, or denial. These states invariably had a somatic or sensate component; therefore, cultivating this capacity incorporated *being in the body* and as such encouraged embodiment. A community of learning which was accepting, kind, and non-judgemental became the experiential and experimental scaffolding in which healthy vulnerability became the foundation for authentic self-expression. This led to a generative cycle of co- and self-regulation, which was potentially transformative, and as such healing, in any given moment. This was reflected consistently in the qualitative data and confirmed the initial experience of trainees reported in an earlier study (Whitesman & Mash, 2016). The nature of this kind of group learning was an essential component for internalising and applying mindfulness in a personal capacity and to begin teaching it to others. These data suggest that embodiment as a practice and a principle incorporates emotional flexibility and tolerance of difficult emotional states, which is co-regulated through the shared presence of a learning community. This supports and expands the recently described value of teaching MBIs in a group (Griffith et al., 2019) to include the role of the group in teacher training as well.

In the Southern African training context, compassion was experienced as essential to engage with, and relate to, subjects which are emotionally charged and complex such as race and trauma. This quality allowed trainees to be increasingly curious, to listen mindfully to each other, and to be less reactive to individual and cultural conditioning. Early quantitative data on this training programme described an increase in self-compassion after the first module (Whitesman & Mash, 2015), which suggests that both the structure and tone of the training curriculum supported the development of this essential quality of mindfulness.

Individual and collective practice of mindfulness meditation with implicit and explicit cultivation of a compassionate attitude encouraged a non-reactive relationship with difficult emotional states, all of which have a significant somatic component. As the range of emotional tolerance increases, so too does the capacity for authenticity, an important characteristic of the spirit of embodiment which is central to teaching a mindfulness-based approach. This appears to be particularly relevant in this training context given the traumatic and divisive nature of the historical realities and current social dynamics in South Africa. It reinforces the importance of a teacher of this approach being able to create a safe container, which fosters tolerance for and compassionate relating to difficult states associated with these issues.

Trainees discovered increased authentic self-expression through the mutual witnessing and compassionate holding of each other in the group. This reflects the African philosophy of Ubuntu (Nussbaum, 2003) which is directly translated from Zulu as "a person is a person through other people" (Ubuntu ngumuntu ngabantu) or "I am, because we are". This beautifully describes the actuality and essence of learning, exploring, and practising mindfulness in a group format. It also offers a potential bridge between mindfulness *per se* and African contemplative traditions.

The challenges encountered by trainees informed ongoing curriculum development. For example, some students did not have a strong foundation in health sciences (such as coaches, educators, and religious ministers) and as such found some of the academic articles difficult to understand. These students required additional academic support to make sense of the articles, although an in-depth understanding of the underlying scientific methods was not always necessary. Another significant change was informed by a growing awareness that bringing a mindful approach to implicit bias, especially around race, needed to be included in the curriculum, both theoretically and experientially. As such,

from the second cycle of training, experienced facilitators offered a full-day workshop during the module three retreat, entitled *Insight Dialogue and Race*.

Limitations and Directions for Future Research

The students who agreed to participate in the qualitative arm of study were self-selected. We cannot exclude the possibility that those who chose not to participate might have added different themes and there is a possibility that those who felt more negative chose not to be interviewed. The fact that the interviewers were independent of the training process reduced the likelihood that social desirability bias affected responses to questions about their experience. Nevertheless, it is unlikely that participants with a very negative viewpoint would have sustained their commitment to complete the whole 2-year course or committed to the interviews. The qualitative analysis also suggested that a saturation of themes was achieved across the interviews with no new themes emerging in the final FGI.

Both interviewers for the FGIs had only a basic understanding of mindfulness, which might have limited the degree to which nuanced understanding was explored and extracted in the interview process. One theme that was not well developed in this cohort was the role and value of supervision. Mindfulness-based supervision as a specific competency was first described by Evans et al. (2015). However, the requisite training for local supervisors only occurred towards the end of the third cycle, and as such was both more foregrounded and had more impact on subsequent training cycles, which fell outside the cohort that was investigated in this study.

Ongoing research in this area could consider further qualitative studies in which the voice of the graduates and their experience of teaching can be considered alongside the current mechanisms of assessing competence. These data potentially might inform which curricular elements are prioritised in professional training programmes and what new elements need to be considered, without compromising on the fidelity of a mindfulness-based approach. Just as one would consider adaptation of an MBI (Crane et al., 2017), a similar principle might apply in training MBI teachers. This is especially relevant in South Africa given the significant degree of inequality and the endemic levels of trauma, and the need for the training to enhance access and uptake of mindfulness-based approaches for communities in the local context.

The question remains as to whether similar themes might emerge in other low- and middle-income countries in which professional training is offered and how these themes compare to high-income countries. In other words, do economic and social dynamics affect or influence the attitudinal priorities of the training or should the training priorities be standardised irrespective of context?

Further research is being planned to investigate how teachers created MBIs in communities beset by the painful realities for most South Africans: grappling with lack of resources, inequality, endemic violence, and joblessness. Specifically, focus will be brought to how their training experience supported holding difficult states that arose during these MBIs, how they worked with and experienced embodiment in these moments, and what was the effect on the internalisation of mindfulness practices for their participants.

Author Contribution Simon Whitesman: conceptualisation, intervention development, study design, methodology, analyses, and writing original draft. Robert Mash: conceptualisation, editing, and supervision.

Funding Open access funding provided by Stellenbosch University. Funding for this project was provided through the mindfulness cost centre in the Division of Family Medicine & Primary Care at Stellenbosch University.

Data Availability The data that support the findings of this study are available from the corresponding author, SW, upon reasonable request.

Declarations

Ethics Approval All aspects of this study were reviewed and approved by Stellenbosch University Human Research Ethics Committee.

Informed Consent Participants provided informed, signed consent prior to being included in the study and participating in study procedures.

Conflict of Interest The authors declare no competing interests.

Use of Artificial Intelligence No AI tools were used in the writing of this manuscript

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