"The Role of Equanimity in Facilitating Positive Mental States and Mental Wellbeing"

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Declaration

Declaration I confirm that this work is my individual effort and has not been submitted previously in support of any other qualification or course. All quotations and sources of information have been properly acknowledged in the text

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Abstract

Recently, the science behin2d mindfulness meditation has increasingly turned towards how and why its practice can result in such varying change. Whether it is with attention, awareness or structural brain change, research has moved more towards deconstructing mindfulness's psychological attributes. This research investigates and identifies equanimity as one of the key facets of mindfulness therapeutic care. Therefore, the studies within this thesis were motivated by the lack of comprehensive empirical research into the construct of equanimity within Mindfulness-Based Interventions [MBIs]. Often MBIs implicitly cover equanimity; however, there are no specific psychometric scales that measure equanimity or barriers to equanimity and no primary operational definition in Western science. This restricts scientific research and understanding into the psychologically therapeutic elements of mindfulness practice. Examining the non-judgmental aspect of mindfulness further, the thesis proposes an operational definition of inner and outer equanimity, a 'model of judgement' and 'naturally occurring ignorance' before validating the first scale to measure barriers to equanimity, henceforth known as the Equanimity Barriers Scale [EBS]. Mindfulness research must be able to differentiate attention, awareness and non-judgemental facets encompassed under the umbrella of mindfulness, in order to achieve clarity over its psychological beneficence and aid further advancement in the field. The proposed model of judgement and EBS was validated by 4 separate studies. The first Principal Component Analysis (n=453) utilised in order to explore underlying factors associated with barriers to equanimity. The second study refined the factors via Confirmatory Factor Analysis (n=108) and the third study (n=302) tested convergent and discriminant validity of the scale. The final study (n=327) tested differences between groups in relation to the EBS with age, anxiety, depression and mental wellbeing. The findings demonstrate how a person with fewer barriers to equanimity is more likely to be able to emotionally regulate, have greater self-compassion, mindfulness and mental wellbeing, whereas a person who has higher barriers to equanimity has greater risk of anxiety, depression and

difficulties in emotional regulation. The development of a new model and first-ever scale to measure barriers to equanimity extends the body of knowledge of the existing literature and research related to mindfulness, and more specifically, to the adoption of equanimity within person-centred therapy, clinical psychology and general health and wellbeing. The thesis therefore provides both theoretical and practical contributions to knowledge. This is critical given the current state of mental health in the world as individuals face unique challenges in relation to their own distinctive patterns of experience and individual differences on a psychological and social level. Understanding barriers to equanimity enables individuals to strengthen mindfulness practice and continue advancement in wellbeing with openness, acceptance and less discrimination. Therefore, the proposed thesis serves as a platform for a closer insight into personal navigation of an often-polarised world.

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List of Abbreviations

The following table details the list of various abbreviations and acronyms used throughout the thesis in alphabetical order.

Abbreviation	Meaning
AVE	Average Variance Explained
BFI-10 CA	Brief Version of the Big Five Personality Inventory Cambridge Analytica
CAMS	Cognitive Affective Mindfulness Scale
CBCT	Cognitive Based Compassion Training
CBCT	Cognitive Based Compassion Training
CBT	Cognitive Behavioral Therapy
CCT	Compassion Cultivation Training
CFI	Comparative Fit Index
DERS-SF	Short Form Difficulty in Emotional Regulation Scale
EBS	Equanimity Barriers Scale
EEG	Electroencephalogram
ERQ	Emotional Regulation Scale
ERSP	Experiential Self-Referential Processing
ESLP	Experiential Selfless Processing
FFMQ	Five Facet Mindfulness Questionnaire
FMI	Freiburg Mindfulness Inventory Scale
GAD-7	Generalised Anxiety Disorder Assessment
GVM	Goenka Vipassana Meditation
KIMS	Kentucky Inventory of Mindfulness skills
LKM	Loving Kindness Meditation
MAAS	Mindfulness Attention Awareness Scale
MBCT	Mindfulness-Based Cognitive Therapy
MBSR	Mindfulness-Based Stress Reduction
MBI's	Mindfulness-Based Interventions
MBMT	Mindfulness-Based Mind Training

MIM Integrated Model of Mindfulness

NCS-R National Comorbidity Survey Replication

NHS National Health Service

PHLMS Philadelphia Mindfulness Scale

PHQ-9 Patient Health Questionnaire

PRISMA Preferred Reporting Items for Systematic Reviews and Meta-Analyses

RCT Randomised Control Trial

RMSEA Root Mean Square of Error

SCS-SF Short Form Self-Compassion Scale

SIT Social Identity Theory
SJT Social Judgement Theory

SES-IAT Single Experience & Self Implicit Association Test

SOFI Self-Other Four Immeasurable Scale

SPSS Statistical Software Social Sciences

SWEMWBS Short Form Warwick Edinburgh Mental Wellbeing Scale

TLI Tucker Lewis Index

TMS Toronto Mindfulness Scale

Chapter 1 An Introduction

1.1 Introduction to thesis

Research into mindfulness has increased exponentially over the past few decades (Baer, 2003; Brown, et al 2007; Williams, et al 2014) with most of the research relating to healthcare such as chronic illness (Kabat-Zinn, 1996), and common mental disorders such as anxiety and depression (Teesdale, et al 2010; Demarzo, et al 2015; Kearney, et al 2013; Williams, et al 214). Subsequently, much of contemporary healthcare now accommodates Mindfulness-Based Interventions [MBIs] in a broad variety of settings and is promoted in reputable health excellence guidelines such as the National Institute for Health Care Excellence (NICE).

Recent research has turned towards the question of how and why mindfulness results in prosocial change (Chiesa, et al. 2014; Gu, et al., 2015; Holzel et al. 2011). The thesis aims to refine an aspect of mindfulness, namely equanimity, which is hypothesised as being relatively overlooked in the current literature. The key research question of this thesis concerns the lack of clarity in relation to equanimity in Western psychology. The concept of equanimity is largely ignored in mindfulness literature and replaced with the terms 'non-judgement' and 'acceptance', therefore, it is necessary to revisit Eastern philosophy to assess how relevant a construct equanimity may prove to be in Western psychology. In doing so, this thesis provides a unique contribution to knowledge. The conceptualisation of equanimity and barriers to achieving it are of fundamental importance in this work and the main contribution to knowledge underpinning it. One of the key questions of this thesis was the lack of clarity in relation to the construct of equanimity in Western psychology. There is a need to articulate a conceptual benchmark for this construct; given the reality that countless people have diverse experiences of mindfulness.

1.2 Introduction to chapter 1

This chapter establishes links between person-centred therapy and mindfulness, positing that equanimity needs to be researched in isolation of the attentional facet of mindfulness. This chapter does this by looking towards social psychology with an emphasis on person-centred therapy in order to highlight the importance of considering unconditional positive regard and congruence, as it is speculated equanimity may complement these qualities. Secondly, the chapter closely examines mindfulness as a form of 'third wave psychotherapy' in relation to health and wellbeing to situate equanimity within the broader narrative. The chapter then discusses the dimension of equanimity, which is the basis for the studies within this thesis, in mindfulness literature, and as an overlooked skill in person-centred therapy. Equanimity can be likened to the fruition of the aforementioned skills of congruence and unconditional positive regard and so is discussed in relation to health and wellbeing. Finally, this chapter discusses the psychometric properties of mindfulness scales and proposes equanimity as an isolated construct that warrants further investigation.

1.3 Why I am interested in equanimity

I spent the first 6 years of my life in a Tibetan Buddhist monastic community and have always to some extent practised mindfulness and meditation. Whilst meditation and Buddhist philosophy have remained close to my heart, I have always kept this part of myself private. Growing up as a Westerner in the North West of England, I did not expect to make mindfulness a key part of my professional identity. However, I was amazed to see the explosion of mindfulness as a Western practice due to Jon Kabat-Zinn's now renowned Mindfulness-Based Stress Reduction [MBSR] programme (1979). I have always experienced so much benefit from Buddhist teachings of mindfulness and seen first-hand how

applicable these are in the Western world. My mother created her own mindfulness programme known as Mindfulness-Based Mind Training [MBMT] for the private and voluntary sectors. I enrolled on this programme in order to approach mindfulness from a Western perspective. Consequently, having both Buddhist and Western perspectives of mindfulness gives me a unique vantage point. Because of the burgeoning success of mindfulness interventions, I have always felt it necessary to examine the potential underpinning constructs that may have led to such change. In Buddhism, equanimity is discussed in depth as a crucial aspect of personal development. Thus, research into how applicable this construct may be in the west, and barriers we may face in achieving it, seems a logical direction to examine mindfulness as a phenomenon in greater depth.

1.4 Social psychology & person centred therapy

Since its inception, person-centered therapy and clinical psychology have embraced mindfulness as a flourishing form of psychotherapy. When looking at any beliefs and thoughts structures it is essential that theories and paradigms in social psychology are considered. This is because this thesis draws upon literature in these fields and seeks to complement knowledge in a Western therapeutic setting and further seeks to assist the fine-tuning of therapeutic skills in relation to mindfulness. Baron, Byrne and Sulls (1989) define social psychology as "the scientific field that seeks to understand the nature and causes of individual behaviour in social situations" (p. 6). That is how human behavior is influenced by other people and the social context in which it occurs. This is because this discipline is primarily concerned with how society impacts our thoughts and actions and moreover, the factors that lead us to behave in different ways in the presence of others and conditions under which certain behaviour and feelings occur.

The self is therefore the construction of these feelings, thoughts, beliefs, intentions and goals, and so interest turns to how such psychological factors, in turn, influence our interactions with others. Mindfulness is an experiential pursuit of awareness of the self and part of a therapeutic way of being, thus greater insight into our own reality is dependent on how we perceive our place and role within society. As the central psychological factor being examined in this thesis is equanimity, which is related to individuals' discrimination faculties, a logical place to begin this line of enquiry is from a social standpoint that examines the ways in which society influences our judgements. Therefore, an individual aiming to achieve greater equanimity must first analyse the barriers facing them in this pursuit.

Social cognitive perspective asserts that we learn behaviour by the way we think about other people's behavior (Bandura, 1986). We formulate judgements of good or bad based upon their behaviour and can alter our cognition based upon their actions. In this way, we can alter our judgements dependent on what we see and accept. Whereas the sociocultural perspective teaches us norms and rules of a given society that mould the way in which we behave. Thus, by learning norms and rules and seeing how these relate to society we behave in accordance with these constructions. From a social learning perspective, our behaviour arrives through imitation, reward and punishment (Bandura, 1986; Skinner, 1953). Thus, a model to encapsulate the ways in which individuals both conform and are shaped via social forces would help facilitate further enquiry into equanimity. Experience categorised into likes, dislikes and neutralities may help explain the sense of self, based upon the self-concept/ego that seems significant of individual identity. to create part Social cognition is a subtopic of social psychology that turns attention towards how individuals process, store and apply information about other people and social situations. This is significant given how the concepts of non-judgement and acceptance in mindfulness clearly relate to how individuals relate to others and social situations.

Humanistic psychology emerged in the mid-20th Century with phenomenology as a core component in the study of existentialism. Emerging from the iconic work of Freud (1933), psychotherapeutic intervention remains a constant and integral part of Western society today. Rogers' (1951) humanistic approach to person-centred therapy gathered momentum in the 21st century and can now be seen to have a multitude of strands, with over-arching themes with other humanistic theories such as those developed by Maslow (1943). Rogers (1959) and Maslow (1943) proposed that personal growth and satisfaction serve as basic human motives, and that each person pursues psychological and continuous transformation. Both scholars incorporate the subjective, conscious experience of the individual as crucial to the learning and development needed to enable the connection to the true self that has not been influenced by learned behaviours and social conditioning (Tolan & Cameron, 2016). In terms of the studies within this thesis this is crucial in the unpicking of how experiences of both circumstance and relationships can affect the belief and therefore behavioural systems of individuals. This brief overview of humanistic psychology provides a useful inception of therapeutic intervention in a Western context as well as proposing that underpinning the framework of enquiry in this thesis is the understanding that social contexts and social identity influence individual behaviour and thought processes. Thus, research into barriers of achieving equanimity sheds light on the individual diversity of human judgements.

In terms of examining mindfulness through a therapeutic lens, it is also important to consider how Rogers' client-centred therapy hones in on the development of self and emotional transformation. Rogers' (1959) self-concept is an important proposal for both social psychology and humanism, and his seminal work on person-centred therapy, it can be argued, supported the cementing of humanistic-focused therapies in North America, and then further in the Western world. The utilisation of warmth combined with optimism, alongside the belief that the individual was the expert unto themselves and furthermore that they needed to be held in unconditional positive regard, was in complete opposition to the stance of behavioural or psychodynamic psychologists. In contradiction to the latter, clients were routinely encouraged to focus on current subjective understandings rather than on unconscious motives

or someone else's analysis. Rogers asserted that within an individual lay the vast resources for self-knowledge and transformative change and that these could be simply tapped into via facilitative psychological attitudes. In contrast to the deterministic nature of psychoanalysis and behaviourism, Rogers asserted individuals behave in a way that is based upon how they perceive their situation (Kirschenbaum, 2007; Tolan & Cameron, 2016).

Rogers' (1951) client-centred theory developed with emotionally challenging individuals, and it proclaims persons have a remarkable capacity for self-healing and personal growth towards *actualization*. The notion of self-concept as the "organised, consistent set of perceptions and beliefs about oneself' consists of all the ideas and values that characterise 'I' and 'me' and incorporates perception and valuing of 'what I am' and 'what I can do'. This central construct of total experience influences both our perception of the world and perception of self. However, the self-concept does not always necessarily fit with reality and the way we see ourselves may differ from how others see us (Rogers, 1967). In a recent study looking at the significant hallmarks of therapeutic dynamics, Fife et al. (2014) synthesised therapeutic alliance and interventions and produced a meta-model positing a therapeutic pyramid consisting of 'way of being', 'therapeutic alliance', and finally 'skills and techniques'. The authors postulate the effectiveness of techniques rest on the therapists' way of being and humanity, which are critical for formulating a non-judgemental connection with clients. It is in this line of thought, that Rogerian aspects of congruence and unconditional positive regard will be explored in detail.

In order to hone in on the therapeutic aspect of mindfulness and equanimity, linkages within person-centred therapy are explored. Person-centred approaches in humanistic and social psychology give autonomy to the individual. They take the position that there is nothing that if learnt cannot be unlearnt and that although the individual is influenced by social conditioning and learned behaviour, this can be unpicked with awareness and then decisions can be made in order to actualise the true self. That is, the self that is untainted by societal ills, wants and dictates (Rogers, 1967; Bandura 1986). This theoretical underpinning is relevant to the studies within this thesis as they are motivated by a desire to

develop a framework for a theory of how judgement of self and others can provide barriers to achieving equanimity. A theoretical model of judgement, a cycle of naturally occurring ignorance and a validated measurement tool to move an individual away from barriers to equanimity are central features of this thesis (Weber, 2017).

The thesis explores the significance of equanimity as a form of emotional regulation at the beginning of therapeutic intervention, that is, benchmarking and awareness raising to highlight possible barriers to change, and, ultimately the examination of how certain qualities help fulfil 'transformative' potential. This thesis will be a significant contribution to the study of equanimity that currently is in its formative stages. There will be a focus on how non-judgement can be harnessed to promote and develop change by exploring barriers to equanimity that supports an individual in acceptance and actualisation. It is also clear that this thesis considers an Eastern philosophy, with the Buddhist concepts of mindfulness and equanimity explored as a similar way of eliciting change within the interpersonal relationship. Through the examination of these mechanisms of 'transformative change' from an Eastern perspective, we are then able to synthesise knowledge and connect to wider theory. The movement towards the ideal and actual self can be related to the Buddhist concept of achieving freedom of suffering via 'emptiness' and 'insight'. Through a gradual process of meditative techniques, a Buddhist practitioner is said to become 'free from' inner suffering and eventually transcend into enlightenment (Nhat Hanh, 1999; Wallace & Shapiro, 2006). Mindfulness meditation and practice are integral parts of this journey, almost the very essence from which all other practices stem. Since there has been a recent explosion of mindfulness interventions and scientific research since the 1990s (often cited as one of the 'third waves in psychotherapy') it is thought to be pertinent to synthesise these broader paradigms (Hofmann & Asmundson, 2008; Kahl, Lotta and Ulrich, 2012; Hunot, et al. 2013).

1.5 Mindfulness

'Third wave psychotherapy' refers to a heterogeneous group of treatments that includes mindfulness. Whilst a plethora of studies has emerged in recent years, 'third wave psychotherapy' as a

form of behavioral psychotherapy is still in its scientific embryonic stage. Mindfulness is a quality of consciousness, more specifically defined as "paying attention in a particular way: on purpose, in the present moment, nonjudgmentally" (Kabat-Zinn, 1994, p. 4). Mindfulness consists of a purposeful attention to and awareness of the present moment, approached with an attitude of openness, acceptance, and non-judgement (Bishop et al., 2004; Kabat-Zinn, 1990, 1994). Kabat-Zinn (1994) calls it simply "the art of conscious living" (p. 6).

In 1979, Jon Kabat-Zinn developed the mindfulness-based stress reduction (MBSR) program at the University of Massachusetts Medical Center. The program, while not religiously orientated, has its roots in Buddhism, as mindfulness is at the core of Buddhist teaching (Gunaratana, 1992). The 8-week program taught chronic pain patients mindfulness meditation and assisted these individuals to manage their circumstance (Kabat-Zinn, 1982). Since then, tens of thousands of people have completed the program. In addition, there are now 240 MBSR programs worldwide that are modeled on Kabat-Zinn's original program that train thousands of individuals in mindfulness meditation and a mindful way of being (Center for Mindfulness in Medicine, Health Care, and Society, 2007). Evidence based practice shows how mindfulness has positive effects on mental health and psychological well-being (e.g., depression, anxiety, stress), physical health (e.g., pain, physical impairment), and quality of intimate relationships (Baer, 2003; Brown & Ryan, 2003; Brown, Ryan, & Cresswell, 2007b; Grossman, Niemann, Schmidt, & Walach, 2004).

The aforementioned work has resulted in a worldwide surge of interest in mindfulness-based interventions in a variety of sectors both public and private. Several studies have looked at the value of mindfulness. (Carmody & Baer 2009; Grossman, Niemann, Schmidt & Baer-Wu 2006; Teixeira, 2008; Toneatto & Nguyen, 2007). Consequently, several mindfulness scales were introduced, in line with the exponential growth of the discipline in recent years. As well as RCTs, systematic reviews and meta-analysis, mindfulness interventions have seen a sharp rise in research interest due to the multitude of

ways meditation or brain activity can be measured. In many ways, the study of meditation has become mainstream with the help of neuroscience and electroencephalography (EEG) and more recently via pro inflammatory gene expression (Kaliman, et al 2014). Today it seems meditation is no longer, for 'spiritual hippies' but is becoming an increasingly accepted way of life.

In order to connect the potentiality of person-centred therapy with inner transformation and mindfulness with inner transformation it is necessary to scrutinise the psychological mechanisms beneath these practices. Person-centred therapy is dependent on congruence, unconditional positive regard and empathic concern. Whereas, mindfulness is dependent on focused awareness and non-judgmental acceptance. Thus, the hypothesis is that an underlying psychological mechanism of 'equanimity' is the hallmark of emotional regulation, which becomes the springboard into prosocial behaviours such as universal compassion. Therefore, the assumption is that assumed equanimity is not made fully explicit within current mindfulness frameworks nor is it mentioned in person-centred therapy. In order to explore the construct of equanimity it is necessary to revisit scientific and clinical interpretations of mindfulness. Thus, the aim of this thesis is to assess the prevalence of equanimity in current contemporary mindfulness understanding and to refine the barriers that present themselves to achieving it by putting forward a scale to measure barriers to equanimity. This is to ensure that those who may face obstacles within their practice or who are unable to 'progress' or achieve prosocial change, are given the tools necessary to enhance emotional regulation and lessen critical judgements toward the self or others.

1.6 Equanimity

Modern day mindfulness implicitly teaches the Buddhist concept of equanimity, which is evident via its operational definitions. Indeed, equanimity is interlaced with every aspect of modern-day mindfulness programmes (Desbordes, et al 2015; Feldman & Kuyken, 2019). However, many

questions arise in relation to the authenticity of this invaluable teaching. Thus, attention should be given to both the psychometric measurement and operational definition of equanimity. At present, there is little to no explicitly recognised definition of equanimity aimed at Western psychologists or mindfulness researchers and limited psychometric measurement (Weber & Lowe, 2018).

At present, mindfulness is generally defined in two ways:

"The first component involves the self-regulation of attention so that it is maintained on immediate experience, thereby allowing for increased recognition of mental events in the present moment. The second component involves adopting a particular orientation toward one's experiences in the present moment, an orientation that is characterized by curiosity, openness, and acceptance" (Bishop, et al,2004, p37)

It is this second component that appears to elude more towards equanimity, which is defined by Berzin (2019) as "the factor of being even-tempered toward its object/ ... free from attachment and repulsion, with an even minded attitude directed at others/ ... one rids oneself of the disturbing emotions of attachment, repulsion, and indifference". Indeed, one of the only definition of equanimity found in Western research papers thus far defines it as "the suspension of judging experience to be intrinsically good or bad" (Farb, et al 2012). This suggests equanimity refines the mental discernment associated with judgement which is not fully captured via current mindfulness definitions.

There are two clear constructs in mindfulness incorporated into one unifying definition (1, attention and awareness, and 2) non-judgement. Modern day mindfulness incorporates attention, awareness and non-judgemental curiosity, yet it appears that equanimity (taught as a separate construct in Buddhism in order to develop compassion), has been transmuted under the umbrella of mindfulness. Perhaps, it is useful to separate the 'non-judgemental' aspects of mindfulness and reconceptualise them as 'equanimity', given Western science's quest for advancement.

In Buddhism, equanimity has a clear intention of generating loving kindness and compassion towards the self and others. In mindfulness, this notion is seemingly restricted to a matter of open acceptance. Thus, the questions arise: whether we have developed enough scientific rigour in measuring these constructs as potentially separate variables and are we possibly negating the measurement of this underlying psychological construct that potentially gives rise to so much of modern-day mindfulness' effectiveness? As a fundamental facet of contemporary mindfulness is effectively aimed at developing positive mental states, it appears a Western definition of equanimity that incorporates self-awareness and a compassionate lens would be more effective to test the development of such a quality in a Western clinical environment.

Revisiting Buddhism informs us there are tenets, traditions and schools that offer variations of the role, significant and sequence in which equanimity has its place (Berzin, 2019). However, all accept that equanimity as one of the '4 Immeasurables' or '4 Brahama Abodes' that are key in the development of compassion and the alleviation of mental suffering. Indeed, one such 14th Century Buddhist Master Longchenpa places equanimity at the beginning of the '4 Immeasurables' as a practice for beginners. The crux of the debate, perhaps rests on whether it is equanimity that mediates the emotional regulatory affect in modern day mindfulness programmes. It is surely a question worth exploring. Without going into too much detail about Buddhist variations of equanimity, it is certainly notable that the first aspect of equanimity or 'mere equanimity' as Buddhists would call it is commonly accepted by both the Theravada and Mahayana traditions which are regarded as the two overarching schools of Buddhism (Berzain, 2019).

Based on the above literature, I have concluded that equanimity seems to be two pronged, firstly aimed at cultivating an inner equanimity and also then geared towards others. Therefore, it is felt the below operational definitions of equanimity incorporate the fundamental teachings of both major tenets of Buddhism, modern day mindfulness programmes and are pertinent to Western psychology.

Inner equanimity as "open acceptance of non-reactivity towards your discrimination faculties (pleasure, displeasure, neutrality) so you can respond with compassion for self and others" (Weber, 2019).

And,

External equanimity as "Accepting an individual's discrimination faculties (pleasure, displeasure, neutrality), with patience so to respond with compassion for self and others" (Weber, 2019).

Equanimity is applicable in modern day mindfulness as the construct is unconsciously taught in mindfulness programmes as early as the body scan and breathe awareness. Right from the beginning, students are taught to observe sensations of the body including the pleasant/unpleasant or neutral. Thus, the ability to be equally present with the spectrum of feelings is taught. The ability to step outside of attachment, aversion, craving and clinging with a focus on non-reactivity and acceptance permeates much of the programme (Feldman & Kuyken, 2019; Weber, 2019).

Equanimity is further developed in modern day mindfulness programmes when we begin to examine the contents of our mind during cascading thoughts, moods and emotions that register in the present moment experience. To be fully present in the midst of one's own mind is being able to recognise mood as mood, thought as a mental event, an emotion as an emotion and a sensation as a sensation. This present moment experience is then able to disarm the ways in which we label so we can respond rather than react. The web of identification with feeling tones is less of a restrictive force but an opportunity for opening to experience as it is. As we cling less to the content and open more to the transitory nature of objects in consciousness, we begin to experientially observe how all things pass and only last longer once we have identified with attachment and aversion. In this, the movement towards or away from the events of the moment, from the good to the bad, unpleasant and neutral arise and fall and we become still and peaceful (Feldman & Kuyken, 2019).

Desbordes, et al. (2015) promoted equanimity as the most important inner element in the improvement of wellbeing. Numerous reviews of mindfulness intervention and measurement have been conducted (Baer, 2011; Bergomi, et al. 2013; Park, et al. 2013; Sauer, et al. 2013). Although there are items that examine 'non-judgement' and 'acceptance' in most of the contemporary mindfulness scales there is no precise measurement of 'equanimity', or indeed any barriers to achieving equanimity. This is significant to this research given the differentiation between the two concepts.

When considering the concept of equanimity, defined in Buddhism as not thoughts or emotions but the stable conscious understanding of the transience of an individual's reality (Desbordes et al, 2015), it is also posited that it provides a suitable framework for wisdom, for emotional freedom, and is said to be a guardian of compassion and love. Goleman and Richardson (2017) show how current genetic and neuroscience reveals how meditation changes your mind, brain and body. Consequently, behaviour change and the nurturing of prosocial qualities may rely on this central psychological construct of equanimity. Thus, it is important to address whether it is equanimity that mediates these relationships in order to advance knowledge.

As mentioned, the practice of mindfulness originates from Eastern spiritual practices, particularly Buddhist, described as the process of paying attention to an object in working memory. The Sanskrit term for mindfulness is 'pali' which describes mindfulness as the quality of mind that recollects continuously without forgetfulness or distraction while maintaining attention on a object. Whereas various Western definitions of mindfulness highlight a common component of mindfulness as an 'attitude of openness and acceptance', such as Baer et al.'s (2006). They define it as "a state of being in which individuals bring their attention to the experiences occurring in the present moment, in a non-judgmental or accepting way" (p. 27). Also, "an adaptable state of consciousness that encompasses receptive attention and awareness of one's inner state and the outside world, regardless of whether these encounters are positive or negative" (Brown & Ryan, 2003; Brown, Ryan, & Creswell, 2007). This clearly highlights a distinction between paying attention [pali] and between how this attention is applied.

As a concept 'paying attention to the present moment with acceptance and non-judgement' (Kabat-Zin, 2003) is widely accepted as the leading definition. Yet this working definition encompasses separate elements, with on one hand the clear development of attentional capacity (paying attention to the present moment) and on the other, a non-judgmental and accepting experiential attitude towards phenomena (acceptance without judgement). The latter part is seemingly a Western interpretation of the original Sanskrit term. However, Kabat-Zinn often describes how mindfulness is an umbrella term that encapsulates compassion, heartfulness and an embodied way of being. It is his way of using the Buddhist principles for a Western audience and so there are parts of 'mindfulness' that may well incorporate equanimity. However, due to the myriad ways in which mindfulness trainers, practitioners and scholars come to the practice, there is a potentiality for a lack of understanding, insight and wisdom. Thus, providing a scale to measure barriers to equanimity and operationalising equanimity seems to be a significant step for both a hallmark in psychotherapeutic intervention and as a tool for scientific research.

Several reviews of the existing scales have been conducted (Baer 2011; Park et al. 2013; Bergomi, Tsacher and Kupper, 2013; Sauer et al. 2013) which have highlighted different structures and emphasised different aspects which reflect different understanding of mindfulness. Only one scale, the Freiburg Mindfulness Inventory scale (FMI), was largely influenced by the mindfulness practice found in Buddhism but still includes the modern understanding of mindfulness (Wallach et al, 2006). The clear inconsistency caused by differing factors suggest the possibility that current mindfulness scales may measure aspects that do not match the elements found in traditional mindfulness meditation, namely an emphasis on what is perhaps best described as 'equanimity'. Equanimity has been described as "a state of mind that cannot be swayed by biases and preferences; an even mindedness in the face of every sort of experience regardless of whether pleasure (or) pain are present' (Thanissaro Bhikkhu, 1996, p262). Or perhaps more refined as "the suspension of judging experience to be intrinsically good or bad' (Farb, et al 2012, p 71). In Buddhism mindfulness is part of a much larger psychological process, which also includes the cultivation of equanimity, that is, where one experiences mental states

with equal interest without repression, denial or judgement or attachment, aversion or indifference.

Because of the clear difference between the original and Western definitions, the question arises whether non-judgement and acceptance act as an equivalent dimension to the concept of equanimity found in traditional Buddhism. The inconsistency further suggests that current mindfulness 'measurements' may measure aspects that do not match the traditional elements or capture equanimity. If not, then what exactly does this separation mean in practice and to what extent does the 'split' from original thought and Western practice affect current scientific considerations?

It is argued that as mindfulness has been adopted from the East, it is necessary to consider equanimity as it seems to be encompassed but not explicitly stated within current Western definitions and quantitative scales. It is argued that words such as 'non-judgement' and 'acceptance' act as a kind of distorted description of what could be better operationalised as equanimity, that is, if the process of mindfulness wishes to be tested both in respect of, and aligned to, Buddhist tradition, as well as being pertinent to the West.

Grossman (2014) states crucial components in mindfulness of 'acceptance' and 'non-judgement' are trivialised in the psychological literature by suggesting these concepts are a necessary accessory but that they are considered so easily achieved they warrant little attention. In its original sense, the author suggests mindfulness adopts a special kind of awareness via the conditioning of equanimity (composure of mental and emotional functioning) and acceptance (including an attitude of patience, tolerance, lack of prejudice for example) which are often summarised in the literature as 'non-judgement' and 'acceptance'.

One of the main difficulties in framing secular equanimity, is distinguishing the construct from the already well-established constructs of non-judgement and de-centering. As these constructs are well established in the literature and currently play a crucial role in contemporary mindfulness research and western psychology, it is important to determine a more refined conceptual analysis, in order to ascertain the value of secular equanimity.

Non-Judgement

In relation to non-judgement, at first glance this concept appears extremely close given equanimity's emphasis on non-reactivity to one's own discrimination faculties towards self and others. However, the author surmises that to be non-judgemental is somewhat of an oxymoron. This is an important first step in establishing a conceptual understanding of equanimity. To realise that there is an element, no matter how subtle, that an individual deploys that is to some extent judging each situation. If not with harsh and rigid judgements, at least with a general undertone of what is 'liked', 'disliked' or 'neutral'. It may be helpful to think of a continuum or scale of judgement that even when an individual perceives themselves to be 'non-judgemental', there is still a feeling tone present that with awareness an individual would recognise.

"Non-judgement'— is defined as the ability to remain accepting of and tolerant towards another person even when their condition, or response to it, gives rise to difficult feelings in oneself, such as frustration, anger, fear or disgust" (Straus, et al 2016, p17). This clearly shares characteristics of outer equanimity in that non-judgement appears to be characterised by acceptance and patience towards others. However, there is little focus on compassion towards self and or others. And this definition implies an individual partly 'covers' up their true feelings in a bid to appease another. Whereas with equanimity, you at least pay respect to your own discrimination faculties with compassion.

Indeed, the non-reactivity aspect of equanimity implies a level of 'non-judgement', however clearly goes beyond this when considering the latter component of one's own discrimination faculties.

That is, one's own perception of 'like', 'dislike' and 'neutrality' are given brief attention or held in

awareness before exercising 'non-judgement' through a window of awareness towards oneself. There is an acceptance or at least acknowledgement, pre non-judgement of the role one is playing in relation to the object to be 'not-judged'. A clear way of putting this is instead of not judging the judgements, one turns towards one's own tone of tone of 'like', 'dislike' or 'neutrality' with insight before dissipating them.

This relates to the first 'inner' definition of equanimity and further relates to 'external' equanimity, when an individual considers the facet of compassion present with equanimity that further distinguishes the construct from 'non-judgement'. Indeed, non-judgement implies compassion but does not necessarily have to be so. Here, the final component of equanimity clearly brings into consideration compassion for self and others which goes beyond 'non-judgement'.

De-centering

The second construct of de-centering also implies similar facets of equanimity. Bernstein, et al (2015) suggest 'de-centering' entails three interrelated processes: meta-awareness, disidentification from internal experience, and reduced reactivity to thought content. However, this is clearly an individualised psychological process so would only relate to the first definition of 'inner' equanimity in the first instance. Despite, the concept of 'de-centering' alluding towards an objective outlook of different perspectives [meta awareness] there is clearly the compassion for self and others element than is missing when taking into consideration two facing operational equanimity.

Further, 'de-centering' is a skill present in mindfulness for the self to make sense of the situation or reserve judgement and to observe thoughts as events and not facts (Wells, 2005). This implies that you observe your own feeling tones without recognition of their worth. This could result in thought repression or suppression if not adhered to correctly. De-centering closely relates to the non-reactivity aspects and implies a level of insight towards oneself and is a valuable construct. However, the construct

does not focus in on the tripartite elements of 'like', 'dislike' or 'neutrality' that is clearly present in equanimity. It is this 'information' that could be useful and a valuable source of reflection. Thus, perhaps de-centering is linked more closely than non-judgement with equanimity, however again is distinct of some of the facets present in equanimity.

'De-centering' is critical when considering that we do not have to believe all our thoughts. However, this perhaps needs refining with equanimity in that although we do not have to believe all our thoughts, it is useful to understand the role of our mind projecting feeling tones onto the thought. We will either 'like', 'dislike' or find the thought 'neutral'. In formulating this insight, we are then perhaps more readily able to overcome or disengage from our thoughts, as we have accepted the role our mind is playing and perhaps, in some way establishing why the thought may be present in the first place. Typically, our mind craves pleasurable thoughts, but often finds itself inundated with negative thoughts (Rozin and Royzman, 2001). This information or insight onto the nature of our thoughts is perhaps useful in an emotionally regulative capacity. So, this again highlights a distinct difference between the constructs. Both the concepts of non-judgement and de-centering are well established for good reason and will continue to be useful for mindfulness research for years to come. However, it may be fruitful in considering the role equanimity has in refining the therapeutic aspects of mindfulness further.

It therefore could be argued that Western psychologists or more specifically mindfulness intervention studies assume the inherent ability of participants to pay attention 'non-judgementally in an open and accepting way'. Therefore, it could be the case of implementing more in-depth training to complement this characteristic of the concept. Based on the above obversvations, it appears equanimity offers subtle nuances that may have more therapeutic benefit in the field of mindfulness. Further, Grossman (2008, p.405) argues against the "relative naiveté among constructors of inventories in terms of their own limited knowledge of Buddhist thinking and depth of experience with Buddhist meditation practices", by highlighting the numerous differences in self-report scales from which they were

constructed. Grossman cites the 'reductionist' approach to mindfulness as a key barrier in the original Buddhist psychological construct of mindfulness that connects the 'present moment' with the cultivation of positive emotions such as compassion and even ethical behaviour. Carrette and King (2005) reinforce this by suggesting mindfulness has been commercialised as a form of quick-fix healing via untrained instructors.

McGown, Reibel and Micozzi, (2010) highlight this by reflecting that some instructors have participated in no more than a weekend course of mindfulness training, whereas others have undergone years of intensive meditation under guidance of masters. Consequently, Grossman (2008) concludes that current 'hybrid concepts' only reflect partially its original meaning, so much so that 'different scales are often uncorrelated with each other or correlated very modestly.' Nilson and Kazemi (2015) suggest a critical examination of mindfulness interventions by considering its Buddhist equivalent, arguing there must be an improvement in the quality and sophistication of existing scales by taking into account the Buddhist views on mindfulness.

The overlap of various psychological constructs such as acceptance, non-judgement, open curiosity, self-compassion for example, under the umbrella of 'mindfulness' prohibits and to some extent distorts the transformative potential of mindfulness. It is therefore hypothesised within this thesis that mindfulness and compassion are tools to navigate and mediate trauma as opposed to manifesting new-found destructive experience. That is, the transformative potential for mindfulness is mediated by the intervention of central psychological constructs of equanimity.

Would we cultivate compassion for the entire human race if we attended to our own thoughts without a strong sense of like, dislike and neutrality, but with equanimity instead? This is the question, broadly stated, that Tibetan Buddhism attempts to answer. "So, … if their mind abide in equanimity, in this peace, then their mind is in the state of, in the positive state, in the peaceful state or happy state. So, therefore, out of this only positive actions, the peaceful actions, the virtuous actions or the peaceful, not disturbing, peaceful actions that which brings result only in happiness to oneself and to others."

(Kyabje Lama Zopa Rinpoche, 1991, 108).

Therefore, it could be said that mindfulness encompasses components which may be better characterised as equanimity (Desbordes, 2015). Equanimity manifests a balanced reaction to the joys and miseries of mental experience that protects the mind from emotional agitation, which this thesis argues is a positive intervention in the creation of reflexive and responsive range within metacognitive skills. Therefore, this is suggested to enable an experience where there is an ability to prevent largely negative metacognition processes such as rumination and obsessive compulsive behaviour and promote positive processes such as enhanced cognitive and emotional empathy.

As discussed thus far, in order to appreciate mindfulness, it is necessary to focus on the concepts of non-judgement and acceptance as these attributes underpin the practice. Non-judgement is a label celebrated within a variety of helping professions and as a value at the core of much practice. In the context of mindfulness-based interventions, accepting thoughts non-judgmentally is an essential skill. However, this thesis questions the ability of individuals to be non-judgmental given the profundity of this feat. The thesis questions the meaning of being 'non-judgemental', examining its meaning and positing how possible this is without other skills in place (without the practice of equanimity). It seems a conceptual model of judgement and naturally occurring ignorance exploring barriers to judgement from both a mindfulness and Buddhist perspective would be a useful tool for initial scale development.

After this preliminary search into mindfulness, it could be argued that the pace and scale of research coupled with the erratic media attention into the practice of mindfulness is beginning to take the buzz out of the buzzword. Although giant strides have been made in the field in recent years, a healthy skepticism has emerged (Hyland, 2014; Zizek, 2012). It is argued that the overlap of psychological constructs under the umbrella of 'mindfulness' prohibits, and, to some extent, distorts, the transformative potential of mindfulness. This chapter suggests mindfulness acts only as the first

stage towards the cultivation of equanimity and that it is this complementary practice that facilitates compassion and garners further research in isolation. The studies in this thesis build on the work of Desbordes et al. (2015) by clearly differentiating 'non-judgemental acceptance' and 'attention' within current mindfulness understanding. Although 'acceptance', and 'non-judgement', are significant, they do not fully capture the concept of equanimity.

Barriers to equanimity can be seen to play a key part in the success of therapeutic intervention, where accepting non-judgemental thoughts is essential in moving individuals through a change process (Weber, 2017). There are several reviews of existing mindfulness scales that have a partial nod towards equanimity (Baer 2011; Bergomi *et al.* 2012; Park *et al.* 2013; Sauer *et al.* 2013). These have different structures and emphasise different aspects that in turn reflect upon different understandings of mindfulness and in turn equanimity. Only one scale, the FMI (Walach *et al.*, 2006) was largely influenced by the mindfulness practice found in Buddhism but still includes the modern understanding of mindfulness (Buchheld *et al.* 2001). Therefore, it is argued in this thesis that the studies conducted both contribute to existing literature, as well as posing a new template for the achievement of change and transformation. This chapter provides preliminary discussion to suggest equanimity facilitates emotional regulation that leads to prosocial changes such as the cultivation of compassion.

1.6 Limitations

In theorising a role for equanimity in secular mindfulness, it is critical to also consider some of its potential limitations, especially in relation to its application to secular practice. Firstly, conceptual understanding will be hard to establish given the closely aligned popular and well-established constructs of 'non-jugement' and 'de-centering' as mentioned above. Further, it is difficult to establish distinctions and value without clear education and training. Moreover, there is a debate to be had around the value of equanimity in relation to its application to practice. Given equanimities individual self-insight approach, this will be hard to apply in groups and may only bring about more confusion in relation to

concepts of meditation. It is perhaps more suited to a therapeutic approach rather than a conventional based stress reduction programme. Indeed, the value of equanimity will be hard to distinguish in relation to mindfulness' broad appeal as it does signify a more thorough understanding of the self. Thus, there may be a limitation in relation to acute psychiatric ill-heath and past trauma. This again is perhaps counter intuitive when dealing with more generalised MBP and perhaps is more relatable to a therapeutic based programme like MBCT, for example.

Finally, the value of equanimity will depend on the facilitation of mindfulness teachers, who may not be versed in equanimity and as such, add to its complication or may wish to reject the construct as an over complication. There may be a greater level of individual discussion in terms of how equanimity is valuable for the person and how this can be applied in practice, which of course may diverge from some of mindfulness' core practice of stabalising the mind and present centred focus.

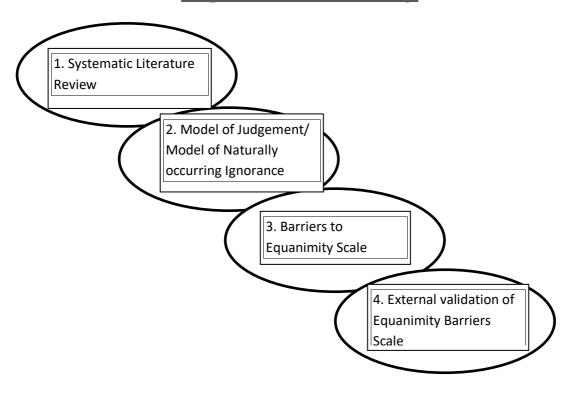
1.7 Aim of thesis [original contributions to knowledge]

The overall aim of this thesis is to refine the concept of equanimity and ascertain its applicability in Western psychology by examining the barriers that may present themselves in trying to achieve it. In order to do this, the objectives are to establish linkages between barriers to equanimity and emotional regulation, self-compassion, personality types and mindfulness attentional capacities. Then, in order to ascertain linkages between barriers to equanimity and mental health, the thesis looks towards the relationships between barriers to equanimity and anxiety, depression and general wellbeing.

The thesis fulfils its overall aim by conducting a systematic literature review of the construct of equanimity in order to determine how prevalent this concept is considered within the existing literature. The thesis then develops a model of judgement that can model dimensional states of barriers to non-judgement. The model is examined further by the development of barriers to equanimity scale that can be used in mindfulness interventions. The scale will provide an initial development study via

principle component analysis, a confirmatory factor analysis study and a final correlation test study. Further, the scale will be tested in relation to mental health in a community sample as a final external validation study. Thus, the thesis fulfills its objectives. Finally, the thesis concludes with a discussion and conclusion around the usefulness of equanimity and the barriers scale within the areas of health and wellbeing.

Unique contribution to Knowledge



1. To the author's best knowledge there are no current systematic literature reviews that have been conducted that examine the prevalence or effectiveness of equanimity. Therefore, this thesis will contribute the first systematic review in this field of research.

2. Based upon the narrative and systematic review, a judgement theory has emanated that highlights the domains in which an individual formulates judgements. This is based upon a synthesis of broader paradigms. This is a unique contribution to knowledge as it specifically focuses on areas of social psychology, Buddhism and mindfulness.

3. There are no formal and sole measurements of barriers to equanimity. That is, no measurement that concentrates on the ways in which individuals formulate judgements. Thus, a developed and validated tool that measures barriers to equanimity is a unique contribution to knowledge.

4. The external validation of the equanimity barriers scale is a further unique contribution to knowledge.

1.8 Chapters of thesis

Chapter 1

This chapter sets out a synthesis of relevant Western psychology and mindfulness. The chapter introduces equanimity as a construct for later examination. The chapter also states the thesis' unique contribution to knowledge.

Chapter 2

This chapter provides an overarching narrative review of the dimensions of mindfulness, self-compassion, emotional regulation and the potentiality of underlying psychological mechanisms prevalent in alternative therapies and spiritual and religious theories and perspectives. The chapter does so to provide a more robust literature search into the prevalence of equanimity and to situate it within these broader fields.

Chapter 3

This chapter provides a systematic literature review examining the prevalence of equanimity in mental health interventions. The review aims to identify whether equanimity is recognised as a key facet in mindfulness-based interventions [MBIs], and to establish the prevalence of equanimity in mental health interventions. The results of the chapter shed light on the lack of empirical investigation into the concept of equanimity and barriers faced in achieving it.

Chapter 4

This chapter examines the concepts and structures to be contained within a judgement cycle. Conceptualisation of the 'judgement cycle' will utilise key themes within social and humanistic psychology, drawing upon key themes within Eastern philosophies (Weber, $2017 - see \ Appendix \ A$).

Chapter 5

A principal factor analysis (PFA) was conducted based on the results of a questionnaire developed to test the concepts within the proposed judgement cycle and develop the initial items to identify barriers to equanimity. The study was conducted using an opportunity sample on a university campus as well as using an online software package to gain more participants.

Chapter 6

A confirmatory factor analysis (CFA) was performed to identify a suitable model and best fit in order to refine the concepts proposed within the judgement cycle and test the barriers to equanimity. The completed questionnaire is proposed as an equanimity barriers scale (EBS) questionnaire.

Chapter 7

The validation of the EBS against pre-validated, existing measures. In Study 3, convergent and discriminant validity was assessed in relation to the Mindfulness Attention Awareness Scale [MAAS] (Brown & Ryan, 2003), Big Five Inventory-10 [BFI-10] (Rammstedt & John, 2007), Self Compassion Scale Short Form [SCS-SF] (Raes, et al 2011), Difficulty in Emotional Regulation Scale Short Form [DERS-SF] (Kaufman, et al 2015) and the Emotional Regulation Questionnaire [ERQ] (Gross & John, 2003).

Chapter 8

The external validation of the EBS. In Study 4 convergent and discriminant validity was assessed in relation to the Generalised Anxiety Disorder [GAD-7] (Spitzer, et al 2006), the Patient Health Assessment [PHQ-9] (Kroenke, at al 2001) and the Short Form Warwick-Edinburgh Mental Wellbeing Scale [SWEMWBS] (Haver, et al 2015). Mann-Whitney and regression analysis were performed in order to ascertain differences between groups.

Chapter 9

This chapter provides a discussion of the wider implications and limitations of the equanimity barriers scale. The chapter summarises the thesis and looks towards future areas of research. This chapter provides concluding considerations to the usefulness of equanimity within the areas of health and wellbeing.

Chapter 2 Conceptual Guide

2.1 Introduction

As discussed in Chapter 1, equanimity has been relatively overlooked in current research. Therefore, this chapter provides an overarching narrative review into the related dimensions of mindfulness, self-compassion, emotional regulation and the potentiality of underlying psychological mechanisms prevalent in alternative therapies and spiritual and religious traditions. The chapter further discusses the notion of connection and postulates equanimity as a pivotal aspect of connection with self and others. Finally, this review provides a broad introduction to the Buddhist theory of emptiness before examining equanimity in relation to person-centred therapy. This will provide a useful overview that looks at how barriers to equanimity are crucial in impeding change processes and how they are inherent within social conditioning and learned behaviours of individuals.

The overall aim of this chapter is to refine the literature in relation to mindfulness and equanimity and theorise the constructs hypothesised to be part of both inner and external equanimity. This process will aid the development of a more refined, systematic literature review to be conducted in chapter 3 with more sophisticated search terms. Several domains of research are hypothesised to be relevant for this advancement. The scoping literature review was considered in relation to the definitions of both inner and outer equanimity which are outlined in chapter 1. The stated operational definitions helped define the broad search terms used in this chapter and thus help establish an expected narrower framework of enquiry to be considered in chapter 3.

'Mindfulness' and 'self-compassion' were considered as constructs that may relate to the concept of inner equanimity. As equanimity is a relatively new construct, it was valuable to conduct a search relating to contemporary mindfulness. Further, it was felt these terms would help guide the literature to a more refined focus on the inner psychological components present in contemporary western science. 'Person centred therapy' further relates to this inner psychological dynamic. In relation to compassion, this was considered given the consideration of inner equanimities relationship with compassion for self and others, but more in line with external equanimity and how this translates onto others. In addition, because self-concept relates to an individual's world view, in order to ascertain how equanimity may have been perceived in myriad ways this chapter considered a broad spiritual and religious framework. As both inner and external equanimity pays attention to a sense of self and highlights perceived feeling tones, world view was included to gather current and relevant psychological research related to this field. This particularly relates to external equanimity.

The links between Buddhism and mindfulness are significant in the area of ethics. Scientific skepticism could emerge given mindfulness filtration into mainstream health and wellbeing literature. Thus, it is important to consider comparisons between Eastern and Western philosophy in order to identify the potential reasons why prosocial changes occur during mindfulness interventions, or indeed any related practices. Self-concept is hypothesised as playing a crucial role in understanding the function of mindfulness and equanimity or person-centred therapy in the development of qualities like compassion and their impact on health and wellbeing. It was therefore necessary to draw parallels between person-centred therapy and mindfulness in order to further understand the nature of human ability to cultivate such virtues. This chapter will seek to explore current, relevant research, studies and theories within the proposed frameworks using a narrative review.

2.2 Search Method

Literature searches were performed in the electronic databases of ProQuest Central using the following search terms: mindfulness and equanimity or (self-concept) and (person-centred therapy) and compassion and (self-compassion) and (worldview) and (Buddhism). There were also several targeted works, pinpointed via specific search terms and records identified in relation to psychometric scales that did not appear in the proQuest central database. These search terms complemented the initial line of enquiry and enabled a more robust framework of existing literature.

2.3 Mindfulness

Though there is a wide breadth of mindfulness studies, each to some extent reflect the authors' personal interests and expertise in terms of what contextual background the authors have their mindfulness training in. MBSR, MBCT or non-traditional routes may take on slightly different approaches. Thus, an abundance of mindfulness scales have been introduced in line with the exponential growth of the discipline in recent years and these may account for slightly different nuances, depending on the author's way of inception into the discipline.

Various Western definitions of mindfulness highlight a common component of mindfulness as an 'attitude of openness and acceptance'. Baer, Smith, Hopkins, Krietemeyer, and Toney (2006) define it as "a state of being in which individuals bring their attention to the experiences occurring in the present moment, in a non-judgmental or accepting way" (p. 27); an adaptable state of consciousness that encompasses receptive attention and awareness of one's inner state and the outside world, regardless of whether these encounters are positive or negative (Brown & Ryan, 2003; Brown, Ryan, & Creswell, 2007). The aforementioned work has resulted in a worldwide surge of interest in mindfulness-based interventions in a variety of sectors. There have been a number of studies that have looked at the value of mindfulness-based interventions in managing such states as stress reduction,

depression and general anxiety disorder (Baer, 2003; Carmody & Baer, 2009; Grossman, Nie-mann, Schmidt, & Walach, 2004; Teixeira, 2008; Toneatto & Nguyen, 2007).

Semple et al. (2010) conducted a Randomised Control Trial [RCT] for children mostly from low income, inner city households between 9-13 years old and found that those randomised for Mindfulness Based Cognitive Therapy [MBCT] showed a reduction in attention problems, anxiety and behavioural problems. Further, Beckermann and Corbett (2010) reviewed the literature and advocate for the integration of mindfulness and cognitive therapy to prevent major depression (Lahera et al 2014).

Of the studies reviewed, mindfulness has been shown to reduce the perception of chronic pain (Vago & Nakamura, 2011; Pailo et al 2014) and ameliorate stress management, communication skills and pro-social behaviours with severe mentally ill patients (Barton, 2011). Carlson's (2012) review highlights how mindfulness substantially benefits a variety of physical health conditions from cancer to diabetes. Chambers et al. (2012) show how mindfulness helped reduce anxiety, depression and avoidance for men with advanced prostate cancer. Forti et al. (2016) further demonstrate the role of mindfulness in enhancing the quality of life of cancer survivors. The results of these studies confirm the ways in which mindfulness elicits a broad range of progressive change; however, this opens a further question as to why mindfulness results in such alterations. These studies confirm the notion that mindfulness has a multiplicity of health-orientated benefits, which affirms the questioning nature of this thesis, to explore further the facets that specifically bring about such changes. This raises the question of what underlying processes are involved in affective change and whether it is equanimity, then how explicit is equanimity theorised within the various mindfulness-based interventions.

In consideration of mindfulness-based trainings (MBTs) wider application to various sectors, Bishop et al. (2004, p37) recommended a dual functioning operational definition, one that encompasses "the self-regulation of attention so that it is maintained on immediate experience", and secondly, "an

orientation that is characterised by curiosity, openness, and acceptance". Here, the distinction between 'paying attention' and 'non-judgementally' is clearly categorised, however it is worth mentioning this was later criticised for confusing attention with awareness (Rapgay & Bystrisky, 2009).

2.4 Mindfulness psychometrics

In terms of psychometric measurement, the somewhat confusing representation of mindfulness in relation to the umbrella of constructs associated with it, is clear when reviewing the literature. Several reviews of the scales have been conducted (Baer, 2011; Bergomi, Tsacher, & Kupper, 2013; Park, Reilly-Spong, & Gross, 2013; Sauer et al., 2013) which have highlighted different structures and emphasise different aspects which reflect different understandings of mindfulness.

The Mindfulness Attention Awareness Scale (MAAS; Brown & Ryan, 2003) does not mention acceptance or nonjudgement and focuses only on attentional and awareness capacities. Whereas, the Toronto Mindfulness Scale (TMS; Lau, et al. 2006) includes two factors of de-centering and curiosity (including items mentioning openness and acceptance), but does not explicitly measure loving kindness, equanimity, compassion, or joy which are clearly aspects of more Buddhist informed mindfulness. Only one scale, the Freiburg Mindfulness Inventory Scale (FMI) was largely influenced by the mindfulness practice found in Buddhism but still includes the contemporary understanding of mindfulness (Walach, Butheld, Buttenmuller, Kleinknecht, & Schmidt, 2006). The clear inconsistency caused by differing factors suggest the possibility that current mindfulness scales may measure aspects that do not match the elements found in traditional mindfulness meditation, namely an emphasis on equanimity as the foundation for mindfulness practice.

The East and West divide is exacerbated by Baer et al. (2006) whose study investigating the structure of facets within five key mindfulness scales, found that mindfulness is a multi-faceted construct comprising of non-reactivity, observing, awareness, describing and non-judging. Only one measure has directly attempted to capture compassion with the Self-Compassion Scale (SCS) (Neff,

2003) however this solely focuses on the self. The only scale currently looking at facets of mindfulness such as compassion and loving kindness is the 'Self-Others Four Immeasurables' (SOFI) developed by Kraus and Sears (2009). This was designed in order to measure loving-kindness, compassion, joy and acceptance towards both the self and others.

Equally, scales such as the Difficulties in Emotional Regulation Strategies (DERS; Kaufman, et al. 2015) and the Emotional Regulation Scale (ERQ; Gross & John, 2003) that capture emotional regulation and barriers to emotional regulation do not measure mindfulness. Another measure has directly attempted to capture compassion with the Self-Compassion Scale (SCS; Neff, 2003); however, this solely focusses on the self. Nevertheless, Holzel et al. (2011) show how compassion for oneself mediates improved emotional regulation processes that in turn facilitate compassion towards others. However, Zeng, et al (2016) highlight that the SCS was not validated in a Buddhist sample and is theoretically different from the ideas of Buddhism (Weber & Lowe, 2018).

When it comes to Buddhism it is clear the equanimity and the prosocial elements so crucial in Buddhist psychology are missing in contemporary mindfulness scales. This is validated by Zeng et al. (2013) who analysed nine contemporary mindfulness scales and proposed the Philadelphia Mindfulness Scale (PHLMS) as the only measurement appropriate for capturing awareness and equanimity. However, Zeng, Li, Zhang and Liu (2014) further revised this scale to 10 items after discovering the PHLMS lacked clarity from the Goenka Vipassana meditation perspective. Therefore, the authors proposed a revised scale in order to address the difference between equanimity and awareness.

2.5 Compassion & Wellbeing

As a key aspect of this thesis is to examine the ways in which emotional regulation can nurture compassion, it was significant to assess recent literature in relation to both self-compassion and compassion. Indeed, Choi and Tobias (2015) portray how the compassion aspect of mindfulness is relatively overlooked. Three studies highlighted the role of compassion in physiological health. Dodds, Pace and Wheils (2015) conducted a feasibility study of compassion training and found preliminary evidence to suggest compassion training may be very useful for improving depression and enhancing wellbeing while surviving breast cancer. Indeed, Khazan (2015) and Kilich (2015) augment and introduce a framework for integrating mindfulness and acceptance skills in biofeedback and provide treatment relevant examples. These studies suggest compassion training is also pertinent for wellbeing and acceptance. As above, this begs the question as to what underlying mechanism around the nature of compassion elicits such changes.

A further six studies reported evidence to suggest a link between compassion and diverse affect in relation to wellbeing. Bluth and Blanton (2013) too conducted an intervention with adolescents to discover that both mindfulness and self-compassion act as mediators for emotional wellbeing. Boeresma et al. (2014) conducted a study to show that compassion-focused therapy buffered shame, self-criticism and isolation and may address problems with self-compassion. These studies suggest that there is a link between mindfulness, wellbeing, self-compassion and compassion. Finley-Jones, Rees and Kane (2015) significantly demonstrate the mediating role of emotional regulation difficulties in the self-compassion/stress relationship. This demonstrates the challenges of emotional regulation and points toward mindfulness as a way of a successful emotional regulation. Those who find this difficult seemingly have a higher likelihood of a lack of self-compassion. Lim, Condon and DeSteno (2015) showed how those assigned to a mindfulness control group elicited more compassionate responses than others did, however, interestingly found that empathic responses were not due to the associated increases in the ability to emotionally decode the experience of others. Finally, Zeller et al (2014) study

self-compassion as a protective function for past trauma with respect to post-traumatic stress, panic, depression and suicide symptoms. This area of research brings to the foreground the relationship between mindfulness and compassion. The studies further highlight emotional regulation as being central to this relationship.

An alternative way of viewing compassion is loving kindness meditation [LKM]. LKM is generating some interest and Giovannani et al. (2015) showed how probation officers reduced their stress by practising loving kindness meditation with themselves and others and became more caring, present and authentic. Cheng and Se (2013) conducted an empirical review and found that compassion, loving kindness and Mahayana Buddhism were pertinent for mental health, psychotherapy and counselling. LKM is a more explicit method of eliciting such qualities and offers evidence-based practice under the umbrella term 'LKM' that is traditionally an Eastern practice.

Three studies framed the way in which the world lacks understanding of compassion in healthcare and highlight gaps in the literature. Emotional regulation is discussed as a mediator between self-compassion and compassion for others. Indeed, Choi and Tobias (2015) portray how the compassion aspect of mindfulness is relatively overlooked. The authors advocate equanimity and prosocial orientation as critical for collective levels of mindfulness. Further, Orrellana et al. (2018) show how mindfulness and compassion practices of palliative care teams at work reduce two out of three burnout components (emotional exhaustion and personal accomplishment). This is especially pertinent given the potential maladaptive aspects of 21st century addiction to the internet and smart phones. This is significant when taking Sinclair, et al.'s (2016) review into consideration, which highlighted the lack of understanding of compassion in healthcare practice and a lack of patient and family voices in researching stress, burnout, enhancement of self-care, emotional regulation, competencies and joy at work. These records suggest there is a key relationship between compassion and emotional regulation as well as having the ability to decrease burnout symptoms.

Recent findings by Iskender and Akin (2011) found that self-kindness, common humanity, and

mindfulness factors of self-compassion were found to be negatively associated with internet addiction. Whereas, self-judgment, isolation, and over-identification factors of self-compassion were found to be positively associated. This is further indicated in Bluth et al.'s (2015), that highlighted adolescents with greater self-compassion self-reported greater emotional wellbeing than those in a low self-compassion group.

A clear link between compassion, mindfulness and equanimity

Compassion ascends via a plethora of emotions, motives, thoughts and behaviours. Therefore, rather than agreeing on a single definition of compassion, the author promotes the idea that cruelty decrees compassion's antithesis. That, the desire to alleviate the suffering of others, or the care-giving mentality (Bowlby, 1982) that underpins compassion act as core components of the construct (Gilbert, 2005). This is in line with Bierhoff's (2002) distinction that the notion of compassion is inextricably linked to pro-social behaviours of an action intending to improve the situation of the recipient. It is therefore reasonable to postulate that compassion evokes a sense of interconnectivity with humankind. Indeed, in Buddhism, two key elements; that of developing mindfulness and cultivating compassion have crossed swords with Western science (Davidson & Harrington, 2002) yet little attention has been given to examining how these states emerge from and impact our physiological systems. Indeed, Wang's (2005) research into physiological systems leads to the conclusion that compassion is dependent on a unique type of awareness beyond the self but that is inclusive of others. The author postulates that equanimity disarms the strong distinction between the self and other and acts as a facilitator to cultivate compassion. Only through the softening of a strong sense of 'like'/'dislike' that is projected onto the 'other' can compassion deepen both within oneself and towards others.

This would ameliorate the potential discomfort that compassion can manifest, which is exemplified by Condon and Barrett (2013), who demonstrated in their study that participants felt increased levels of unpleasant effects when faced with increasing levels of suffering. Their research highlights how experiences of compassion were unpleasant when exposed to another's suffering, or

pleasant towards neutral indicators. Interestingly, differentiated experiences of compassion open the possibility for equanimity to take centre stage. As compassion is seemingly conceptualised as pleasant yet may manifest as a difficult emotion, it is here an equanimous approach towards one's own sense of 'unpleasant' may ameliorate this dichotomy. The authors concluded that similarly to leaving the environment when experiencing anger, a pleasant, calm experience of compassion might best facilitate the reduction of another's suffering, opening the primary objective of contemplative practice in inducing calm compassion in the face of another's suffering. Again, it is postulated that the optimum experience of calm compassion is derived from an individual manifesting foremost equanimity, so that when faced with a situation, regardless of pleasant, unpleasant or indeed neutral one is best able to cultivate compassion based on this quality.

Cameron, Payne, Sinnott-Amstrong, Scheffer, and Inzlicht (2017) compound this further by citing that implicit moral evaluations of the wrongness of actions or people play a key part in moral behaviour. Regardless of the principles on which they are based, an individual deploys intentional or unintentional judgement eliciting the variability of moral cognition. This is further evidence to support the need for analysing judgements and harbouring equanimity by suggesting equanimity could enable individuals to cope with the aversive nature of compassion by cultivating even-mindedness. Compassion is something we can achieve and nurture once we have a grasp of what it is to not judge, and accept phenomenon as transient moments in time rather than a fixed and rigid reality. Without a fully working model of judgement that indicates the barriers one is up against; the practice of mindfulness could be relatively superficial as one is unable to fully manifest equanimity let alone understand it. "When we practise judgement and criticism, we strengthen neuropathways of negativity, conversely, when we practice equanimity, openness, and acceptance, we strengthen our capacity to be with whatever arises in our field of experience, negative or positive." (Shapiro, De Sousa, &, Jazaieri, 2016, p. 109, cited in Ivtzan & Lomas, 2016).

Sinclair et al. (2016) conducted a systematic review over the past 25 years of compassion in healthcare and highlighted that 40% of studies identified barriers to providing compassionate care

across the clinical, health care and education sectors, concluding that understanding of the nature of compassion is underdeveloped and there are significant barriers to its practice. This is exacerbated when taking into consideration research suggesting it is not just the absence of compassion that is significant in today's society but also the fear of compassion (Gilbert, McEwan, Matos, & Rivis, 2011). Dynamically resisting engagement in compassionate experiences should be a major concern in an increasingly competitive society (Gilbert, 2009), as governmental reports, such as the Francis Report (2013) indicate there are major concerns surrounding compassion in health systems internationally. The decline in compassion and empathy is compounded further by Konrath, O'Brian and Hsing (2011) who demonstrated that over time, individuals experience a lessening of empathic concern and utilising perspective towards others. Worryingly, this was a more recent phenomenon as the experience was more distinct in samples post year 2000 (Shonin, Van Gordon, Compare, Zangeneh, & Griffiths, 2014). Todaro-Franceschis' (2012) work on compassion fatigue and burnout in nursing would support this claim. It is imperative to consider that compassion is not a quality that you either have or do not have but one that is inherent and just needs nurturing.

The above records on self-compassion and compassion suggest mindfulness leads to greater self-compassion and compassion and highlights the need for greater understanding of emotional regulation as part of this process. Seemingly, those who find emotional regulation difficult have a higher likelihood of a lack of self-compassion and compassionate responses to others. The question of why mindfulness leads to greater compassion is paramount. What underlying mechanisms are part of this process and how can this relate to emotional regulation? This suggests the link between mindfulness and compassion lies in the possible mediating role of emotional regulation. The barriers to achieving equanimity are an increasingly important consideration in being able to emotionally regulate, as well as not supporting individuals to a position of non-judgement. Equanimity was also cited as countering the potential harmful aspects of internet addiction by buffering the negative linkages to self-compassion and social isolation. Previous research has identified compassion as a key facet of wellbeing and pointed towards emotional regulation, yet further research is needed to explore the underlying mechanisms of

emotional regulation. Therefore, the question of how emotional regulation is measured is raised, and more importantly, that equanimity was not used as a measurement within any of these studies that relate to compassion.

2.7 Emotional Regulation

In terms of focusing solely on emotional regulation, Crane and Ward (2016) promote the use of self-care practices such as mindfulness in nursing. Di Klich (2016) shows how a clinical approach to teaching self-regulation and self-compassion can facilitate veterans returning to the civilian world. Rodríguez-Carvajal et al. (2016) highlight how there is a sequential relationship that is established in order to cultivate positive mental states towards others. The authors show how regular mindfulness leads to 'trait mindfulness', which is then a suitable platform to develop self-compassion. That is, once the mind is subdued and less distracted, it is then able to practice self-compassion. which subsequently leads to the development of positive mental states towards others. A link to personal resilience and emotional regulation as part of this process is exemplified by Loh, Schutte and Thorsteinsson (2013) who examined the role of characteristic affect and resilience. The authors found that greater negative effect predicted worsening of depression, and resilience fully mediated the effects of positive affect on change in depression. These studies highlight how emotional regulation plays a central role in facilitating wellbeing. The records on emotional regulation solidify this link between mindfulness and compassion and that this is dependent on sufficient emotional regulation. This confirms the hypothesis that emotional regulation plays a crucial role in eliciting prosocial change within an individual, with depression one potential negative outcome due to poor emotional regulation. The ability to emotional regulate is one of the key components posited within the judgment cycle theory and further tested within the EBS, (Weber, 2017). The question of how effective emotional regulation tools are is raised here.

2.8 Alternative therapies

Whilst the effects of mindfulness are now researched, studies on 'alternative therapies' such as yoga and tai chi are also increasing. 'Alternative therapies' promote the practices of compassion and emotional regulation from a diverse array of perspectives. The following records were identified and reviewed. A Randomised Control Trial on yoga, (Toise, et al 2012) highlights how adapted yoga therapy reduces shock anxiety and increases self-compassion and mindfulness in relation to the control group. Khalsa et al (2012) conducted an RCT on yoga on adolescents to discover a variety of mental health variables improved via an 11-week yoga intervention relative to the control group. Further, Froeliger, Garland and McClernon (2012) show how yoga may be linked to therapeutic benefits in relation to neuroplasticity. In terms of relating this to counsellors, Pittoello (2016) conducted a qualitative enquiry and portrayed how yoga enhanced the counsellors' ability to remain person-centred and their ability to let go. Nedelkovic et al. (2012) highlight beginners' expectations in relation to tai chi finding that there is an expectation that this practice is a positive form of stress management. Kjellgren et al. (2010) offer insight into the positive effects of psychotherapeutic and relaxation effects on 'burnout syndrome'. Grabbe, Nguy and Higgins (2011) show how a spiritual mindfulness course aimed at homeless youth improved resilience, mental wellness and spirituality. These studies suggest an overlap between mindfulness, compassion and emotional regulation.

The extent of research into positive dimensions of mindfulness, and related therapies highlight the diverse range of interventions that draw on similar or underlying meditative techniques, which raises the question of what is it that connects the above interventions with the well-researched mindfulness and compassion related interventions. This raises the question of whether positive affect can be evaluated using equanimity as the possible bridge between mindfulness, associated therapies and compassionate activities. The link to alternative therapies raises the question of what aspect of these varying therapies remains comparable to the plethora of mindfulness and compassion interventions. This confirms the suggestion that there is a direct link between mindfulness and compassion and that

this commonly permeates via emotional regulation, which again has been tested within this thesis by the non-judgement cycle and the validation of the EBS (Weber, 2017).

2.9 'Spiritual' Pluralism

"Mindfulness has a universal nature. You can find it in every spiritual tradition. If you study deeply the life of a sage from any tradition, you will find a quality of mindfulness in his or her life. A sage is capable of living every moment of his or her life deeply and of touching the beauty and truth in each moment of life" (Ticht Nhat Hanh, 2008, p 46).

The overarching theme of 'world view' was included in the search in order to help potentially deconstruct elements of practice and further find common linkages between Western science and eastern practice. This is especially pertinent in relation to contemporary society and the lack of understanding about compassion. To deconstruct elements of practice and find common linkages within them all, is particularly relevant in contemporary society. The result was in a total of 22 records reviewed.

The significance of 'spirituality' is raised by Callahan (2015) who appeals for the need to address spiritual competence in hospice workers. The significance of spirituality is reinforced by Sevlam (2014) who reviews positive psychology character strengths to discover spiritualty as salient. Ting and Ooon Ng (2012) highlight the psychotherapeutic integration of Christianity, Buddhism and Taoist approaches in the Chinese community in Malaysia and advocate a 'tradition-sensitive approach'. Indeed, Sharf (2014) draws on sociological parallels between modern mindfulness practices to early medieval Chan in China. From a cognitive behavioural perspective, Murguila and Diaz (2015) trace the roots of the philosophical foundations of CBT to discover Stoic, Taoist, Buddhist and Existentialist philosophical traditions. This suggests a wide array of research practices overlap and can transcend cultural and contextual norms. Clinical and medical support for spiritualism is garnering support. A study looking at adolescent asthma sufferers found that people experience worse outcomes when not

using spiritual coping and often use techniques such as prayer or relaxation to manage symptoms. (University of Cincinnati Academic Health Center, 2011).

Marquez (2012) highlights the differentiation between Buddhist interpretation of consciousness as a continuum prior to conception that will carry on after this life. Hawkins discussed consciousness from a Western perspective too and points to the critical role of the 'ego', which conforms to Buddhist views. Hawkins refers to energy levels and argues if no spiritual work is undertaken then it will remain low and produce guilt, shame, pride, greed, rage, envy, jealousy, hatred, etc. (Hawkins, 2001). Yet we can overcome the ego if we see it as the enemy and focus our lives toward the cultivation of prosocial emotions and connection. Hawkins (2001) further attempts to calibrate the world's religions. "Buddhism, based on the teachings of Buddha (Hawkins' calibration: 1,000), calibrates highest from all religions in these times: Hinayana Buddhism (the lesser vehicle) still calibrates at 890; Mahayana Buddhism (the greater vehicle) calibrates at 960; Zen Buddhism is 890" (Hawkins 1995, p. 273). Western perspectives on consciousness concur with the Buddhist perspective, such as causality being perceived in a wider scope than purely linear. Ego is seen as a foremost obstacle toward universal wellbeing, and therefore as an obstacle toward realising self as an interconnected part of oneness and meditation and introspection are sources to elevate consciousness. These two studies suggest consciousness and understanding of the 'I' remains pertinent in terms of attaining wellbeing.

This is confirmed by Samuel (2014), who asserts:

"As an anthropologist, the way I would put it is that Western science is a part of culture, and that despite the famous claims of objectivity and value-freedom made on its behalf, all modes of scientific enquiry are deeply shaped and formed by the personal lives of the researchers, and by their social and cultural contexts. One critical issue that has been ignored within much of the current scientific work on neuroscience, meditation, and mindfulness might provide an important starting point

for such revision and extension. This is the question of the self, of personal identity, and of the relationship between the individual and the wider universe" (p 52).

This suggests that further empirical work should be done on the central theme of 'self' and 'ego' in order to understand the role self-identity has on health and wellbeing.

In relation to Buddhism, four records promote Buddhist practice. Loue (2010) uses Buddhism as an example of exploring religion and the ethical tenets of research. The author synthesises the ethical principles of Buddhism to demonstrate how these mirror the widely accepted ethical principles in research. Fulton (2014) further discusses the ways in which mindfulness is radically altering the way we think of the healing process and advocates Buddhism as a method of trans-theoretical and transcultural model of suffering and its treatment. This denotes there is a potential overlap between Buddhism and health.

In relation to Christianity, two studies were identified. Bray, Egan and Breagan (2012) found that evangelical Christianity supported compassionate activity. Scheffler (2014) further draws on comparisons and overlapping themes from Christianity and specifically Luke's Gospel and the recent phenomenon of positive psychology that is particularly relevant when establishing religion and prosocial qualities. This further consolidates the relationship between 'religion' and 'science'.

Five records attempt to synthesise the religious aspects of interventions and highlight connections between practices, tradition and paradigms. Ting and Ooon Ng (2012) highlight the psychotherapeutic integration of Christianity, Buddhism and Taoist approaches in the Chinese community in Malaysia and advocate that a 'tradition-sensitive approach' could lead to even more effective results. From a cognitive behavioural perspective, Murguila and Diaz (2015) trace the roots of the philosophical foundations of CBT to discover Stoic, Taoist, Buddhist and Existentialist philosophical traditions. Indeed, Sharf (2014) draws on sociological parallels between modern mindfulness practices to early medieval Chan in China. Ng (2012) further draws on comparisons with

Vipassana meditation and Foucauldian theory positing similar concepts of faith. Vorkapic (2016) encapsulates this potential blend, by asserting contemplative research found that modern interventions in psychology might not come from modern concepts after all, but share great similarity with ancient yogic knowledge, giving us the opportunity to integrate the psychological wisdom of both East and West.

A further seven studies use the term 'spiritual' as a way of conceptualising the benefits to health care. Clinical and medical support for spiritualism is garnering support. Rollins (2011) uses curiosity theory to highlight the healing nature of artwork in healthcare settings. The notions of discovering curiosity, shows how these qualities combined with healing artwork can make a meaningful contribution in healthcare settings. These studies suggest that under the umbrella 'spiritualism' there are distinct qualities that have therapeutic dimensions, which can even be transcended through artwork.

In an analysis of models integrating religion, spirituality and medicine, Balboni and Patreet (2014) state that "it is essential to address both patient and clinician spirituality in achieving this goal because spirituality, broadly defined, is an irreducible dimension of every person regardless of their spiritual, cultural, religious, or other identification" (p159). However, of course, sceptics (Brown, 2015) may argue how 'integrative medicine' creates biomedical, ethical and legal dilemmas through a lack of informed consent. Farb (2014) further also discusses the ethical implications of 'right mindfulness' and 'wrong mindfulness' and the danger of unreasonable inflation of expectations. Here we see the potentiality of a lack of clear ethics within the multitude of practices or a universal ethics that remains pertinent to Western science that cuts through religious and spiritual practices.

Four records encapsulate the interconnection between contemporary society, the mindfulness movement and spiritual practice. Walsh (2010) evaluates the increasing 'spiritual pluralism' of our time and speaks of the intertwining of religious and spiritual practices. Ozawa-de Silva (2016) speaks of how contemplative science must incorporate wider types of meditation including analytical styles and also to embrace the issue of ethics as a framework to understand contemplative science. Finally, Lee (2015)

discusses the concept of sociological mindfulness and the debate about mindfulness at work as a multilevel phenomenon. The authors discuss the fact that the terms 'religious', and 'spiritual' are now in American mainstream society, and in corporate retreats and schools. A secular mindfulness movement is now a great example of postmodern secular spirituality. Sociological mindfulness combines contemplative practices so that structural and cultural issues are specifically addressed. Relevant literature on 'worldview' provides evidence to suggest the concept of a 'spiritual pluralism' of the 21st century and the subsequent 'ethical dilemmas' that this can create. However, more pertinently, this could point towards a synthesis of practice, or an underlying mechanism that binds the above practices together. Thus, if it is equanimity that facilitates prosocial change, then there must be greater recognition and measurement of this construct.

2.10 Fostering connection to others

Emerging from the literature was the concept of connection. Any mechanism that promotes active self-reflexivity is therefore a beneficial one. Bayer and Cayon (2010) examine post-conventional consciousness in leadership and surmise mindfulness plays a crucial part of enabling leaders to be more objective and overcome the limitations of their worldview. Hunter (2011) confirms the need for leaders to evoke humility and mastery of self-awareness. From a macro perspective as a society, leadership plays a crucial role in the development of its citizens. Slade (2010) emphasises how the shift from health services' focus on wellbeing rather than treating illness must coincide with new education and training from recovery and positive psychology. Here the concept of connection is made explicit, as is the role of awareness in leadership. A quality of mind that fosters awareness and connection to others is therefore advocated.

Swierzicek (2014) analyses global leadership and advocates equanimity as part of enlightened leadership. "Enlightened leadership is truly dynamic based on, moment-by-moment contingencies and the balance of on-going inner spiritual practice of compassion and equanimity (inner and outer balance)" (p701). The 21st century is bringing with it significant challenges and the ability to buffer

maladaptive affect should be transparent in our leadership. This is portrayed by Zacher et al. (2013) who studied 75 religious leaders and found that personal wisdom rather than intellectual stimulation has a positive effect on their followers. Evidence of resonance, emotional and social contagion and emotional synchronicity was demonstrated by Amat et al. (2016) who found rising oximeter readings when teachers facilitated sessions on racism. Should citizens adopt an equanimeous mind then this may filter down and encourage social cohesion. These studies suggest equanimity, as a crucial aspect of balance and wisdom, has a positive effect on others. Furthermore, the latter study shows how emotive discussion physiologically affects the individual. Thus, fostering equanimity at the top would have a beneficial outcome as this quality permeates outwards.

The above section indicates that connection is a significant quality in order to enhance social cohesion, effective leadership and interconnection between its citizens. This suggests a need for an underlying mechanism to bind this dichotomy. The connection of wisdom and happiness seems to come to light, when discussing the worldview of clients wishing to pursue a life of contemplation. Philosophically some authors suggest an increase in wisdom suggests a decrease in happiness, whereas some advocate wisdom as the supreme part of happiness. Bergsma and Ardelt (2012) tackled the dichotomy between wisdom and happiness from a sample of 7037 respondents and reported that happiness and wisdom do not conflict. Indeed, Saeed and Yasin (2017) researched Pakistani slum dwellers and explored the theme of mindfulness and equanimity as contributing to their overall resilience and meaning of life. Boekaert and Zoelna (2012) confirm the significance of worldview and speak of how business needs a deep sense of interconnectedness in order to open a space away from the pressures of the market. They advocate 'spiritual ethics' as a way of fostering interconnectedness.

Wong (2011) firmly established the four pillars of the 'good life' as wellbeing, virtue, resilience and meaning. The author highlights how eudemonic happiness is underpinned by moral and ethical principles one of which could encompass equanimity as a wholesome mental state. Doetsch-Kidder (2012) discusses the ways in which 'loving criticism' can foster meaningful social change and advocate for the political activist to harbour qualities such as acceptance, gratitude and compassion. The authors

show how prosocial qualities bridge the gap between hatred and human connection. Ozawa-de Silva (2016) speaks of how contemplative science must incorporate wider types of meditation including analytical styles and also to embrace the issue of ethics as a framework to understand contemplative science. This places connection and interconnection as a key variables in the mean to cultivate prosocial qualities such as compassion. For humanity to connect there seems to be the need for universal language that encompasses worldviews and delves into the realm of psychological processes that foster connection.

2.11 Equanimity as a possible 'connector'

The review thus far has examined the role of emotional regulation to cultivate compassion. The review has focused on the concept of connection as an underlying mechanism for wellbeing and so now turns towards equanimity as a possible 'connector'. This section will analyse current literature on equanimity in more detail.

It is pertinent to assess psychological components that may facilitate wellbeing, health and social harmony. One key trait that could run through all the therapeutic and religious practices could be equanimity. In order to examine equanimity further, the following records were reviewed. Deshmukh (2011) raises the significance of 'equanimity' in Vedic psychology by stating how a person with perfect wisdom has outgrown egoistic desires and delusional conflicts. A person 'is free of extreme negative and positive emotions'. This is strikingly similar to the concept of equanimity in both the Tibetan Buddhist Hinayana and Mahayana schools of thought as the recognition of personal attachment and aversion and quest to be free from it; "unperturbed by changing events he enjoys spontaneous inner bliss" (p37). Here, equanimity regarding the Tibetan Buddhist Mahayana view of dissolving constructs of friends, enemies and strangers advocates a universal connectedness. Equanimity towards one's own thoughts becomes the method of translating this onto others (Wallace, 2010). Interestingly the key concept of 'connectedness' remains a constant theme and is linked to resilience.

Nickerson and Hinton (2011) highlight the crucial practice of equanimity in their study of traumatised Cambodian Buddhist monks. The concept of equanimity, which was identified by monks in the present study as a key aspect of anger regulation, is also paralleled in treatment interventions that draw from mindfulness principles. Specifically, treatments such as MBCT and MBSR emphasise the importance of distancing oneself from one's internal thoughts and feelings.

Indeed, Marques (2010) highlights how applicable Buddhist practices are in the workplace such as the generation of healthy detachment and greater personal responsibility. However, the author cites equanimity as a potential weakness in terms of harnessing competition and interest. It is hypothesised here that the author denotes aspects of apathy in the construction of the term 'equanimity', in which case, it could be argued that in order for the facilitation of healthy attachment, equanimity would facilitate this process and evoke efficiency rather than act as a regressive technique in the world of competition. Again, this would have to be evaluated in the context of an ethical workforce and organisational remit.

Therefore, the research suggests there is a possibility that within the space of mindful attention and action there are a vast amount of alternatives that could be considered. Nedelsky (2011) distinguishes between receptivity and judgement using mindfulness as an example of receptivity, and states judgement as a distinct cognitive capacity. The author argues one must take a stance of non-judgement that is characterised by receptivity. Discernment is different to judgement and the author argues both receptivity and judgement are important ways of being. Receptivity is vital for judgement however; this may be changed to "receptivity is vital for equanimity. Equanimity then enables wise judgements, which leads to wise action." (Ibid, p 114).

However, there is not much research in this area. Zeng, Oio and Liu (2014) review awareness and the value of monitoring emotion in Goenke Vipassana meditation and propose equanimity as a critical construct of emotional regulation. Boyd-Willson and Walkley (2015) created the

'enlightenment scale' which covers factors of being at peace and being open hearted and Zeng et al. (2014) conducted a revised scale to incorporate equanimity as a measure and to avoid confusion with awareness and equanimity; however, this is the only scale that attempts to measure this construct. Zeng, et al. (2013) confirm this by providing a critical analysis of mindfulness measures to assert there is confusion within the literature about what measures capture awareness, judgement, equanimity and acceptance.

A suggestion is that equanimity could act as the crucial link to health and wellbeing between a diverse array of spiritual and religious traditions and contemporary evidence-based interventions. It is more pertinent to assess psychological components that may facilitate wellbeing, health and social harmony, rather than to get caught up in disparity. However, this construct is relatively overlooked. Thus, research is needed to explore the construct of equanimity and foremost barriers that may prohibit an individual in reaching such a state. This confirms the hypothesis that equanimity should be made more explicit within the literature.

In recent years, mindfulness has become a widespread practice in the western world to increase psychological wellbeing. Kabat-Zinn (1979) explicitly verifies how this practice rests at the heart of Buddhism. While Western scales of mindfulness have been fruitfully established and applied, when Buddhism is considered, equanimity is a crucial aspect of the development of self and one that seemingly underpins Western definitions of mindfulness. If we are to consider mindfulness from the Buddhist perspective, we need to further explore the concept of equanimity. The importance of cultivating a state of equanimity can be proposed in view of the connection with acceptance both of self and others (Hadash et al. 2016) as well as having been suggested as being the most significant psychological element in the improvement of wellbeing (Desbordes et al. 2015).

2.12 Merging contemporary mindfulness with equanimity in consideration with Buddhism.

It is important to note that in Buddhism mindfulness and equanimity are given clear distinctions. Equanimity has been described as "a state of mind that cannot be swayed by biases and preferences; an even mindedness in the face of every sort of experience regardless of whether pleasure (or) pain are present" (Thanissaro, 1996, p. 262). That is, one experiences mental states with equal interest without repression, denial or judgement. In Buddhism 'equanimity' or ('upeksha' in Sanskrit) contains multi-dimensional constructs and for the purpose of this chapter the author defines equanimity as a mental state that requires practice and manifests as "a balanced reaction to joy and misery" (Bodhi, 2000, p. 34). Therefore, an element of impartiality is achieved so that when unpleasant thoughts arise, an individual is able to attend to them without denial, repression or aversion. Similarly, when pleasant thoughts arise, one can attend to them without becoming over-excited or trying to prolong them, or becoming addicted to them (Grabovac, Lau, & Willett, 2011).

In Tibetan Buddhism this inner cultivation of equanimity is referred to as the Hinayana attitude, and the Mahayana attitude is then cultivated when this attitude is extended towards all beings (friends, enemies and strangers) without the superficial boundaries that we habitually create (Thubten Yeshe, 1998). It is imperative to differentiate that equanimity is not apathy or "indifference but rather of mental imperturbability" (Thanissaro, 1996, p. 263). The Dalai Lama (2001) asserts equanimity really does allow you to be free from becoming caught up in the play of emotions. Not only is equanimity the cultivation of an even minded response to all experience, but also involves the practice of maintaining calm in the face of provocative stimuli (Carmody & Baer,2009). It is here that the concept lends itself to emotional regulation as equanimity can alter both the quality and magnitude of responses (Gross & Thompson, 2007). Thus, research into equanimity in isolation from mindfulness is key in establishing adaptive processes that may aid neurocognitive, psychological, physiological and behavioural mechanisms. Equanimity is distinguished by a lack of strong liking (attachment), aversion (dislike) or neutrality towards phenomenon and is characterised by the steadiness of the mind under stress, being calm and even-tempered. It is a balanced state of mind that is evoked by the process of mindfulness. It does not mean indifference but a vehicle to connect from a point of genuine affection rather than bias

subjection. Thus, by developing equanimity it can be argued that equanimity becomes the foundation for self-compassion and compassion for others. An equanimous attitude towards one's own transient experience and then towards others could be separated into two subscales. Firstly, as an experience towards one's own perceived reality, in mindfully attending towards phenomenon one deploys equanimity in order to allow things to come and go and to become removed from emotive responses. Then paradoxically, this hallmark is transferred towards others that highlights a more objectively compassionate outlook on reality.

Equanimity manifests a balanced reaction to the joys and miseries of mental experience that protects the mind from emotional agitation, which highlights its significance in emotional regulation but also as a vehicle for cultivating compassion. Mindfulness in this instance invites the ability to remain consciously aware of experience, whilst equanimity allows this awareness to be unbiased by facilitating an attitude of non-attachment, aversion and ignorance. Ultimately, this process acts as a facilitator for compassion given certain levels of discernment, so it seems critical to measure the connection between mindfulness, equanimity and the cultivation of compassion. Multiple measures exist that examine the attentional, awareness and non-judgement aspects of meditation practice, but measurement of the compassion component is again lacking. Furthermore, a subtle level of discernment is promoted within Buddhism in line with ethical codes (Dunne, 2015). A dispositional tendency of equanimity that is developed over time via specific practices is less challenging than 'non-judgement' and 'acceptance' that is applied when being 'mindful' then potentially abandoned when out of practice.

As previously mentioned (Chapter 1, p.9), mindfulness and equanimity have clear distinctions, which are notable when contrasting Western scientific definitions. Equanimity clearly relates more to the concept of judgement and draws associations between the awareness of both the recognition and absence towards judgement [i.e. one's discrimination faculties]. Indeed, Weber (2017) gives a more detailed account of these conceptual differences. The paper argues that modern-day mindfulness scales have a bias toward attention and memory foci and reflect anecdotal suppositions into the domain of

non-judgmental acceptance and as such, minimise the potential to account for the more insightful quality of engagement with mindfulness, which points towards why understanding barriers to equanimity would provide useful advancement in the field of Western psychology.

Buddhism clearly positions mindfulness as being a central facet in the development of compassion for both self and others and only one facet of a much broader psychologically regulated process that incorporates the cultivation of the four immeasurable qualities: [loving kindness (metta), compassion (karuna), joy (mudita), and equanimity (upekkha). Whilst equanimity is central in both Theravada and Mahayana Buddhism, it is only the 'internalised equanimity' that resonates in both traditions, that is the manifest internal reaction towards one's attachment, aversion and indifference, which clearly serves some commonality with the most notable neuroscientific definition of equanimity as being 'the suspension of judgement to be intrinsically good or bad'. However, in Mahayana Buddhism, this internalised state of mind becomes translated externally towards friends, enemies and strangers (Wallace, 2010; Zopa, 2013). Thus, it seems necessary to confirm that Farb et al.'s (2012) internalised definition of equanimity is both respectful to both major schools of Buddhism whilst being scientifically relevant in Western neuroscience (Weber & Lowe, 2018).

It is interesting to say at least that equanimity has found its way to the latest neuroscientific research. According to Farb et al. (2012), equanimity provides a crucial aspect of emotional regulation by limiting the 'automatic affect processing' or the automatic response of initial evaluative reactions and then go on to explain how portions of the brain can be engaged constructively in the development of compassion. This further reiterates how equanimity seemingly goes beyond momentary 'acceptance' and 'non-judgement', which are inextricably associated in contemporary mindfulness, to an enduring and more holistic state of being, directed via the sincere concern for others. Indeed, Schonert-Reichl and Roeser (2016) claim that equanimity embodies a more profound level of insight and the observing of mental experience from a more objective perspective than the modern day theory of mindfulness

practice suggests, and therefore allows the practitioner a greater comprehension into the construction of their conditioned subjectivity in relation to their modes of discernment.

Rozeboom et al. (2016) highlight the role of equanimity in the development of leadership capabilities, capacities and qualities and advocate it as a central concept in leadership. It seems equanimity is at the forefront of an even minded response to phenomenon, and further advocated toward the practice of maintaining calm when faced with provocative stimuli (Carmody & Baer, 2009). This clear association binds equanimity within the realm of emotional regulation, which can alter both the breadth and depth of response (Gross & Thompson, 2007). Henceforth, research into equanimity as an isolated construct away from mindfulness may prove a crucial element in establishing adaptive psychological processes.

Within the provinces of health and social psychology the fostering of equanimity can be seen as underpinning the mechanisms that encourage social connectedness and self-continuity (Sedikides et al, 2015). For example, equanimity could have an active role in goal motivation and achievement (Spence & Deci, 2016), providing a buffer against psychopathology (Trumpetter et al. 2017) and being central to longevity and happiness in life (Johnson & Acabchuk, 2017). Therefore, developing a "barriers to equanimity scale" that highlights which areas within human experience could potentially prevent the development of wellbeing and achievement of potential, would be a useful tool in both prevention of un-wellness and dis-connect in many areas of life" (Weber & Lowe, 2018).

As human nature can be said to be intrinsically judgmental, yet increasing research points towards judgement's negative affect, there is a need to enhance non-judgement. If an individual wishes to refine the non-judgemental aspect within mindfulness, a scale to make this more explicit is therefore pivotal. Indeed, there have been several publications to highlight the barriers specifically related to meditation. Indeed, Carlson (2013) showed how there were both motivational and informational barriers to practice. Further, Olano et al. (2015) demonstrated socio-economic barriers to engagement

by reporting that men and those in vulnerable groups with lower health outcomes are half as likely to engage. In relation to negative affect, Fincuance and Mercer (2006) and Foster (2015) demonstrated how mindfulness can lead to distress during meditation. These records demonstrate the need for more comprehensive tools to capture barriers to practice. Understanding these barriers will help mitigate against adverse effects during meditation and increase knowledge towards barriers in relation to individual discrimination faculties.

It is interesting to note that Aldina (2015) suggests mindfulness without prosocial elements of compassion and empathy can appear 'dull' and 'cold'. This is perhaps why Brahm (2016) suggests 'mindfulness' without 'kindfulness' is insincere. It is here that barriers to meditation are further exacerbated when considering the development of prosocial qualities. There is a clear link between barriers in mindfulness practice which could limit the likelihood of the development of such qualities, thus providing barriers to equanimity.

Durkin et al. (2018) highlight how compassion training has global implications for nursing care. Indeed, compassion is a prominent feature for healthcare professionals as a crucial aspect of mental wellbeing, reflected as a core value in national organisations like the UK National Health Service and national professional competencies within nursing (Department of Health, 2012). Moreover, there are growing publications on the need and therapeutic approach of nurturing greater self-compassion (Neff, et al. 2007). However, it is argued, that both self-compassion and compassion can only be achieved and nurtured through non-judgement and an acceptance of phenomena as a fleeting moment in time rather than as an immovable and rigid reality.

As mentioned earlier (p.28), research by Condon and Barratt (2013) shows how the experience of compassion can be discomforting, which in turn presents a dichotomy given compassion is often conceptualised as pleasant and satisfying. Therefore, it seems apt to propose equanimity as a healthy construct to counter this adverse effect. Equanimity can be applied as a direct antidote in relation to those who find compassion difficult and would buffer against compassion fatigue. An individual would

approach one's sense of 'unpleasant' with equanimity and lessen this incongruity. This again points towards the need to research and analyse individual judgements and nuances in order to cope with the adverse nature of compassion and nurture even-mindedness.

There is little doubt contemporary 'mindfulness' is a multifaceted construct. This is confirmed by Baer et al. (2006) whom advise mindfulness contains constructs such as observing, judgement, acceptance, awareness and non-reactivity. However, when considering mindfulness origins, it is noteworthy to further explore Buddhism to aid further advancement in the field. In relation to equanimity specifically, it is important to state that non-judgement and acceptance do conceptually overlap, however it appears equanimity is an altogether new phenomenon in Western psychology and has its own identity in relation to 'non-judgement' and 'acceptance'. Indeed, Van Gordon, Shonin and Griffiths (2015) confirm how there are two generational conceptualisations that seek to engage with mindfulness that offer differing approaches. The authors use the term 'first generation' which describes Kabat-Zinn's 1970's inception and all of MBSR's derivatives, whereas 'second generation' describes a more Buddhist focus in relation to ethical doctrines. Thus, research into equanimity and its barriers would aid empirical investigation into this narrative.

The four immeasurables are seen as virtuous qualities [loving kindness, compassion, empathic joy and equanimity] in Buddhism, which are stringently developed alongside mindfulness. However, the only scale currently looking at the four immeasurables aimed at measuring compassion and loving kindness is the 'Self-Others Four Immeasurables' (SOFI) (Kraus & Sears, 2009). This was designed in order to measure loving kindness, compassion, joy and acceptance toward both self and others.

When observing the contrasting approaches to Buddhism and Western psychology, a useful method of enquiry is perhaps to focus on the similarities rather than differences. Charters (2013) draws on these resemblances in further detail. Gergen (2001) strengthens this integration by focusing on the roughly overlapping theories of dependent origination and social constructivism. As a species human

beings are dependent on "cultural conditioning, family upbringing, personal experience, and the basic biological predisposition toward making distinctions and measuring recent experience and future hopes and fears against a neuronal warehouse of memories" (Swanson & Mingyur Rinpoche 2010, p. 265). Indeed, even the conceptual similarities with the end goals of Buddhism and modern psychology are clearly notable: "eliminating mental habits associated with psychological and emotional suffering and increasing those habits associated with happiness and compassion" (Chambers, Gullone, & Allen, 2009, p265). Thus, if we take the cultivation of compassion as the overarching goal from a therapeutic and intervention stance, a scale that measures barriers to equanimity is especially relevant when also considering psychometrics that measure compassion.

Kabat-Zinn openly confirms mindfulness was inspired by Buddhism, thus it seems logical to return to the Eastern context. The Sanskrit understanding for mindfulness is "the quality of mind that recollects continuously without forgetfulness or distraction whilst maintaining attention on a particular object" (Dreyfus, 2011, p33). This definition reflects the first part of contemporary mindfulness (Bishop, et al. 2004; Kabat-Zinn, 2003), yet clearly does not go into mindfulness being associated with 'non-judgement' and 'acceptance'. Thus, it is clear that these aspects have been incorporated into contemporary definitions of mindfulness yet not accumulated equal attention in research. Zeng, Oei, Ye, and Liu (2015) endorse this by referring to Goenkas Vipassana Meditation (GVM) that establishes firstly an 'awareness' towards bodily sensations and feelings, and then an 'equanimity', which describes an attitude of acceptance towards those sensations or feelings. Thus, the question emanating from this is whether contemporary mindfulness scales simply reflect attention or memory, rather than echo the deeper and more insightful nature of the practice. Thus, revisiting the SOFI scale and four immeasurables, it is hypothesised that the attitude of compassion, acceptance, open and non-judgmental curiosity in mindfulness revolve around the four immeasurable qualities, but fundamentally relies on equanimity as the mediating variable.

This could tackle key questions around ethics, such as how do you live a mindful life without

judgement when the majority of humankind lives by moral or ethical codes of conduct. We naturally judge and because of this may experience challenges and have a harder time accepting certain things over others. The answer to these questions could be that we do not accept all things non-judgementally but we develop equanimity instead. Thus, a certain level of discernment towards phenomenon such as compassion, empathy and loving kindness for example remain present depending on your philosophical paradigm. The differentiation is consolidated by Grossman (2015). The factors that co-arise with mindfulness under all circumstances also help define it and refine how it functions in the mind. Generosity ('alobha', from the Pali) and kindness (adosa) help clarify that mindful attention neither favours nor opposes the object, but rather expresses the quality of equanimity. This is where modern definitions of mindfulness get the sense of not judging the object but of accepting it just as it is.

2.13 Buddhist Emptiness theory

One key theory that emerged in the literature was the Buddhist emptiness theory (Soeng, 1995). This seemingly discusses the interconnection of all phenomena. There are numerous standpoints both in Theravadan and Mahayanan Buddhism that hold emptiness as a key aspect of doctrine. From the Mahayanan perspective there are three key dialogues on emptiness viewed from the lens of 1) interconnectedness, 2) (madhyamaka) the middle way between the extremes and 3), (yogacara) the supposition that all phenomena are dreamlike and arise out of the nature of mind itself (Dorjee, 2013; Wallace, 2010).

Interconnectedness refers to the notion that all phenomena are intricately interconnected and they arise in dependence on each other. A brief example is the text you read is dependent on the fingers typing, which is dependent on the keyboard, which is dependent on the electrician building the key board, which is dependent on the parts, which is dependent on the materials and so on. As a result, the text does not exist in isolation of all other phenomena and is empty of an independent and inherently existing self (Wallace, 2010).

Nagarjuna (2nd century AD) who founded the Madhyamika 'middle way' school asserted that any given object cannot be said to exist: 1) in isolation from its parts, 2) as each part individually, or 3) as the sum of its parts as a collective, the component parts are nonetheless assigned a label that by convention denotes an entirely new phenomenon. This was seen to counter the extremes of inherent existence and nihilism that one easily can fall into and expel the potential for emptiness to be used with non-existence as interchangeable. Although phenomena manifest in dependence on causes and conditions and are thus devoid of an inherent self, this does not negate that phenomena appear and can be perceived by an onlooker. "Form does not differ from emptiness; emptiness does not differ from form" (Soeng, 1995, p.1). Emptiness is therefore not a mystical state of mind or an alternative reality but constitutes the very nature and fabric of reality. The Yogacara further postulate this line of thought by asserting phenomena or waking state is dreamlike and reality is much the same as a dream and entirely in the expanse of the mind (Wallace, 2010).

Perhaps Buddhist emptiness theory highlights the way in which ultimate freedom from cognitive rigidity leads towards a higher understanding and insight into the very nature of reality. However, to scrutinise this is outside the scope of this thesis. However, this theory does enable one to imagine the possibilities of a worldview that does not take reality at face value. As equanimity is predominantly discussed in relation to Buddhism here, this concept highlights the way in which an individual's 'likes', 'dislikes' and 'neutralities' feeling tones derive from the same interconnected web of an individual. Thus, feelings based on self-concept may act as a barrier towards achieving equanimity seen as an individual predominantly strives to be in exact opposite of what 'emptiness' denotes. That of an independent solid existing self and not as an interconnected whole. This theory has not garnered much research and so deconstructing elements of 'self' seems to be a good place to facilitate research.

2.14 Enhancing the therapeutic relationship/ Freedom from cognitive rigidity

So far, this thesis has highlighted equanimity as a key facet of emotional regulation. Equanimity perhaps synthesises person-centred therapy and mindfulness interventions by honing in on the non-

judgemental elements found within unconditional positive regard and non-judgemental acceptance. Perhaps this construct can be particularly relevant in a therapeutic setting in order to then become generalised for a wider population.

Equanimity could be a key aspect of therapeutic intervention due to its relationship with psychological wellbeing. Indeed, major streams of psychotherapy include humanistic therapy, cognitive therapy or behavioural. Sing-Kiat Ting (2012) defines psychotherapy from a broader sense to include the systematically developed healing therapies that do not typically garner scientific support and from a narrower sense; as help given solely by accredited psychologists in order to improve functioning of patients or clients within a well-defined therapeutic relationship. The author highlights culture as a key facet in the development of psychotherapies in a bid to exemplify the value systems pertaining to the Eastern and Western way of psychotherapies. Such movements need to carefully guarded and Pollak, Pedulla and Siegal (2016) provide a guidebook for essential skills of mindfulness-based psychotherapy.

In terms of psychotherapeutic intervention Domash (2010) describes the 'aha' moment in an analysts' therapeutic process; provided the unconscious mind is given the freedom with empathy and sensitivity whilst being free from anxiety. This spontaneously arising moment of a sudden 'aha' experience is understood in the context of a larger narrative towards unconscious communications in treatment (Schore, 2007). The ability to access these 'aha' moments as an embodiment of unconscious freedom can be likened to the role of equanimity in facilitating insight and compassion. Neuroscientifically this experience is a right brain activity and an aspect of mind that allows us to access our unconscious therefore bypassing rational thought.

Neuroscience has illuminated the suspension of judgement, the focus and the relaxation for sudden insight and creative bursts (Limm & Baum, 2008). Preceding the decade long cognitive approach (Ryan, 2007) the significance of emotional insight and the unconscious mind had been addressed by Freud (1912) and indeed a likeness can be seen by Bion (1967) who advocated patients enter each session without memory or desire. Again, this is the requirement of equanimity in the

Buddhist context which is the freedom from attachment and aversion.

From a neuroscientific stance in a review of chronic dysphoria, Farb, Anderson and Segal (2012) highlight the necessity to direct attention toward the transitory nature of momentary experience reduce negative self-evaluation, increase tolerance for negative affect and pain and help to promote self-compassion and empathy in people with chronic dysphoria. The authors argue for a model of mindful emotional regulation to contain distinct processes than reappraisal; namely attention to present moment sensation and 'equanimity, the suspension of judging experience to be intrinsically good or bad', in order to disengage from conceptual judgement in their response to sensory experiences. The crucial aspect of equanimity is to intentionally cultivate awareness toward emotional information. In terms of chronic dysphoria, it may require the long-term practice of equanimity to all experience before highly practiced patterns of dysphoric elaboration cease to characterise patients' obligatory interpretive stances.

Indeed, Hick and Bien (2010) explore the ways psychotherapy clients may profit from mindfulness via the deepening of the therapeutic relationship. From a therapist's perspective a more attentive and present therapist works in parallel with the complimentary nature of techniques used in mindfulness and behavioural psychodynamic perspectives. Kennedy and Black (2010) emphasise the role of self-awareness and relationship with self in a thematic analysis of the personal lives of counsellors. The authors highlight the positive effect counselling training and professional practice has upon the personal life of a counsellor. Clement (2016) goes further by linking mindfulness to the enhancement of Rogerian skills such as unconditional positive regard, congruence and empathy. Fulton (2016) studied 55 trainee counsellors in order to explore the therapeutic relationship between client, patient mindfulness and self-compassion. The author demonstrates how an increase in self-compassion leads to an increase in tolerance for ambiguity and mindfulness leads to an increase in client-perceived empathy and greater session depth. This adds to the growing evidence to support mindfulness in the development of qualities necessary for the therapeutic relationship.

Gans (2011) discusses the unwitting self-disclosures (USDs), unconscious yet observable parts

of personality, are highly valuable clinical information yet often underused in practice. As is such the need for exploring these aspects of personality with empathy and sensitivity the author advocates that the self-aware therapist may minimise the clinical impasse that may result when therapist-patient blind spots overlap.

Delany et al. (2010) propagates the use of embodied ethics in physical therapy by advocating a model of underlying skills, attitudes and actions necessary to bridge the gap between moral agency and ethical dimensions of physical therapist practice. Connectedness and agency are highlighted as critical aspects of therapy in which agency requires strong levels of self-awareness and the ability to be critically reflective. Indeed, when reflexivity, or the ability to remain conscious of outside influences on the practitioner, including ideological and cultural practices, is applied to ethical decision making, reflexivity suggests the ability to cultivate awareness to one's values, emotional reactions and how they may in turn influence a patient's behaviour. This skill is similar to the ethical domain mindfulness and equanimity create in that an individual cultivates reflexivity and the ability to be both connected yet fully aware of agency, social conditioning and the uniqueness of the therapeutic relationship. This supports the hypothesis that equanimity facilitates emotional regulation that leads to prosocial changes such as the cultivation of compassion.

The 'objectivity' we may believe our minds to hold is questioned by Robinson et al. (2017) who studied decision making. The authors suggest mindfulness enables to us to question or at least delay premature judgement. In fact, mindfulness may help individuals make more effective or 'rational' decisions (Hafenbrack, et al 2013). Without understandings one's subjective experience Robinson et al. (2017) demonstrated how we lack this objectivity and require mindfulness to develop reflexivity. The authors described how this characteristic of mindfulness supports equanimity. It provides an individual with the facility to be conscious of both the "content and context of information" (Sinclair & Ashkanasy 2005, p. 290) so that it becomes possible to use information outside of pre-established categories. The challenge is to recognise "as information is processed, not all of it will be interpreted equally since our prior experiences, habits and biases may colour what information we notice and how we absorb it"

(ibid. p. 291).

In Zen and the art of storytelling, Bai and Cohen (2014) show how the reacting mind has limited time to act with wisdom and compassion due to the loss of awareness. Through presence there is hope for equanimity to take centre stage. Therefore, mindfulness primes our access to intuition and is useful as it provides a mechanism for non-judgement observation and non-discriminatory acceptance of conflicting views. The complex psycho-physiological loop between cognition, emotion, and sensations can be brought to awareness with practice of mindfulness and equanimity. Pagis (2015) too, discusses the process of evoking equanimity and the social attunement that facilitates equanimity in meditation centres. Pagis asserts that eventually equanimity takes over itself and leads to self-transformation. The above confirms the hypothesis that equanimity can be a new hallmark in therapeutic intervention and a core skill of person-centred counsellors.

From a neuroscientific perspective the deeply emotionally engaged yet viewed from a place of objectivity is certainly paradoxically related to equanimity, thus highlighting the ability to regulate emotional affect. Rather than being identified with likes, dislikes and neutralities and overly emotionally involved with this narrative, an individual detaches from a conditioned sense of self, thus, facilitating the 'aha' moment. Therefore, in this context, equanimity could be said to connect conscious experience to the unconscious mind. Perhaps the wisdom culminated from both the left and right hemispheres of the brain unify to enable an alternative deeper perspective (Domash, 2010). Domash (2010) suggests individuals must be emotionally engaged yet separate at the same time which involves a fine tuning of the right hemispheric functions. Thus, the suspension of judgement could be synonymous with equanimity and focus with mindfulness, suggesting Western psychodynamic therapy has close links to an Eastern context. Therefore, it could be argued that meditation on equanimity and mindfulness equates an individual with partially acting like their own therapist.

It could be said that the ability to cultivate equanimity is being fully congruent with oneself which is one of the infamous person-centred hallmarks. That is, authentic self leads without facade.

Instead of the classic therapist/client relationship you instead formulate congruence with yourself. Here the concept encapsulates ideas of acceptance and non-judgement. Furthermore, this ability would counter any cognitive dissonance when opposing beliefs contradict one another. It is here unconditional positive regard shares similarities with the notion of equanimity facilitating a more compassionate lens. In this way when one deploys unconditional positive regard a person is valued regardless of whether they may approve of a person's actions. Cognitive fusion is certainly not on the agenda. In this way the constructs are closely correlated to the notion of acceptance. Like a person-centred counsellor an attitude of optimism and a positive view of human nature is encapsulated via the construct of equanimity.

Major streams of psychotherapy include humanistic, cognitive or behavioural therapy. Sing-Kiat Ting (2012) defines psychotherapy from a broader sense to include the systematically developed healing therapies that do not typically garner scientific support and from a narrower sense; as help given solely by accredited psychologists in order to improve functioning of patients or clients within a well-defined therapeutic relationship. The author highlights culture as a key facet in the development of psychotherapies in a bid to exemplify the value systems pertaining to Eastern and Western way of psychotherapy. Such movements need to carefully guarded and Pollak, Pedulla and Siegal (2016) provide a guidebook for essential skills of mindfulness-based psychotherapy.

The ability to access these 'aha' moments as an embodiment of unconscious freedom can be likened to the role of equanimity in facilitating insight and compassion. Neuroscientifically this experience is a right brain activity and an aspect of mind that allows us to access our unconscious therefore bypassing rational thought. Braboszcz et al. (2017) demonstrate how meditation techniques are correlated to increased gamma frequency brainwaves in three meditation traditions (Vipassna, Himalayan Yoga and Isha Shoonya). Baldini et al. (2014) discuss the significance of mindfulness and presence in clinical practice and highlights the clinician as the 'neuro-architect'.

Again, from a neuroscientific perspective the paradox of being deeply emotionally engaged yet

viewed from a place of objectivity is strongly related to equanimity, thus highlighting the ability to regulate emotional affect. Rather than being identified with likes, dislikes and neutralities and overly emotionally involved with this narrative, an individual detaches from a conditioned sense of self, thus, facilitating the 'aha' moment. Therefore, in this context, equanimity could be said to connect conscious experience to the unconscious mind. Perhaps the wisdom culminated from both the left and right hemispheres of the brain unify to enable an alternative deeper perspective (Domash, 2010). Domash (2010) suggests the psychoanalyst must be emotionally engaged yet separate at the same time which involves a fine tuning of the right hemispheric functions. Thus, the suspension of judgement could be synonymous with equanimity and focus with mindfulness, suggesting Western psychodynamic therapy has close links to an Eastern context. Therefore, it could be argued that meditation on equanimity and mindfulness equates an individual to partially becoming their own therapist. Further research is needed isolating equanimity as a distinct construct. A pertinent place to start may be around barriers to achieving equanimity given the breadth of individual differences.

In sum, mindfulness has reported a diverse range of health benefits. A link between mindfulness and compassion is reported in the literature. Compassion and self-compassion training have also resulted in positive changes. However, the significance of emotional regulation seems to be emerging. Emotional regulation is significant seen as this seemingly connects mindfulness to compassion. Studies identified also indicate alternative therapies result in positive changes. The literature then expands on the concept of 'spiritual pluralism' to identify connection as a key under arching narrative. Equanimity facilitates connection by focusing attention on the ways in which we discriminate. This raises the perception that equanimity can be a positive hallmark in therapeutic intervention and as a quality of 21st century leadership. It seems, therefore that equanimity, or 'freedom from cognitive rigidity' may explain the connection between mindfulness and compassion.

In terms of suspending personal narrative and viewing things as transient moments in time

rather than from a place bound up via rigid judgements of right/wrong/good or bad. With altruistic intention and self-compassion, you become your own inner therapist. By escaping your conditioned narrative and becoming fully present you are effectively becoming truly congruent. This could be likened to Maslow's self-actualisation theory in that a person has reached their higher sense of self. A practice such as mindfulness from the therapist perspective could complement self-awareness. Indeed, from the client's perspective, equanimity may ameliorate navigating challenging internal terrain. This practice could help mitigate the impasse when sensitivity in therapy meets the need for progression. Furthermore, equanimity goes beyond the therapeutic relationship as a skill endorsed by leadership and as a possible underlying mechanism for health and wellbeing.

The results on mindfulness confirm the ways in which mindfulness elicits a diverse range of health and wellbeing benefits. This does raise the question that because of such diversity, what is it specifically that acts as the underlying mechanisms for such change. A link between mindfulness and compassion is reported in the literature. Compassion and self-compassion training have also resulted in positive changes. The above records on self-compassion and compassion suggest mindfulness leads to greater self-compassion and compassion and highlights the need for greater understanding of emotional regulation as part of this process. Seemingly, those who find emotional regulation difficult have a higher likelihood of a lack of self-compassion and compassionate responses to others.

However, the significance of emotional regulation seems to be emerging. Emotional regulation is significantly seen as this seemingly connects mindfulness to compassion. The records on emotional regulation suggest that there is a link between mindfulness and compassion and that this is dependent on adaptive emotional regulation. This highlights that potentiality of emotional regulation playing a crucial role in eliciting prosocial change within an individual, with depression one potential negative outcome due to poor emotional regulation. Thus, barriers to equanimity such as intense judgements become problematic.

The results also indicate the extent of research into positive dimensions of mindfulness, and related therapies, which is exemplified by an increasing diversity of alternative interventions that proclaim to draw on similar or underlying meditative techniques. This further raises the question of the underlying mechanisms that connects the above interventions with that of the well-researched mindfulness and compassion related interventions. A logical place of enquiry in the first instance, therefore, may lie in the barriers an individual faces towards equanimity.

Furthermore, this chapter highlights the necessity of researchers producing validated quantitative tools that seek to measure this construct and aid future researchers' understanding of critical considerations when establishing self-report questionnaires. Moreover, interventions specifically aimed at cultivating equanimity should be promoted via EEG in order to accurately assess this multi-dimensional construct. Clear distinctions made between the 'attentional' faculties of mindfulness and the realm of 'non-judgmental/acceptance' or 'equanimity' would build on Lindsay, Young, Smyth, Brown, and Creswell's (2017) pioneering mindfulness dismantling study. The study exemplified participants whom had both attention monitoring and acceptance mindfulness training experienced a greater reduction in mind wandering relative to other conditions including attention itself. This, for the first time highlights acceptance as a critical driver in the reduction of mind wandering, which is significant, given the challenge to describe and measure the effects of meditation and to explain their relevance for health and well-being.

2.15 Conclusion

The results are interesting in relation to the operational defintions of both inner and outer equanimity. In terms of inner equanimity, 'Mindfulness', 'compassion' and 'emotional regulation' relate to the concept of inner equanimity. In terms of emotional regulation, this too relates to inner equanimity given equanimities emphasis on a decentred approach to self. In relation to compassion this

gives consideration of inner equanimities relationship with compassion for self and others, so combines both inner and outer equanimity.

In terms of external equanimity. The concept of 'connection' provides a suitable benchmark in relation to outer equanimity. This is possibly due to the assumption that in order to extend compassion towards others, there is a need to focus on strength of human connection. Further, outer equanimity focuses on relationships toward others so current psychological research that relates to social conditioning and the interpersonal layer of current psychology relates to external equanimity. 'Alternative therapies' offer different religious and spiritual consideration ('spiritual pluralism') giving attention to both inner and outer equanimity. As both inner and external equanimity pays attention to a sense of self and highlights perceived feeling tones, world view particularly relates to external equanimity.

This author argues that the ability to cultivate equanimity is being fully congruent with oneself, which is one of the infamous person-centred hallmarks. That is, authentic self leads without facade. Instead of the classic therapist/client relationship, you instead formulate congruence with yourself. Here the concept encapsulates ideas of acceptance and non-judgement. Furthermore, this ability would counter any cognitive dissonance when opposing beliefs contradict one another. It is here unconditional positive regard shares similarities with the notion of equanimity facilitating a more compassionate lens. You cannot tell someone to be equanimous when they are suffering extreme emotion at that time. Rather, equanimity is like dropping into awareness of one's own discriminatory faculties with self-compassion and insight. Through this quality or way of life this quality is naturally built up over time so become more of a preventative tool for emotional violation. In this way when one deploys unconditional positive regard, a person is valued regardless of whether they may approve of a person's actions through the lens of equanimity. This would enable counsellors to train in equanimity in order to strengthen their notion of unconditional positive regard. Therefore, the construct is closely correlated

to the notion of acceptance. Like a person-centred counsellor an attitude of optimism and a positive view of human nature is encapsulated via the construct of equanimity.

Based upon this narrative review the following core research questions have arisen. Firstly, how established is equanimity being recognised as a key facet within MBIs and secondly, how effective is equanimity as a construct in psychiatric health. As mindfulness/equanimity is part of a therapeutic approach to health and wellbeing, a narrower examination of the questions in relation to psychiatric health is essential. In order to examine whether the assumptions made in this review have any validity and to address the core questions a systematic literature review is demonstrated in Chapter 3.

Chapter 3 A Systematic Literature Review

3. Introduction to Chapter 3

This chapter seeks to refine the scoping literature review further by asking specific research questions in relation to mindfulness and equanimity. This review examines the prevalence of equanimity in MBIs. This chapter seeks to answer the main question of how prevalently equanimity is being considered in current MBIs and in doing so answers the question of to what extent or quality is equanimity specifically being considered and or measured. The chapter does so by conceptually highlighting the significance of equanimity in MBIs and reviews systematic reviews that have been performed already, in order to holistically capture any mention of equanimity. The chapter then highlights the method and eligibility criteria, design and quality assessment then the results and a discussion. Finally, the chapter discusses the future direction of the thesis and implications for practice before concluding.

3.1 Introduction to systematic review

It has been suggested that contemporary research has paid little attention to the theoretically overlapping construct of equanimity (Astin & Keen, 2006; Desbordes, et al 2015; Kraus & Sears, 2008; Weber, 2017; Weber & Lowe, 2018). Whilst there are items that investigate 'non-judgement' and 'acceptance' in the majority of the contemporary mindfulness scales there is no explicit measurement of 'equanimity'. As equanimity is largely ignored in mindfulness literature and replaced with the terms 'non-judgement' and 'acceptance', it is necessary to revisit this concept in order to assess how relevant a construct equanimity may

prove to be in Western psychology.

As mentioned in Chapters 1 and 2, mindfulness is commonly accepted as "paying attention to the present moment without judgement" (Kabat-Zinn, 2003, p29), whereas equanimity hones in on the discrimination faculties in relation to judgement: "the suspension of judging experience to be intrinsically good or bad" (Farb, et al 2012, p71). Thus, positing a deeper insight into the nature of judgement itself. In Western psychology, there is no equivalent term for the Buddhist notion of equanimity (Brahmana, 2016; Weber, 2017; Weber and Lowe, 2018). The closely related term 'non-attachment' is often linked to psychopathology, indifference and a lack of interest in the well-being of others (Fowles & Dindo, 2009) or even implies emotional suppression (Dunn, et al 2009). Thus, perhaps explaining why there may be a lack of interest in the term. Conversely, in the Indriya-bhavana Sutta, (MN 152), the Buddha describes the equanimous state as follows:

"When seeing a form with the eye... When hearing a sound with the ear... When smelling an aroma with the nose... When tasting a flavor with the tongue... When touching a tactile sensation with the body... When cognizing an idea with the intellect, there arises in him what is agreeable, what is disagreeable, what is agreeable and disagreeable...If he wants—in the presence of what is loathsome and what is not—cutting himself off from both, he remains in equanimity, alert, and mindful (Bodhi, 1995, p143)."

The significance of nurturing a state of equanimity is established, in light of the connection with acceptance (Hadash et al.2016). Further, given mindfulness's popularity and degree of potential health benefits, it is important to establish what role, if any, equanimity plays in providing such change. Given the methodology used in previous mindfulness research

has not yet permitted the explicit measurement of equanimity per se, the author encourages a more comprehensive engagement with this construct.

Several systematic reviews and meta-analysis have been published appraising the effects of MBIs on psychiatric and somatic health (Chiesa & Serretti, 2011; Khoury et al 2013; Goyal et al 2014). To the author's best knowledge, no study has previously been published that investigates specifically the concept of equanimity. To address the limitations in the literature, a comprehensive systematic review of equanimity in mental health interventions ensued with the following objectives: (1) establish whether equanimity is being recognised as a key facet within MBIs, (2) evaluate the effectiveness of equanimity as a construct in psychiatric health.

3.2 Method

Mindfulness is one of the most researched subjects in recent years. Thus, in order to create a more meaningful systematic literature review, it was felt that equanimity must be coupled with 'mental health interventions.' These parameters were identified and verified as being pertinent in the previous chapter and for a more methodological approach to the constructs in question. These search terms were identified and used in combination, in order to ascertain in a more refined manor whether equanimity does indeed have a valuable place within existing science. Both inner and outer equanimity relates to both world view and compassion and so the search terms reflect both considerations of inner and outer equanimity.

Studies included in this review were selected to investigate the prevalence of equanimity in mental health interventions. Given the lack of literature in the field, ProQuest central and SCOPUS were used to extrapolate the items. The study is reported following the preferred reporting items for systematic reviews and meta analyses (PRISMA) guidelines (Moher et al. 2009). The PRISMA process included identifying the research question, "how prevalent

is equanimity in mental health intrventions". Following this, the research strategy involved identifying the relevant search terms and databases. The search strategy then involved allocating a time frame, eligibility criteria, search terms and the application of filters. Additionally, the literature was reviewed using inclusion and exclusion criteria, checked for duplicates and critical analysis utilising a chosen quality assessment tool. Papers were reviewed and graded by two independent reviewers. There was a quality meeting to agree grading using a marking table and to ensure the quality of a specific pool of the literature. Lastly, the main literature was analysed using a table to sort and abstract selected points and then this literature was written up and represented as a conceptual framework.

Search Method

An initial scoping literature review was conducted in Chapter 2 to identify records examining equanimity and mental health. This initial review facilitated a further systematic review of the use of equanimity in mental health interventions. Literature searches were performed in the electronic databases of ProQuest central and SCOPUS using the following search terms: "Equanimity AND (mental health interventions)".

Eligibility Criteria

Studies were required to include equanimity within the last eight years [2010-2018] because it was considered a lengthy enough timeline to capture current developments in mindfulness, given the initial explosion of studies since its inception. Studies were restricted to ProQuest Central and SCOPUS. Studies were required to have equanimity or an association to the construct as the central theme clearly stated within the text, and any records examining alternative themes were excluded. Only studies that were published in peer reviewed journals were included and abstracts and conference abstracts were excluded due to the fact only expert reviewed literature was considered scientifically relevant. Exclusion criteria further included non-relevant items such as conference abstracts, duplicates, editorials or dissertations. Moreover, commentary or opinion papers were discarded. Inclusion criteria for the study were English language, full text, peer reviewed and scholarly articles, books and book

chapters from the period 2010-2018. There were no restrictions on papers given the hypothesis equanimity has not yet been scientifically established, so the search included both quantitative and qualitative empirical work and included systematic literature reviews. RCTs, non-RCTs and prospective and retrospective cohort studies were also eligible.

Study Design

In line with the search terms records with equanimity as a central construct were all included in the review. Outcomes related to adverse effects or complications relation to interventions were also included. The search was therefore, expected to record a variation of methodological quality. This was to ensure the heterogeneity of the subject under investigation and provide preliminary evidence to the credibility of equanimity in mental health intervention. Records that were assessed for low quality, lack of critical evidence or clarity of reporting were subsequently excluded. In total, 275 records were identified in ProQuest and an initial screening for duplicates took place. Four records were subsequently excluded. The remaining 271 records were screened in accordance with the eligibility criteria and a final eight records were reviewed. In SCOPUS, a total of 155 items were reviewed. Following a crossmapping exercise with SCOPUS, the majority of the items were duplicates identified in ProQuest, however one additional item was identified for further review. Items were screened and assessed for eligibility (see PRISMA flow diagram).

Quality assessment

Two reviewers from the University of Bolton independently rated and assessed the quality of the final eight papers using the Standard Quality Assessment Criteria for Primary Research Papers (Kmet, et al 2004). It was expected that because equanimity is relatively niche, the results would be mixed. Thus, this quality assessment tool was suitable given its open methodology to both qualitative and quantitative literature. Each paper was scored following the set criteria for quantitative and qualitative data collection methods. A meeting was held to discuss the reviewers' final decisions and papers included were all rated between 55% - 85%. After

discussions, papers included fell above the agreed 55% 'liberal' cut off point (Kmet, et al 2004). Due to the expected novelty of the use of equanimity, it was discussed the liberal cut off point was sufficient. These transcripts are kept confidential and in a locked office at the university.

Figure 1: PRISMA Flow diagram

3.3 Results

Nickerson and Hinton (2011) conducted a qualitative enquiry into the nature of anger regulation in traumatised Cambodian monks. The study found that all monks referred to equanimity as being a central construct in the facilitation of anger. Intriguingly, equanimity is referred to as (1) a state of observation and detachment from one's emotion and mental content and (2) a form of meditation. Three out of six of the monks discussed breath meditation (mindfulness) as being distinct to equanimity meditation. Equanimity (upekkha) was described as 'staying in the middle', or as being distant to the emotional state he/she experiences. Thus, meditation was seen as promoting the following characteristics: reducing arousal, learning to control the mind, focusing on the present moment (which assists in reducing arousal and controlling the mind) and staying on the 'middle path' by balancing extremes of emotion and distancing from emotional states. Equanimity therefore represents the ideal state of mind that is achieved with the assistance of any type of meditation and a specific meditation practice itself. Mindfulness therefore assists in maintaining the mental state of equanimity. Equanimity is a Brahmavihara meditation, however some classify this as a form of mindfulness, whereas some do not (Analayo, 2003; Bodhi, 2000). Significantly, all the monks agreed that the only meditation to be practiced whilst still being angry was equanimity meditation. MBCT and MBSR do emphasise the importance of distancing oneself from thoughts and indeed 'de-centering' was described in early writings on cognitive therapy (Beck et al 1979). However, how much emphasis on this is dependent on the skill of the teacher and the explicit nature of how this concept is communicated.

Reddy et al (2012) show how compassion based cognitive therapy [CBCT] utilises equanimity for at risk adolescents who have experienced past trauma. CBCT promotes equanimity as 'learning to care for strangers' as well as friends which is a fundamental concept of the programme. The authors advocate for the need to clarify the difference between a lack of affection or ability to connect with others and what is meant by equanimity. In order to do this, CBCT increases mindfulness to one's

emotions and cognitions prior to introducing the term equanimity. They distinguish between discussing non-judgement, self-care and self-respect early on in the programme before introducing the concept of equanimity. The study found that the programme leads to better emotional regulation and responding more compassionately towards others. A major limitation of the study was the lack of self-report measures in capturing change in psychosocial functioning. Further, the SOFI is the only published measure assessing emotions that are specifically targeted by compassion meditation. This suggests more scales are needed to explore this construct.

This review targeted equanimity but also had to consider research that incorporated overlapping terminology that shares similar characteristics. Hadash et al. (2016) only explicitly mention the term equanimity once as a mechanism by which mindfulness reduces maladaptation and enhances mental health. However, the study was included in the review because the term 'de-centering' was used as part of their 'experiential selfless processing' behavioural measure. The study theorised that mindfulness contributes to mental health by processing present moment experience without subjective selfreferentiality. Self-focused thinking and subjectivity lends itself to the concept of equanimity. As the subjective label of 'like', 'dislike' or 'neutrality' is projected by the individual a subjective experience is solidified. However, the authors argue a person can have a sense of ownership towards an experience without identifying with it and use the example of someone experiencing pain as separate from his own self, but still feel that it is his own pain. The identification with internal experience (thoughts, emotions and sensations) form an integral part of the self (Bernstein, et al 2015). However, the authors postulate subjective experiences can be processed without self-reference and refer to this as 'experiential selfless processing'. This is similar to the concept of internalised equanimity relating to the sense of feeling tones. This study established this hypothesis using fear and found that negative self-referentiality was associated with several key psycho-behavioural processes underlying adaptation (anxiety, intolerance of distress).

Shoham et al. (2017) further hone in on the concept of 'decentering' to find that mindfulness mediated the effect of emotional arousal in meditative states. The authors studied mindfulness as a

developmental process in time. Similarly, the authors discuss 'de-centering' as a facet of mindfulness that promotes healthy states. 'De-centering' as described by Bernstein et al (2015) can be loosely characterised as sharing many similarities of equanimity such as (1) awareness of subjectivity, (2) disidentification with internal experience and (3) reduced activity to thought content. The authors concluded mindfulness should be studies as a contextualised development process over time in order to establish the underlying mechanisms such as 'de-centering'. Similarly, Shepard et al. (2016) conducted a study looking at the development of a self-distancing task. The authors referred to equanimity and 'decentering' as the same construct. The authors developed a behavioural task that required mental emotional manipulation of negative and neutral material away from the self to assess the skills likely to underlie healthy emotional processing. The authors found individuals found it harder to manipulate emotional reaction towards negative objects in high threat relative to low threat. Those who practice mindfulness have a greater ability to de-center and emotionally manipulate material away from the self. However, it should be noted that equanimity implies direct insight into ones' own subjectivity and nature of phenomenon arising (positive/negative/neutral) before distancing from those same feeling tones. Moreover, in the Mahayana tradition a sense of equanimity is projected externally onto friends, enemies and strangers (Wallace, 2010).

Mindfulness research capturing the development of positive mental states is limited. Rodriguez-Carvajal et al. (2016) recognise that although there have been numerous studies on the effectiveness of mindfulness-based interventions [MBIs], few explore the mechanisms underlying this effect. The authors studied the mindfulness integrated model [MIM] to establish an increase in trait mindfulness, which in turn increases positive mental states towards oneself and others. The MIM teaches mindfulness, self-compassion and positive mental states sequentially. The authors note the *brahamivaras* as positive mental states and also state the SOFI scale as the only current measure of loving-kindness (metta), compassion (karuna), empathic joy (mudita), and equanimity (upekkha). The authors refer to equanimity as an open and tolerant attitude of unconditional acceptance without impulsive reaction to inner or outer experience. However, the authors too acknowledge that despite the

relevance of equanimity within a broad conception of mindfulness little attention is paid to it. The study found that self-compassion serves as a prerequisite for the *brahamivaras* (*Theravada*) or *four immeasurables* (*Mahayana*) positive mental states. This study highlights how the MIM leads to self-compassion which leads to the cultivation of positive mind states as mentioned.

The interconnected relationship between self-compassion and equanimity is highlighted within Bluth et al.'s (2017) study on self-compassion in a large adolescent sample. The authors found that older females had the lowest self-compassion levels compared to younger females and all male ages. Further, self-compassion had a greater protective aspect on boys than girls and that older adolescents with low self-compassion had greater levels of depression symptoms. The authors posit self-compassion comprises three interconnected dimensions, one of which is centred on developing equanimity and present centred awareness. Thus, again not an explicit intervention of equanimity it suggests a sense of equanimity may be cultivated as a by-product of self-compassion.

This connection is strengthened by Trompetter et al. (2017), whom note that training in self-compassion can promote positive mental states such as equanimity. The authors too highlight the significance of self-compassion and positive mental states. This study found that individuals with high levels of positive mental health possess self-compassion skills that promote greater resilience against psychopathology. The authors posit that this might function as an adaptive emotional regulation strategy and protect against the activation of schema related to psychopathology following negative affective experiences.

Finally, and most promisingly Shoham, Hadash and Bernstein (2018) examined the nature of the decoupling model of equanimity in a 6-week mindfulness intervention. This was the only article to place the construct of equanimity under scrutiny within the mindfulness intervention itself. This study presents one of the first pieces of empirical evidence to suggest mindfulness may decouple desire (wanting and not wanting) from the hedonic tone of experience (pleasant or unpleasant). Thus, providing evidence to suggest equanimity acts as one of the subserving processes within mindfulness

practice. The authors suggest there is a limited amount of empirical investigation into equanimity due to a lack of measurement tools, and limited reliance on methods not suitable to the contextualised development of equanimity over the course of mindfulness training for example. An overview of the studies can be seen in Table 1: Equanimity study characteristics.

Table 1

Equanimity study characteristics

	Author	Method	Sample	Study population	Main Findings	Limitations
1	Nickerson & Devon (2011)	Semi-Structured Interviews	6	Cambodian Buddhist monks	Equanimity training and meditation central to coping with PTSD	Non-clinical sample
2	Reddy et al (2013)	RCT - CBCT	70	Adolescents in foster care	CBCT useful for emotional regulation and feelings of compassion for others. CBCT enhances equanimity	Shortcoming of self- report measures. Only SOFI valid and reliable measure to capture emotions targeted by compassion meditation
3	Hadash et al (2016)	RCT – validation of measures of ESRP/ESLP & Single Experience & Self Implicit Association Test SES-IAT	138	Adults from general community	Cognitive substrate of sense of self is important determinant of mental health. De- centering plays central role in this process	Limited capacity to elicit dis-identification in meditator novices
4	Shepard et al (2016)	Behavioural task	118	2 non- meditating university samples	Validated 'behavioural task' - De-centering or "equanimity" is significant for positive mental health	Restricted to university sample. Use of self- report to measure manipulation
5	Rodríguez- Carvajal et al. (2016)	Quasi- experimental – RCT - MIM	87	2 experimental groups/ 2 controls – meditators V non-meditators between 18-65 years	Self-compassion leads to greater positive mental states such as equanimity. MIM positive for eliciting self-compassion and compassion for others	Self-report measures only. Only SOFI valid and reliable measure. Participants not randomised
6	Shoham et al (2017)	1-month mindfulness training – de- centering	82	Meditation naïve from general community	De-centering reduces emotional arousal in non-meditators	Future studies should focus on equanimity
7	Bluth et al (2017)	Cross-sectional survey	765	Adolescents	Self-compassion protects emotional wellbeing – self- compassion associated with equanimity	Differential findings in relation to males/females
8	Trompetter et al (2017)	Mixed methods Satisfaction measures and in- depth interviews	349	General population – 16-67 years	Positive mental health buffers against psychopathology. Self- compassion is significant and training in this enhances equanimity	Cross-sectional nature. Convenience sample

9 Shoham, Hadash and Bernstein (2018) Mindfulness skills 82 training Intervention

Mediations naïve from general community Practice of mindfulness elevates equanimity robust for subjective stress. Mindfulness may decouple desire from hedonic tone of experience

Findings may be limited to this specific mindfulness intervention. Iraining limited to intervention 6-week

**CBCT - Cognitive Based Compassion Training

ERSP - Experiential Self-Referential Processing / ESLP - Experiential Selfless Processing

SES-IAT - Single Experience & Self Implicit Association Test

MIM - Integrated Model of Mindfulness

3.4 Discussion

This review provides a synopsis of the current research exploring the construct of equanimity within mental health interventions. The inclusion criteria identified nine papers, a small amount considering the global response to mindfulness-based interventions. However, this supports the original hypothesis that equanimity has not yet been scientifically explored, and that all relevant research was included. A wider examination of the construct within mindfulness-based interventions is needed. More specific empirical evidence is needed to deconstruct the value of cultivating equanimity. Further, self-report measures concerning the construct are missing given that all nine papers that reported equanimity as a central theme of the paper, only one scale was used to empirically test it. That is the SOFI scale (Kraus & Sears, 2009).

Equanimity/de-centering/self-distancing

Whereas all nine articles mentioned included the term equanimity at least twice, only two papers (Shoham, Berdash and Bernstein, 2018; Nickerson & Hinton, 2019) discussed equanimity in depth and included it as a central construct. Although, not what strictly speaking is a Western based

MBI, Nickerson and Hinton (2011) highlight how equanimity is a central construct in anger facilitation and discussed how equanimity aids this process of emotional regulation via the distancing from self despite awareness of the event occurring. This suggests that by recognising how subjective experience leads to emotion that a healthy distance between oneself and emotion means a person is able to 'stay in the middle' and become more compassionate towards self and others. Importantly, the study demonstrates why equanimity should be taught as a distinct meditation to mindfulness. Shoam, Hadash and Bernstein (2018) confirm the significance of equanimity with their study examining the decoupling model of equanimity. This study provides evidence to suggest equanimity serves as a fundamental subserving construct in mindfulness practice. However, this raises numerous questions. Firstly, what forms of mindfulness-based interventions are most effective in cultivating equanimity? This relies on the skill of the trainer and depth of the training. Secondly, how can we operationally define equanimity? The fact that equanimity remains rather implicit and is referenced in mindfulness studies via constructs merely related to equanimity (experiential avoidance, thought suppression, distress tolerance) suggests rigorous investigation into equanimity is in its infancy.

The following three articles further exemplify the above lack of conviction into this construct. Three studies favoured the term 'de-centering' or 'self-distancing' which can be loosely taken as having similar connotations as equanimity. Shepard et al. (2016) summarise how self-distancing leads to greater ability for emotional manipulation. These authors used 'de-centering' as synonymous with equanimity, highlighting the greater need for operational definitions of equanimity. Hadah et al. (2016) too, shows how distancing from self-concept helps to lessen against maladaptive mental states. The authors show how a healthier relationship to self-concept is necessary in order to emotionally navigate a healthy mind. Again, Shohan et al. (2017) portray how mindfulness should be measured contextually over time and that 'decentering' and awareness of subjectivity provide greater mental health. However, these articles fail to synchronise equanimity due to the lack of operational definition or specificity into the construct.

Significance of self-compassion/compassion

Interestingly, two of the articles discussed the significance of compassion as the cultivation of a positive mental state. Reddy et al. (2013) promote CBCT as fostering equanimity and emotional regulation, which leads to greater compassion towards others. This highlights how equanimity is connected with compassion and should therefore be measured as a separate construct (Desbordes et al, 2015).

A further three articles examined the significant of self-compassion in providing fertile ground for equanimity to be nurtured. Bluth et al. (2017) show the interconnectedness of self-compassion and equanimity, whereas Trombetter et al. (2017) show how training in self-compassion leads to greater positive mental states. Furthermore, Rodriguez-Carvajal et al. (2016) show how trait mindfulness leads to greater self-compassion which then leads to greater equanimity. This could explain how and why mindfulness interventions lead to change (Chiesa et al., 2014). This connection to self-compassion and compassion is significant, as in Buddhist psychology equanimity is a fundamental element of the four immeasurable qualities including loving kindness, compassion and emmpathetic joy (Wallace, 2010).

3.5 Implications and future direction

Very little consideration has been given to how equanimity can be nurtured, measured or operationally defined within mindfulness-based interventions. Although, some MBIs refer to this construct, there is considerable lack of reliability and generalisability in the literature. Even within this review, the term equanimity was not widely used, and definitions were not synonymous. The small number of studies indicate that there may be a belief that equanimity cannot be taught separately from mindfulness or raises the question whether equanimity as an underlying mechanism for adaptive change has yet to be explored. It could be said that equanimity is subsumed within MBSR and MBCT, however

given the magnitude of research, it seems apt to study equanimity in isolation. Equanimity could be taught via separate meditation practice and the value of the construct may enable greater awareness into the nature of mindfulness. This approach would give a visual identity to equanimity and establish whether equanimity is the key facet underlying affective change in health and wellbeing. Incorporating new scales into mindfulness-based interventions would enable a deeper insight into the effectiveness of the plethora of MBIs.

The results apply to the operational definition of inner equanimity (see chapter 1) in numerous ways. Firstly, in relation to the only qualitative article (Nickerson and Hinton, 2011), the authors support the application of inner equanimity and that it should be considered separately to mindfulness. The monks clearly show how inner equanimity relates to their own facilitation of anger and see the manifestation of inner equanimity as the only way to antidote anger. However, one can only assume in dispelling anger, this naturally has a positive effect externally, in the way the monks relate to outer experience. Thus, this also fits with the operational definition of external equanimity (identified in chapter 1). In relation to Shoham, et al (2017), the authors relate 'decentering' to internal experience that promotes healthy states and mediates emotional arousal. This again, clearly relates to the concept of inner equanimity. Further, Hadash, et al (2016) offer a useful conceptual decoupling model that relates only to inner equanimity given the decoupling from desire and hedonic tone.

Indeed, the concept of inner equanimity further aligns with Rodriguez-carvajal (2016) who also consider self-compassion as a key facet in the development of positive mental states. The authors define equanimity which closely aligns to inner equanimity as described in this thesis, however, do not offer any external element. Yet clearly, situate self-compassion as part of the process towards positive mental states. Further, Bluth et al (2017) reinforce this connection with self-compassion as one of the interconnected dimensions of equanimity. Again, this is similar to the concept of inner equanimity in

this thesis. Finally, Trompetter, et al (2017) also state how self-compassion can promote equanimity which again aligns to the concept of inner equanimity.

This suggests self-compassion is a key facet of inner equanimity and that equanimity clearly relates to emotional arousal that in turn affects outer experience and behaviour. This may mean that in order to develop equanimity, self-compassion could be considered separately in the first instance after an initial role for mindfulness attention and awareness. Perhaps the cultivation of inner equanimity is dependent on this three-tiered approach to training. After this, external equanimity could be taught as a distinct facet of equanimity in order to reduce conflict, enhance social cohesion and facilitate positive mental states in relation to others.

3.6 Limitations

Of all the papers identified only 9 were considered as being suitable for the research questions. This lack of available research confirms the lack of interest and perhaps confusion about this concept. One of the limitations of the study was that several opinion and theoretical papers did discuss equanimity in greater depth; however, the rigorous review criteria meant they could not be included in this review. However, this supports the notion that there is a need for further research into equanimity.

3.7 Conclusion

This review provides preliminary evidence to suggest equanimity has been overlooked in mindfulness research and training. Equanimity could be the conduit for much of the effectiveness of MBIs in relation to mental health and further to the cultivation of positive mental states. However, in order to develop this theory a further examination into the construct of equanimity is needed. An exploration into how and why individual's judge is needed and to be explored in chapter 4. A combination of theories into how humans judge phenomenon creates a 'model of judgement' that can then be viewed in relation to barriers to equanimity given equanimities emphasis on non-judgement and one's own discrimination faculties.

*The following chapter comprises a published paper

Weber, J (2017) Mindfulness is not enough: Why equanimity holds the key to compassion, *Mindfulness* & *Compassion*, 2 (2). pp. 149-158

Chapter 4 Development of a Model of Judgement

4. Introduction to chapter 4

This chapter connects the above literature review with a more refined focus on how we formulate judgements in order to theorise barriers to equanimity. The research questions thus far, have highlighted that 1) equanimity is currently not recognised as a central construct in MBIs and 2) the quality of equanimity is not consistently captured and or focused on. The latter suggests there is no formally recognised definition of equanimity and equanimity is lacking specific psychometric measurement. The systematic literature review found only the SOFI scale to be utilised twice within the final eight papers, and that only one of the overall four constructs specifically targeted in the SOFI related to equanimity. Thus, the review suggests a clearer conceptualisation of equanimity is needed both in definition and model.

Therefore, this chapter seeks to develop a logical theory of judgement in order to conceptualise barriers to equanimity. As equanimity is currently being overlooked, it is important to hone in on non-judgment in order to demonstrate a more robust method of identifying individual judgmental experience. It is theorised that the most rational step in this process is to examine how individuals accrue their judgmental faculties and subsequently categorise experience into 'likes', 'dislikes' or feelings of 'neutrality'. In order to holistically capture these discrimination nuances a model of naturally occurring ignorance is also designed.

This chapter discusses a conceptual 'model of judgement' and 'naturally occurring ignorance' theorised to better help understand how humans formulate immediate judgements and to what

subsequently may act as barriers to equanimity. This focuses on what it means to be non-judgmental with greater precision in an attempt to add greater clarity for future scale development as this is what will be focused on later in the thesis. The terms 'like', 'dislike' or 'neutral' have similar connotations to that of 'pleasure', 'displeasure' and 'good', 'bad' and 'indifference'. It is suggested that these terms give rise to what becomes hard and solidified discriminate judgements. The idea being that the base feelings of our 'likes or dislikes' give rise to stronger sensations of 'pleasures and displeasures' which then become solidified 'good or bad' experiences which determine how strongly we hold judgements.

The chapter gives an overall introduction to four domains of judgements theorised as fully capturing all means of accumulating judgmental feelings. These domains were based on the literature identified in Chapter 2 and 3 relating to all psychological experience on a human level and also incorporates a variety of social level theories. This chapter introduces the models before discussing each domain of judgement in more detail. The chapter then introduces the conceptual models before discussing their potential relevance within mindfulness research. The author hypothesises that equanimity is a central feature of emotional regulation and non-judgement and consequently fundamental in generating compassion. Thus, a conceptual 'model of judgement' was created and discussed. Further, a theoretical model of 'naturally occurring ignorance' was created in order to demonstrate barriers to equanimity in four distinct domains.

Overview of the 'model of Judgement'/ 'Barriers to Equanimity' (Fig. 2)

It is suggested that human experience is with judgement and it is postulated that human judgements which begin with (likes, dislikes or feelings of neutrality) come from several sources both on an individual psychological level and from the social world we interact with. The model (Fig. 2) attempts to highlight the ways in which we develop judgements towards phenomenon (Weber, 2017).

The development of a cycle to conceptually map out domains in which humans make

judgements began with a thorough examination of relevant literature that links with theories of self-concept, social learning and social judgement. Coupled with the reading around non-judgement and decentering of self, found in mindfulness literature, this enabled several predictions to what encompasses a domain of judgement. This was further analysed in relation to existing mindfulness psychometric measurement. The nature/nurture debate has long standing scholarly discussion and rather than position the models in relation to a particular side, the models attempt to encapsulate both sides of nature and nurture. Ultimately, the model of judgment sought to encapsulate the nature/nurture debate and presents four distinct hypotheses to how we perceive feelings.

The idea of categories of judgements is not a new one in Western science. Social judgement theory [SJT] (1961) asserts individuals have attitudes that affect their unique latitude of acceptance/ rejection and non-commitment. The theory also posits ego involvement as enhancing the size of each person's latitudes (Sherif & Hovland, 1961). Further, Lewin (1951) coined the term psychological valence to describe the forces that attract or repel individuals to objects that are either desirable or undesirable. Emotions have since been assigned as either having positive or negative valance (Colombetti, 2005) and can be been described as either positive-negative, good-bad, pleasurable or displeasureable. Furthermore, there is widespread agreement that emotional valence captures something central about affect (Fridja & Scherer, 2009). Discriminate categorisation can also relate to the term 'hedonic tone', studied by Snaith et al (1995) in order to assess individuals underlying traits of the experience of pleasure.

Certainly, two key principles identified in SJT align to the 'cycle of judgement' identified in this chapter are that humans contain categories of judgement by which they appraise positions and that as a species we tend to distort incoming information in order to fit those categories (Sherif, Sherif and Muzafer, 1976). Indeed, SJT has been endorsed by Stefanelli and Roman (2014) whom found that humans elicit four opinions such as opposing, supporting, ambivalent and indifference. Thus, the idea of the model of judgement aligns to SJT in that human judgement is categorised (like, dislike and

neutral) which is a similar way of framing the latitudes of acceptance/rejection and non-commitment identified in SJT. Further this principle aligns with Buddhist thought of humans either becoming attached, averse or neutral toward experience based on their understanding of self-concept (Berzin, 2016; Wallace, 2010, Zopa, 2013).

Through a review of the extant literature on both the western concept of mindfulness and its measurement (see Bergomi, et al., 2013; Park, et al., 2013; Sauer, et al., 2013 for reviews) the model was also considered in line with broader social learning theories and theories of self-concept. Four domains entitled 'innate', 'social internal', 'social external' and 'reflective' were predicted as conceptualising a robust 'model of judgement'. In exploring these domains, it is easier to demonstrate barriers to equanimity which will be empirically tested later in the thesis. Each domain is introduced next.

Innate level of judgement

In a broader sense of the nature debate, Darwin (1872) postulated that the human species has an innate sense of emotion and an in-built system of emotional expression. Freud (1920) too supports the notion that humans possess instinctual drives; further supporting the idea that individuals hold unique intrinsic traits. Allport (1937) reiterates this notion arguing that personality is biologically determined at birth. It is here the innate domain refers to how an individual relates to their primordial sense of self. If a person identifies intensely with their inherent views, then their sense of self is closely attuned to their feelings and as such communicate judgements from an 'innate level'. This domain was conceptualised as the 'innate domain'. This is a significant domain as it becomes open to interpretation as to where we think our innate sense of self comes from. From an evolutionary perspective incorporating genes and DNA in human mating preferences (Roberts & Little, 2008) to that of Karma or God-given attributes (Wierenga, 1989) there is still a need to categories this element of self that is open to interpretation without determining how this has been derived. It is significant to leave this

domain open for individuals to place their own beliefs alongside the overarching understanding that we do have an innate sense of self that gives rise to primal level preferences which is also noted by Wynn (2016) whom asserts "even babies prefer individuals who share their tastes, and dislike those with contrasting views" (p4). On a purely observational level this is evident in children displaying preferences for things, people, attachment figures, emotions and memories (Tasimi & Johnson, 2019).

The innate domain also incorporates Buddhist psychology given mindfulness' and equanimity's adaptation from Buddhism (Wallace, 2006; 2010, Zopa, 2013). This domain is not currently explored in Western mindfulness scales and is based on pre-dispositional tendencies and emotional regulation. The innate level of judgement refers to what an individual comes into the world with, their genetically pre-determined/or nurtured basic feelings of like, dislike and neutrality. These base notes determine how an individual relates to and interacts with the world. One could refer to these base notes as 'primordial layers of judgement'. Therefore, one could argue that the propensity of judging begins via the gene-environmental interaction manifesting as conscious or unconscious judgements towards phenomenon (Music, 2017). At this stage a person has an innate sense of judgement towards things depending on physiological functioning. Thus, the innate domain represents our primordial feelings of 'like', 'dislike' and 'neutrality' which give rise to solidified judgements and represents the nature side of the debate that is what we come into the world with and why we are all unique.

Social judgements

In a broader sense, the social judgement sphere represents the nurture side of the debate, Bandura's (1986) social learning theory suggests humans are conditioned by 'models' in society. His infamous bobo doll (1961) experiment highlights this phenomenon, showing through 'identification', how an individual shapes their own behaviours, attitudes and beliefs. It is here the internal social domain refers to how much an individual is influenced by 'socially desirable norms and expectations'. Boas' (1940) theory of cultural relativism offers insight into how culture alters our perceptions and learned

behaviour. Further, Durkheim's (1982) theory on social facts highlights how society holds a coercive power over us. This is perhaps best exemplified by (Tajfel & Turner, 1979) social identity theory [SIT]. SIT shows how our quest for ego enhancement relies on dividing the world into 'them' and 'us based on a process of social categorisation. It is here individuals discriminate against the 'out-group' in order to enhance their self-image. This sheds light on how the development of the social domain is both shaped by our nature but also open to societal conditioning. Thus, the development of the social domain, also highlights how institutions, politics, media etc. play a role in how we develop our feelings. Moreover, this domain, contains both elements of how our feelings are 'conditioned' by our inner 'striving' to 'fit in', and how in turn, key societal structures, influence our feelings from the top down. In this sense we bring our 'innate domain' with us into the 'social domain' and here a reciprocal sense of judgement solidification takes place.

The author postulated the overlap between Buddhist and social psychology and conceptualised the 'social' domain. The social domain also incorporates Buddhist psychology and social psychological aspects of the self and social conditioning (Swanson & Mingyur Rinpoche, 2009). The next stage of the model attunes to the social world. That is to say the innate judgement sphere gives a propensity of judgements, but that these can be potentially altered or exacerbated via the social world. The social level of judgement involves a two-component view of how the social world moulds and shapes a person's sense of judgement as well as being projected onto the social world by the individuals' base judgements. The external and internal judgements play out a conflict type battleground for assumed power. Here the individual conveys a set of internal judgements that are either reinforced or challenged based on the propensity of social conditioning. This can either solidify core judgements on a more unconscious level, yet also can be changed via the tenacity of experience and personality in question. External judgements refer to the myriad possibility of institutions or agencies that can manipulate or give rise to conscious or unconscious judgements towards phenomenon. Whereas internal social judgements refer to the tender aspect of sense of self that seeks approval and acceptance from others. Here an individual can manipulate or give rise to judgements in order to suit the voice of the 'other',

and paradoxically develop a strong sense of judgement based on this. This highlights the threat of individuals suffering low self-esteem, confidence or severe non-awareness formulating judgements based solely on the desire to 'fit in'. This is a critical domain of judgement in the model given how much we are social beings.

This is perhaps best demonstrated in the recent Cambridge Analytica [CA] scandal where Trump hired CA to harvest about 87 million Facebook profiles. A "dark post" feature on Facebook enabled personalised ads to targeted individuals and it is said this scandal was credited to play a key role in President Trump's 2016 victory over Hilary Clinton. The idea here being we are vulnerable of psychological manipulation based on our relationship with the social world rather than overarching rationality. CA managed to 'profile' individuals in order to manipulate personalised advertisements (Rehman, 2019). The notion of psychological vulnerability is perhaps best demonstrated by Youyou, Kosinski and Stillwell (2015). The authors' study entitled 'Computer-based personality judgments are more accurate than those made by humans', found that computer personality predictions based on 'likes' were more accurate than that of the 86,220 participants' close friends.

Interactive judgements

The judgmental level of interaction is particularly evident in the context of mindfulness. Here the author postulates most inner judgements accumulated via the innate and social layers colour and to a certain extent pre-determine the outcome of present moment experience. Such is the well-documented manner in which the mind conducts itself via mindfulness interventions and research. Mindfulness here becomes the concept to help understand the reality that an individual spends a considerable amount of time within, not in the present moment, lost in the conceptual mind therefore lost in dominant judgmental modes of being. The idea that awareness of our own feelings and how this may in turn influence our own emotions, and behaviour with others is a key facet of mindfulness-based therapy. Further, this relates to body awareness, the distinction between positive and negative emotion and a sense of how conscious we may be of how emotion drives present moment interaction (Kabat-Zinn,

The interactive domain is based on Western definitions of mindfulness (Kabat-Zinn, 1994; Jha, Krompinger & Baine, 2007), and items within this domain area adapted from existing measures, namely: The Kentucky Inventory of Mindfulness Skills [KIMS] (Baer, et al 2004), Toronto Mindfulness Scale [TMS] (Lau, et al 2006) and the Five Facet Mindfulness Questionnaire [FFMQ] (Baer, et al 2006), Freiburg Mindfulness Inventory [FMI] (Buchheld, et al 2001) and the Philadelphia Mindfulness Scale [PHLMS] (Cardiaciotto, et al 2008).

Reflective judgements

The reflective domain was also based on existing measures adapted from the Cognitive Affective Mindfulness Scale [CAMS] (Feldman, et al. 2007). Finally, a reflective judgement layer is created in order to signify that even post experience, an individual categorises and theorises an experience as 'good', 'bad' or 'neutral', leaving the inner judgements to reaffirm power over present felt experience, colouring future experiences in order to comply with an individual's self-construct. Here the individual relates experience to both the innate level, social and 'present' moment experience to assign meaning to the experience. Counter intuitively this can however, without equanimity, stunt reflective progression and reinforce pre-existing maladaptive behaviour. Post event the experience will be categorised on a conscious/unconscious level (in sync) with previous layers of judgement so the 'self' remains in a state of control.

Finally, the reflective domain refers to how much memory influences our feelings. In a broader sense, this connects with Festinger's (1957) cognitive dissonance theory, the principle of cognitive consistency refers to how an individual strives to hold all attitudes and beliefs in harmony. Thus, in relation to memory, a person reaffirms their core beliefs by memorising events, people, and interactions in harmony with their individual narrative which in the case of the model of judgement would be a collection of the 'innate', 'social' and 'interactive' domains of judgement. Further, past memories are categorised in line with self-concept, attitudes and beliefs, which aligns to the SIT principal of social

categorisation (Tajfel & Turner, 1979) and SJT principal of ego involvement (Sherif & Hovland, 1961). The judgement cycle highlights the potential layers of judgements upon us so points towards the need to work on the ego or sense of self.

The Judgement Cycle: Figure 2 (Weber, 2017)

The below model of judgement was created utilising the above domains. Each domain is to be considered in relation to an individual. The domains are kept generic so that they can be applied to everyone and in theory map out a cycle of judgement that is unique to everyone depending on both what we came into the world with and social conditioning. The innate domain is open to individual preference given its potential close relationship with religious faith.

The judgement cycle. Manifesting Equanimity starts with identifying our inner most judgements. Understanding why and how we judge with self-compassion is one of the most compassionate things we can do for others.

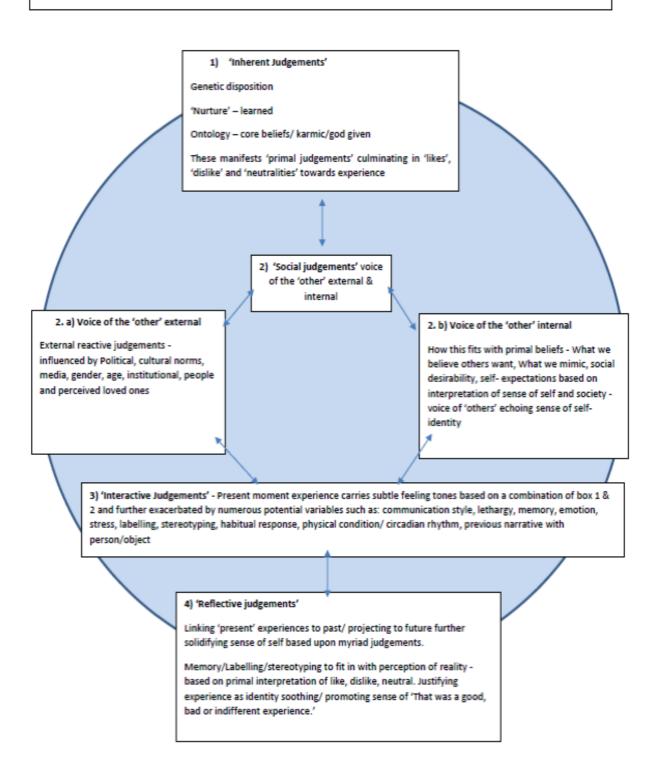


Figure 2: Model of Judgement

However, the role of the ego is a complex one that is open for debate. Self-concept and the role of the ego may create complexities in understanding the innate domain and merely invite dissonance rather than aid clarity and understanding. Further, a key criticism of SJT is that the latitudes of judgement could represent a person's persuasibility rather than being specific to certain topics (Brannon, Tagler and Eagly, 2007). Thus, the same could be said for a person's discrimination categories [like, dislike, neutrality]. Messages that are persuasive may change a listener's attitudes and they may be perceived as falling into the latitude of acceptance or 'likes' rather than 'dislikes'. That is, the power, type or veracity of the message or experience may influence a person's perception of where it fits within their own judgment categories, rather than the immediate categorization coming from the domain itself. However, the idea is that although the domains represent an individual's judgement modes, they are not fixed but open to change with knowledge, wisdom and experience. Again, this would be dependent on a person's candidness towards self-transformation and ability of self-reflection.

Perhaps judgement domains are not as fixed as they may seem but are more transient stances that depend on a person's openness, persuasibility and even self-esteem. Aberson (2000) conducted research to show how people with high self-esteem adopt more in-group bias than those with low self-esteem. Thus, indirect, rather than direct bias strategies depend on perceived sense of self-esteem which in this case would mediate the relationship between an individual and their judgmental domains.

After considering the above model of judgement, it was also theorised that should an individual formulate judgements via these domains then there would be essentially a creation of a fixed and rigid self-concept based on these judgements. Thus, if a person has a strong sense of 'like' towards something at an innate level for example, then they will have a strong sense of 'attachment' with it. Consequently, if a person has a strong sense of 'dislike' they will have a strong sense of 'aversion' towards it. This seemingly would correlate at each stage of the cycle and in turn build up how judgmental a person may be. The prediction being that the more a person elicits judgement in line with their cycle of judgement,

the more they relate to themselves in relation to these judgements, all the time strengthening their sense of self-concept. Thus, an individual relates to themselves entirely based on a series of learned and inbuilt judgmental traits that in theory can be unlearned or overcome. Thus, it felt necessary to demonstrate a consequentialist cycle to demonstrate the threat of ignorance present should an individual be unaware of his or her own cycle of judgement. This is to be known as the cycle of 'naturally occurring ignorance' (see Fig. 3) which is introduced below. The prediction being that lack of awareness of own judgement toward experience and lack of wisdom in relation to self-concept predicts the likelihood of an individual experiencing barriers to achieving equanimity.

The Cycle of Naturally Occurring Ignorance (Fig. 3) (Weber, 2017).

Hertweg and Engel (2016) state that although psychology has been enriched by the quest for knowledge, the desire not to know, however is poorly understood. The authors put forward a taxonomy in an attempt to organise the landscape for deliberate ignorance. Whereas deliberate ignorance is an interesting proposition and may well serve the cycle illustrated here in parts. The 'cycle of ignorance' introduced here aligns to the antithesis of an individual's 'likes', 'dislikes' and feelings of 'neutrality'. That is because the 'cycle of judgement' is so closely akin to self-concept, then anything representing a contrast to a person's feelings is therefore at high risk of ignorance.

That is, unless the person is a dedicated introspective practitioner. "What you don't know won't hurt you", turns out to be false at a deeper level. Just the contrary is true. It is just what you don't know that will hurt you." (Maslow, 1963, cited in Hetweg & Engel, 2016). Thus, the concept of ignorance in this cycle is perhaps best likened to non-awareness based on feeling tones but could also suggest deliberate ignorance. However, it is pertinent to demonstrate that the opposite end of the 'judgment cycle' relates to those judgements becoming fixed and rigid patterns of thought and thus either 'acceptance' or 'pleasure' towards what we 'like, 'displeasure' or 'rejection' towards what we do not 'like' and feelings of neutrality towards what we neither regard as pleasure or displeasure.

Due to an individual's complex layers of judgement, a certain experiential ignorance/nonawareness runs in sync with a person's ego identity (Freud, 1920; Goleman, 2015; Wallace, 2011). Like a shadow following the judgement cycle, non-awareness manifests in terms of justifying, reaffirming and complying with perceived judgements identified in the four domains described above. For example, opposing worldviews are dismissed naturally via the ego's defence mechanisms (Goleman, 2015; Wallace, 2011). Psychological conflict is present each time we are presented with something we do not like (Festinger, 1957). Thus, a certain naturally conditioned ignorance shades an individual's development over time. Not always an ignorance in the sense of a deliberate rejection, but an ignorance manifest due to the ego's self-serving nature, rejoicing in perceived likes or good experiences, accumulating stress or anger towards negative experiences and categorising others as neutral and neither threatening or pleasurable, and therefore irrelevant. Hedonic motivation is a principle to suggest individuals strive for more positive experiences over negative ones (Kaczmarek, 2017). Taking a person's motivation as a baseline for behavior, this is to suggest that we are self-serving based upon our judgement cycle, that elicits pleasurable and unpleasurable experiences and are perhaps only content provided we encounter the pleasurable ones. This unfortunately suggests we are bound to individualism and self-serving feelings supportive to those created by our own judgement cycle. Hostility towards others therefore becomes a natural unavoidable experience should we ignore the essence of our being and instead listen to the ego (Chodren, 2014; Lama et al., 2012).

If this is the case, driven from our base feelings we subsequently encounter naturally occurring ignorance in relation to our fixed sense of self. Thus, the process of one's life may be about unpicking the layers of ignorance in relation to oneself. The link between liking and disliking something means you are automatically judging reality based upon a subjective context which does not fully appreciate that judgements are merely transient expressions of subjective causes and conditions and not a fixed and rigid 'reality'. Ricard (2015) notes that one should adopt a joyous attitude of acceptance, to that of the good, the bad and the neutral. With the development of mindfulness-based equanimity we can increase our ability to manage and master the ego 'self' driven thoughts, emotions and actions that can

dominate and increase our problems in relationships with others. Our natural development of compassion perhaps arises when we view humanity as united and similar is based on an equanimous world view.

It therefore could be said that without equanimity, mindfulness can just be another selfish pursuit. Taking compassion as an example, it is postulated you cannot separate compassion and mindfulness as without mindfulness you will still lack awareness controlled by your base feelings and ignorance towards your own judgement domains. Compassion therefore could become orientated around your likes and dislikes rather than a true sense of the term and thus restrict the cultivation of compassion in practice. Therefore, it can be theorised that mindfulness calms the mind so qualities like compassion can be nurtured. Equanimity provides the emotional regulation of balance, so we remain steadfast and lean towards compassion regardless of experience. However, these ideas will be tested later in the thesis.

Judgement is therefore closely attuned to ignorance (as per the cycle 2). In sum, it is predicted that our own unique 'judgement cycle' also gives rise to our own unique 'ignorance cycle' based upon these limited subjective interpretations of reality. That is, we are defined and nurtured by the domains defined in the 'judgement cycle' and as such hold significant rigid and fixed views of reality as truths that are mere reflections of a manufactured reality. It would seem therefore, that we each create our own reality. Therefore, the interdependence between ignorance and judgement must be attended to in order to move beyond mindfulness and truly be able to accept things 'non-judgmentally' and harbor an attitude of equanimity to all phenomenon in order for compassion to grow and be nurtured within us. This is the perhaps the greatest challenge of an introspective practitioner as it is not just a case of not judging the judgements but turning towards them with a certain wisdom.

The Naturally Occurring Ignorance cycle – [Figure 4]

The below model of ignorance was created utilising the same domains identified in the judgement model. However, this time each domain was considered in terms of a 'threat of ignorance'. Again, each domain is to be considered in relation to an individual. The domains are kept generic so that they can be applied to everyone and in theory mirror the cycle of judgement that is unique to everyone depending on both what we came into the world with and social conditioning. However, this time the domains represent how an individual may react to their 'likes', 'dislikes' and 'neutralities' through a mode of unawareness in relation to self-concept. This model represents the other side of the coin in terms of working with the model of judgement to highlight barriers to equanimity.

The ignorance cycle. Echoing our judgement cycle, like a shadow our naturally occurring ignorance follows us. Without introspection we are at threat of ignorance. 1) Naturally occurring primordial ignorance Accepting /rejecting something based on self-concept / what we like, dislike and find neutral. Believing our primal emotions - conflict with those that contradict. 2) Naturally occurring Social ignorance - voice of the 'other' external & internal 2.b) Naturally occurring ignorance -2.a) Naturally occurring social internal threat ignorance - external threat Believing what we tell ourselves as a Believing what we are told and sold fixed reality without introspection. told in terms of media, politics, and Being open and accepting to what we other people without introspection. Typically accepting what fit our like like and being averse to what we do not. concepts and rejection what does not. 3. Present moment ignorance - experienced positively or rejected based upon layers of ignorance that coincide with our primal likes/dislikes and feelings of neutrality. 4. Reflective ignorance Experience is categorised as a good, bad or neutral one which justifies and solidifies self-concept.

Figure 3: Naturally occurring ignorance

4.4 Discussion

Based upon literature thus far, the author argues that current mindfulness scales reflect a bias towards attentional and memory dispositions, whereas the notion of accepting things without judgement is underrepresented. This is certainly a possibility in scientific research which is evident in psychometric measurement and can only be surmised in relation to teacher knowledge and MBIs. Yet, without adequate care, accepting things without judgement as alluded to by previous commentators, can have a maladaptive affect. Such is the relative ease and human ability to suppress, repress and deny phenomenon that occur in consciousness it appears acceptance itself and the second part of the definition 'attending to things non-judgmentally' demands more attention. It is in this vein, that exploring equanimity seems the most appropriate. Given the lack of attention to the subject in academia, it is therefore fundamental that separate, working definitions and models are conceptualised. Thus, journeys into the self, via mindfulness and equanimity can provide a smooth transition into the cultivation and subsequent development of compassion.

Should an adequate intervention conceptualise equanimity in the west, as a usable and valid construct then future mindfulness studies will reflect not only the ability to enhance memory and attentional capacity but also reflect the profound nature of the practice which is to generate self-compassion and compassion through the ability to be present in the moment nonjudgmentally. The qualities of compassion can be accessed through research into mindfulness and equanimity. Not only will the measurement aid the impact of mindfulness interventions but enhance individual and cultural wellbeing by shifting focus into the compassionate element of the practice both in self and others. This moves mindfulness and in particular research into new areas such as the nature of acceptance, how to actively generate compassion, and also how to sustain mindful practice once a typical intervention has ended. This could provide a robust linkage between mindfulness interventions and compassionate based interventions such as compassion cultivation training (CCT) (Jinpa, 2015). Equanimity is not independent of mindfulness, as one must be mindful of states of mind in order to relate the attitudinal

concept of equanimity. Yet it is not dependent on mindfulness in that it can be applied as a general philosophy in life. In becoming mindful we steady the mind in its natural mode without thought or distraction. In order to maintain this awareness and abide in evenness we deploy the attitudinal hallmark of equanimity. Thus, regardless of sensory or mental phenomenon the attitudinal aspect of equanimity enters awareness and is used as a tool to rest the mind in continual steadiness. That is, what emerges in awareness is observed without a strong sense of like, dislike or neutrality. It is here, in the balance between non-judgement and acceptance that are hallmarks within Western definitions of mindfulness that equanimity has its place. Equanimity has a role in emotional regulation and that these processes are facilitated via the cultivation of equanimity and mindfulness.

This enables an individual to increase their holistic sense of compassion and combat the likelihood of compassion fatigue for example. Furthermore, the likelihood of generating compassion in challenging contexts is strengthened. The value of equanimity is that difficult and also pleasurable experiences are given equal attention (acceptance) and instead of reactions to thoughts or feelings (nonjudgement) the mind is regulated by mindfulness from the multi-dimensional aspects of awareness of phenomenon arising, continual attention to such experience without distraction and finally with an attitude of equanimity. Through mindfulness, what is learned is how to non-reactively observe, decentre from thoughts and assume an open spirit of curiosity. The focus on the breath enables an individual to accept the neutrality of breathing itself and de-centring enables one to detach from painful or unpleasant experiences. Thus, the skill of equanimity is created, that is the ability to detach from emotions and thoughts and view all mental phenomenon as transient mental events rather than decisive descriptions of reality that have a hold over the individual. By changing the relationship to ones' thoughts and emotions then healthy thoughts and feelings are given space to develop (Weber & Taylor, 2016). Such is the plasticity of the human brain, learning to recognise, observe and detach from thoughts is the fundamental relief from undesirable feeling. Previous measures appear to focus on attention, whereas the SOFI scale (Kraus Sears, 2009) focuses on how this attention is applied. The scale is the first that measures the aspirational qualities associated with mindfulness and is unique in that its focus

is towards others as well as self so the author advocates more research in this area.

This chapter has conceptualised a working model of judgement and proposed a theoretical cycle of ignorance that demonstrates barriers to equanimity which aids further research in contemplative traditions. These models have essentially formed the basis of a model to encapsulate barriers to equanimity. Equanimity can be used to examine the correlates between mindfulness and compassion that will thrust contemplative practice into unexplored territory. This could endeavour to progress research on self and identity as well as attitudes towards others. Projects on social cohesion, enhancing understanding of others, prejudice, hatred and bullying may benefit from measuring positive combined with negative aspects of self and other judgements in both mindfulness, positive psychology, peace studies and healthcare settings. The judgement cycle will be used to identify the initial development of a psychometric scale to measure barriers to equanimity, which is demonstrated in the following chapter. Although the above models represent a novel approach to a judgement theory it is noted that these domains will have to be empirically tested. Hereafter, the domains are utilised in Chapter 5

*The following thee chapters comprise a published paper. The entire research protocol was approved by the University Ethics Review Committee of the authors' institution and complied with the ethical guidelines of the British Psychological Society. The methods and results of each study are now outlined.

*Weber, J and Lowe, M (2018) Development and Validation of the Equanimity Barriers Scale, *Current Psychology*, 1-15

Chapter 5 Study 1: Development of the Equanimity Barriers Scale [EBS]

5. Introduction to chapter

This chapter shows the expansion and initial development of the Equanimity Barriers Scale which builds on the work identified in Chapter 4. The chapter does this by discussing and fortifying the study of equanimity within the existing literature. The chapter introduces Study 1 before highlighting the aims and rationale, before discussing the method, results and discussion of the initial development of the item pool. An exploratory factor analysis was used as the method for this chapter and so results are reported to highlight an initial five-factor model of barriers to equanimity. The chapter concludes by highlighting the next steps needed in order to refine the scale, which is subsequently further elaborated on in Chapter 6. The following chapters seek to bridge the gap in knowledge in relation to psychometric measurement identified in Chapter 2.

5.1 Introduction

As previously mentioned, whilst mindfulness as a practice is now well researched, little is known about the associated concept of equanimity or the barriers people face in achieving it. In order to build on the models created in Chapter 4, an initial development of an Equanimity Barriers Scale was conducted via principal component analysis (PCA). This study involved opportunity samples comprised students and staff members from one British university, and via online social media platforms. Study 1 (n=453) PCA revealed five internally consistent factors measuring the ways in which barriers to equanimity are conceptualised.

5.2 Aims and Rationale

The current research builds on the work of Desbordes et al. (2015) by developing and validating a scale to assess barriers to equanimity. As previously mentioned, Desbordes et al. (2015) advocated equanimity as the most significant psychological element in the improvement of wellbeing. If we want to cultivate a state of equanimity, we foremost need to understand the barriers to its achievement. Since there is no current scale that measures barriers to equanimity it is important to consider existing mindfulness scales due to the overlapping theoretical content. Several reviews of mindfulness measurement have been conducted (Baer, 2011; Bergomi, et al. 2013; Park, et al. 2013; Sauer, et al. 2013). Whilst there are items that investigate 'non-judgement' and 'acceptance' in the majority of the contemporary mindfulness scales there is no explicit measurement of equanimity barriers. An individual or person-centred therapist would be able to identify barriers and explore these with more contextual relevance, consequently facilitating improved wellbeing. Further, when considering the maladaptive effects of meditation, identifying barriers acts as a preventative measure. The current research aims to validate a scale to measure barriers to equanimity to bridge this gap in the literature.

5.3 Development of the Item Pool

As mentioned in Chapter 4, item development was based on a review of the extant literature on both the Western concept of mindfulness and its measurement (see Bergomi, et al., 2013; Park, et al. 2013; Sauer, et al. 2013 for reviews) and Buddhist psychology, four broad domains germane to equanimity barriers were highlighted and an initial pool of 60 items generated. The innate domain was based on a literature review of Buddhist psychology (Wallace, 2006; 2010, Zopa, 2013). This was conceptualised as the 'innate' domain. The authors reviewed the current mindfulness measures and conceptualised the 'interactive' and 'reflective' domains. Finally, the authors discussed the overlap between Buddhist and Social psychology and conceptualised the 'social' domain. Two domains encompass barriers to achieving mindfulness from a Westernised perspective, and two from a broader stance, based on Buddhist philosophy. Each domain is individually considered next.

The interactive domain is based on Western definitions of mindfulness (Kabat-Zinn, 1994; Jha, Krompinger & Baine, 2007), and items within this domain area adapted from existing measures, namely: The Kentucky Inventory of Mindfulness Skills [KIMS] (Baer, et al 2004), Toronto Mindfulness Scale [TMS] (Lau, et al 2006) and the Five Facet Mindfulness Questionnaire [FFMQ] (Baer, et al 2006), Freiburg Mindfulness Inventory [FMI] (Buchheld, et al 2001) and the Philadelphia Mindfulness Scale [PHLMS] (Cardiaciotto, et al 2008). An example is "How I behave with others is influenced by my sense of physical wellbeing". The reflective domain was also based on existing measures adapted from the Cognitive Affective Mindfulness Scale [CAMS] (Feldman, et al. 2007). An example is "My memories influence how I act with others."

The innate domain was based on a literature review of Buddhist psychology (Wallace, 2006; 2010, Zopa, 2013). An example is "I am what I feel". This domain is not currently explored in Western

mindfulness scales and is based on pre-dispositional tendencies and emotional regulation. Finally, the social domain is based on Buddhist psychology and social psychological aspects of the self and social conditioning (Swanson & Mingyur Rinpoche, 2009). Examples of this domain are "Social expectations influence the way I perceive others", and "I feel like the media influences the way I feel about others". This further goes beyond Western views of mindfulness scales.

Collectively, domains reflected identification with self-concept (innate), mindful awareness and attention (interactive), memory (reflective) and social (social internal and external). The term "equanimity" was not stated to avoid priming effects. Instead judgements and feelings of 'like', 'dislike' and 'neutrality' were used. The purpose of this was to obtain information of how individuals naturally assume judgements arise so that scale items would be relevant and understood by the 'typical' person. This was crucial as equanimity is a concept largely undiscussed in Western psychology and is largely an unfamiliar topic for the general population. Items were worded so that they represented the way in which feelings may or may not influence our behaviour and or emotions. Responses were on a Likert-"Strongly disagree", type scale, ranging 7 In study 1, Principal Components Analysis (PCA) were utilised on the 60 items, and an initial five factor solution comprising 25 items was identified.

5.4 Study 1: Method

Participants and Procedure

Participants in Study 1 (n=400) were recruited via opportunity sampling and comprised students and staff from the University of Bolton's health and psychology courses. A further 53 participants were recruited via online social media platforms. Combined therefore, the sample comprised 453 participants; 91 males (20.2%) and 357 females (79.1%) and 3 participants did not report their gender (0.7%). Participants ranged in age from 18 to 71 years old (M = 30.55; SD = 11.26). Upon providing consent, participants completed demographic questions about age, gender, profession and

highest qualification, as well as the 60-item questionnaire. Participants then completed the questionnaires before anonymously filing them in a brown envelope. The questionnaires were then collected and placed in a locked office ready for inputting.

5.5 Results: Principal Components Analysis

Analyses were conducted using IBM SPSS version 23. Responses were subjected to principal axis factoring with oblique rotation and Kaiser normalisation. To identify whether a factor analysis was an appropriate method to analyse the items, the KMO statistic and Bartlett's test of sphericity were inspected. The KMO value for the data was .91, indicating that the items correlated. The Bartlett test of sphericity was also significant ($\chi^2 = 10945,533$ df = 1770, p < .001). The initial analysis yielded 15 factors with eigenvalues greater than 1.0. Inspection of the pattern matrix revealed that only 5 factors had 4 or more items with loadings over 0.4. Therefore, a 5-factor solution was examined. An example is 'I recognise my habits are linked to my feelings'.

The derived factors supported the five domains assumed in the formulation of the EBS. PCA with varimax rotation was performed in order to reduce the data and determine the strongest features. Factor loadings were inspected. Following the recommendations of Tabachnick and Fidell (2012), any factor loadings of .45 or higher were retained, with 20 percent overlapping variance. These are shown in Table 1. These 25 items were selected for the revised domains to be considered in study 2.

In line with the theorised domains it was identified that factor 1 measured the interactive sphere of judgment [5 items], control factor 2 measured the levels of reflective judgment [5 items], factor 3 reflected the participants external social judgment [5 items], factor 4 was the internal domain of judgment [5 items] and factor 5 demonstrated the participant's innate level of judgment [5 items]. A good level of reliability was shown for each of the factors; interactive ($\alpha = .73$), reflective ($\alpha = .80$), participant's external social judgment ($\alpha = .79$), internal judgment ($\alpha = .80$) and innate judgments ($\alpha = .75$).

Table 1

Items and Factor Loadings in Study 1

	Factor loading
Factor 1 (Interactive) (5 items)	,
My feelings can undermine how I wish to behave in certain circumstances	.45
When I know I should be feeling positive but actually feel negative, I feel a sense of frustration	.69
I sometimes wish I could control my feelings rather than be controlled by them	.81
When someone says something I disagree with, I notice a sense of tension inside me	.44
If I could change the way I felt about things I would	.57
Eigenvalue	14.13
% variance explained	23.55
Factor 2 (External social) (5 items)	
I feel that my feelings towards others are influenced by my culture	.65
I feel that the media influences my feelings towards others	.66
My gender influences my feelings towards others	.73
My age influences how I feel towards others Organisations or institutions influence the way I perceive others	.65 .72
Eigenvalue	
% variance explained	3.41
	5.68
Factor 3 (Reflective) (5 items)	
My memories are strongly linked with my feelings	.83
My memories influence how I interact with others	.83
My emotions are governed by how I feel	.80
When I communicate with others do I notice how I feel?	.93
How I behave with others is influenced by my sense of physical wellbeing	.88
Eigenvalue	2.70
% variance explained	4.51

Factor 4 (Internal social) (5 items)

My feelings are influenced by external social factors	.98
My sense of self feels threatened by 'socially desirable' norms and expectations	1.05
The social world changes the feelings that I came into the world with Societal expectations influence the way I perceive my feelings My feelings are influenced by internal social factors	.33 1.01 .94
Eigenvalue	2.46
% variance explained	4.10
Factor 5 (Innate) (5 items) If my feelings change then I will change I am what I feel My emotions are governed by how I feel All my actions are governed by emotions My emotions are governed by how I feel	.35 .36 .80 .64
Eigenvalue	1.90
% variance explained	3.17

^{**} Items in bold included in final model

5.6 Discussion

The PCA identified five factors from the original 60-item pool. The study confirms the multiplicity of barriers to equanimity. The factors have been conceptualised as the innate, internal social, external social, interactive and reflective domains. The conceptual model of judgement portrays five distinct factors in which an individual may accrue judgements. This is significant given no scale at present measures barriers to equanimity or attempts to conceptualise these into separate categories. The five factors are organised into themes that are appropriately titled given the clustered items. This is pertinent given non-judgement is a competency advocated in a wide variety of health and social care services and other than training on equality and diversity or reflective practice, professionals are not always enabled a deeper insight into their own propensity of judgements. The five-factor model thus, allows a more distinguished stance of human judgements and consequently barriers towards non-judgemental practice.

The results of this study have supported the work of Desbordes, et al (2015) in positing that equanimity plays a role in wellbeing by highlighting distinct barriers to equanimity. This study suggests each individual has five unique judgmental domains that contain judgmental blueprints that must be overcome for greater equanimity and wellbeing. Further, this has narrowed down a large item pool into a more manageable framework which has made the domains more robust. This is useful given the previous attempts to review mindfulness (Baer, 2011; Bergomi, et al. 2013; Park, et al. 2013; Sauer, et al. 2013) have highlighted no explicit measurement of barriers to equanimity. The study is also useful in blending mindfulness and Buddhism given the hybrid domains. The innate and social domain (Wallace; 2006; 2010, Zopa, 2013) seem to offer distinct factors alongside the other two mindfulness informed domains; interactive and reflective (Kabat-Zinn, 1994; Feldman, et al 2007; Jha, Krompinger & Baine, 2007).

Significantly, the factor structure of the EBS appears to consist of both inner and outer equanimity. In relation to inner equanimity, this factor is clearly relatable to the 'innate' domain. The items consist of a strong sense of self in relation to feelings of like, dislike and neutrality. 'I am what I feel', gives the impression that an individual sees themselves as almost identical with their feelings. Further, 'if my feelings change then I will change' reinforces this notion. This can be theorised to come from a deep sense of 'innate' or primal identification with self-concept.

The factor structure 'social', consists of items linked with both inner and external equanimity. This is because the social domain captures an individual's relationship with their social environment and is also two facing. The items that link with an individual's relationship with the outer elements of social conditioning are the items referring to relationships with their culture, media and organisations or institutions. However, the items that relate to inner equanimity highlight an individual's relationship with 'socially desirable' norms and expectations and how social expectations influence the way an individual perceives their feelings. Thus, this factor structure relates to both inner and external equanimity.

The factor structure associated with the interactive domain appears to be further linked with both inner and external equanimity. The factor relates to inner equanimity in the sense that an individual can sense 'feelings' inside of them and how these relate to the world. Items reflect how physical wellbeing, a sense of control over their feelings and inner conflict play a role in how individuals interact with their environment and the social world. So, whilst this factor structure relates to how an individual's own sense of self influences their feelings, this too points towards how human interaction is social interaction. Thus, this factor too infers relationships with outer equanimity.

Finally, the 'reflective' domain refers to inner equanimity. This is because it relates to an individual's memories. The past is related to memories and is in sync with the reflective inner component associated with inner equanimity. 'My memories are strongly linked with my feelings' and 'my memories influence how I interact with others' clearly relate to the function of memory in the past tense. This is because this domain relates to an individual's unique psychology and does not factor in any external relationships. In sum, the innate and reflective domains refer to inner equanimity and the interactive and social domains capture both internal and external equanimity.

5.7 Limitations

One limitation of the study concerns the nature of dimension reduction analysis. Indeed, Pervin, Cervone and John (2005) suggest factor analysis is not unbiased. Although the statistical procedure identifies patterns of covariation, it does not answer the question of why the responses covary (Cervone & Pervin, 2008). This is because it is the researcher that uses their own knowledge and relies on their own theoretical beliefs and as such interprets the principal components based on their own decisions and interpretations. Further, PCA extracts important features from a large dataset but uses only mean and covariance in a linear correlation as important features. Thus, not all distributions are described (Maduranga, 2016).

5.8 Conclusion

Although this study has aided the refinement of the items and confirmed distinct factors related to barriers to equanimity, these factors have been subject to interpretation based on the model created in chapter 4. The 25 items need refinement and further validation via confirmatory factor analysis [CFA] in order to enhance the validity of the scale.

Chapter 6 Study 2: CFA and Model Fit Analysis

6. Introduction to chapter

Study 2 aimed to validate the 25 item five factor structure identified in the PCA via CFA. This chapter builds on the previous chapter by clearly showing further examination of the five-factor model outlined in chapter 5. Chapter 5 sought to outline the initial development of the EBS, however is in essence an exploratory procedure and only provides information about the number of factors required to represent the data. CFA is a multivariate statistical procedure to test how well the measured variables represent the number of constructs and as such confirm or reject the measurement theory in question (Statistics Solutions, 2013). Thus, this chapter highlights the use of confirmatory factor analysis and model fit analysis to reflect the development of the EBS. The chapter does this by highlighting the method and results of the CFA. Finally, the chapter discusses the implications of the CFA that aid the further development of the EBS and point towards the need for final convergent and discriminant validity.

6.1 Method

Participants and Procedure

Data for Study 2 were collected from 108 participants; 35 males (32.4%), 70 females (64.8%), and three with unreported gender (2.8%). Age ranged from 18 to 54 years (M= 28.79; SD = 10.58). Participants were all undergraduate students from the University of Bolton, recruited via opportunity sampling from health courses. Participants provided consent, demographic questions about age, gender, profession and highest qualifications as well as the 25 items isolated in Study 1.

Study 2 involved n=108. This sample size was selected given the refined five factor model. It was decided that there should be a minimum of n=20 participants for each factor. "Suggested minimums for sample size include from 3 to 20 times the number of variables and absolute ranges from 100 to over 1,000" (Mundfrom, D et al 2005 p159). Moreover, Bryant and Yarnold (1995) suggest that, "one's sample should be at least five times the number of variables. The subjects-to-variables ratio should be 5 or greater. Furthermore, every analysis should be based on a minimum of 100 observations regardless of the subjects-to-variables ratio" (p. 100). Thus, the study aimed to recruit at least n=100.

6.2 Results

Analyses were conducted on 25 items (see Table 3) using IBSM SPSS Amos 23, utilising Confirmatory Factor Analysis (CFA). Model fit was measured through inspection of the comparative fit index (CFI), Chi-Squared statistic (χ^2), the Tucker Lewis index (TLI) and Root Mean Square of Error (RMSEA). Ideally, the χ^2 should be non-significant; however, this value is very sensitive to large sample sizes and is often significant, even for well-fitting models (Bentler & Bonnet, 1980). Hu and Bentler (1999) proposed several additional criteria to establish a good fitting model, which were adopted in this study. More specifically, adequate fit required a CFI value higher than .95, a TLI value greater than .95 and a RMSEA value of less than .08 (Hu & Bentler, 1999).

Inspection of inter-item bivariate correlations revealed that four items did not correlate with the questionnaire above 0.75 (r = -.126 to 0.75) and were subsequently excluded from further analyses (Tabachnick & Fidell, 2012). No items were highly correlated with one another (>.80) suggesting that the items were parsimonious, with a low risk of multi-collinearity. This left a total of 21 items for further inspection. These items showed five factors with each item loading on one factor only. Overall, a total of three models (see Table 3) for best model fit.

Table 3. CFA

Model fit of each of the models tested in the confirmatory factor analysis.

	No. of items	χ²	df	CFI	TLI	RMS E A	90%	6 CI
						A	Lower	Upper
Model 1: Principal Components Factor Analysis Model 5 subscales; Interactive judgements, Innate Judgements, External Social judgements, Internal Social judgements, Reflective Judgements	21	notadmissable***		.83	.81	.078	.065	.091
Model 2: Thematic 4 subscales; Interactive judgements, Innate Judgements, Combined external and internal Social judgements, Reflective Judgements	16	130.10***	98	.95	.93	.055	.026	.079
Model 3: Thematic 4 subscales; Interactive judgements, Innate Judgements, Combined external and internal Social judgements, Reflective Judgements	15	103.592***	84	.97	.98	.047	.000	.074

Note: *** = p<.001. CFI = comparative fit index, RMSEA = root mean square of error, TLI = Tucker Lewis index

The suitability of each model was assessed by inspection of goodness of fit indices. The CFI, χ^2 , TLI and RMSEA were used to assess model fit (see Table 3). The first model consisted of five factors onto which all 21 items were loaded. This revealed an inadequate fit ($\chi^2 =$, 440.698) = 1.633, p<.001, p<.001, CFI = .829, TLI = .807, RMSEA = .079).

Following this, the second model contained four factors to reflect the strength of the factors of the PCA. It was decided that the external and internal factors could be amalgamated to provide one overarching social factor as the items strongly correlated as the two factors both explore societal influences upon an individual. Upon inspection of the second model, it was thought that responses regarding innate judgements and reflective judgement may affect the quality of the model. A number of weakly loaded items were excluded from the analysis. The second model consisted of four factors onto which 16 items were loaded. This was improved from model one, but the fit was inadequate (χ^2 130.104 =, 1.328 p< 001, CFI = .945., TLI = .933, RMSEA = .055).

This revealed that six items were loading on to multiple factors and those items were removed from the model to ensure that each of item clearly loaded on to one distinct factor (Matsunaga, 2010). Similarly, items that loaded onto the same factor, and were theoretically justifiable, were co-varied (Brown & Moore, 2014; Jöreskog & Long, 1993). If these were not theoretically justifiable, they were not allowed to co-vary. A further item was excluded from the model. Following this, the third model revealed an acceptable fit (χ^2 103.592 = 84, p<.001, CFI = .964, TLI = .955, RMSEA = .047). Model 3 was therefore selected as the final model for the experiences of equanimity barriers, as it demonstrated acceptable χ^2 , CFI, TLI and RMSEA statistics. The factor loadings of each item in the final model are shown in Table 3.

Table 4 Factor loadings for final model of the EBS

Factor loadings for each subscale of the final model of the EBS

	Factor loadin
Innate (2 items)	
I am what I feel	.66
If my feelings change then I will change	.75
Social (5 items)	
I feel like my feeling towards others are influenced by my culture	.79
I feel like the media influences the way I feel about others	.70
Organisations or institutions influence the way I perceive others	.78
My sense of self feels threatened by 'socially desirable' norms and expectations	.62
Social expectations influence the way I perceive my feelings	.85
Interactive (6 items)	
How I behave with others is influenced by my sense of physical wellbeing	.51
When I know I should be feeling positive but actually feel negative I notice a sense of frustration	.45
I sometimes wish I could control my feelings rather than be controlled by them	.47
When someone says something I disagree with I notice a sense of tension within me	.49
My behavior with others is dependent on how I feel	.61
All my actions are governed by emotions	.65

Reflective (2 items)

My memories are strongly linked with my feelings

.72

My memories influence how I interact with others

.76

The reliability and validity statistics for the final model were additionally examined (See Table 4). In order to assess the convergent and discriminant validity, Average Variance Explained (AVE) was tested, which highlights the degree to which the distinct items on the questionnaire represent the overall subscale. Hair et al. (2006) denotes how these values should ideally exceed .50. Moreover, construct reliability was examined with values preferably surpassing .70 (Hair, et al 2006) therefore demonstrating both the internal consistency and reliability of the subscale. A high level of reliability and validity for the EBS is demonstrated in Table 4, as the AVE and construct reliability statistics for the definitive 15-item model surpassed their desired values. CFA was tested again, and it confirmed the aforementioned factors.

Table 5 CFA reliability and validity statistics

CFA reliability and validity statistics for the four subscales of EBS.

Subscale	Construct reliability	AVE
1. Innate	.66	.93
2. Social	.86	1.04
3. Interactive	.70	.82
4. Reflective	.71	.85

6.3 Discussion

Study 2, (n=108) sought to confirm these factors. Results revealed that a four-factor model best fit the data. Validity statistics were sufficient to support this model. The CFA has refined the 5-factors identified in Chapter 5 to reveal a more sophisticated 4-factor model. The internal and external social domains have been integrated to establish a more robust domain. This is possibly because both domains represent two sides of the same phenomenon. This refined model encompasses four distinct features of barriers to equanimity, namely: innate, social, interactive and reflective ones. The 25 identified items in Chapter 5 have been refined to a more sophisticated 15-item model. This is significant given the scale is now represented in a more efficient and effective manner. Study 3 aimed to test convergent and discriminant validity of the EBS in order to complete the initial validation phase of the EBS.

One interesting result of study 2, was the amalgamation of the internal and external social factors. These two factors were identified as separate factors in the PCA, however became one factor in order to comply with the adequacy of the chosen goodness of fit indices. The social factor is two facing, suggesting it is conducive of both inner and outer equanimity. This is consistent with the literature in that the complex nature of social conditioning comes from both external and internal sources (Swanson and Myingur, 2010). The newly revised four factor model fits well with the concepts

of both inner and outer equanimity given innate and reflective focus on inner equanimity and interactive and social focus on external equanimity. However, two items of the social factor also appear consistent with inner equanimity.

6.4 Limitations

Anderson and Gerbing (1988) question the level of feedback provided by CFA to the researcher. The output contains a factor structure/pattern that is strongly affected by the theoretical model behind the test. Such an all-or nothing decision is not the only aspect in which the researcher is interested, especially not in the intermediate phases of their investigation. Although "clustering that corresponds to the ideas that guided the construction of the questionnaire is strong support for these ideas, as well as for the content validity of the items and the construct validity of the questionnaire" (Prudon, 2013, p2). The author goes on to add that current users of CFA, working in the applied social sciences, may be less aware of its limitations than statisticians are and be over-optimistic about the reliability of the method when striving to validate questionnaires. For example, one limitation could be the relatively small sample size. "The goodness-of-fit indices do require large samples to discern good from poor predictions, in line with what SEM needs, but large samples are often out of reach in many psychological studies" (Prudon, 2013, p 13). Finally, two of the subscales now only contain two items which is a low number of items to measure a construct. Further, these items are highly correlated and as such can only offer minimal feedback.

6.5Conclusion

Study 2 has supported distinct factors related to barriers to equanimity in line with the previous study. However, the 25 items have now been reduced to a 15-item scale with 4 subscales. These items are statistically the most robust ways of measuring barriers to equanimity in line with the researcher's methods, however the PCA and CFA need to be measured against existing psychometric scales in order to ensure convergent and discriminant validity.

Chapter 7 Study 3: Convergent and Discriminant Validity of the EBS

7. Introduction to chapter

This chapter seeks to validate the four-factor model outlined in Chapter 6 via convergent and discriminant validity tests. Convergent and discriminant validity are considered sub-types of construct validity (Statistics Solutions, 2013). The fundamental aspects of demonstrating both convergent and discriminant validity suggests evidence for construct validity, which is vital for any new psychometric scale. The chapter discusses the items used to test for both convergent and discriminant validity before outlining the methods used for this study. The chapter then discusses the measures in greater depth, before demonstrating the results and discussing the implication of the identified correlations. Finally, there is an overall discussion of the final version of the EBS and results so far, before addressing future research and limitations of this scale development.

7.1 Introduction

Results of Study 2 suggest that the EBS measures a variety of challenges an individual may face in cultivating equanimity. It was also necessary to determine how this particular construct is correlated with mindfulness, non-judgemental acceptance and emotional regulation by testing convergent and discriminant validity. It was predicted that the EBS would be correlated the Mindfulness Attention Awareness Scale [MAAS] (Brown & Ryan, 2003), Big Five Inventory-10 [BFI-10] (Rammstedt & John, 2007), Self Compassion Scale Short Form [SCS-SF] (Raes, et al. 2011), Difficulty in Emotional Regulation Scale Short Form [DERS-SF] (Kaufman, et al. 2015) and the Emotional Regulation Questionnaire [ERQ] (Gross & John, 2003) (See Chapter 2). These scales were chosen given the expected correlations with mindfulness, self-compassion and emotional regulation which were all concepts discussed in Chapter 2. Further, personality type was predicted to correlate given the

scales focus on individual nuances hence the inclusion of the BFI-10.

7.2 Method

Participants and Procedure

Participants were recruited via opportunity sampling, comprising 302 undergraduate students from the University of Bolton, studying the health and psychology course (64 males [21.2%], 235 females [77.8%], 3 gender fluid [1%]). Ages ranged from 18 to 58 years old (M = 30.24; SD = 9.52). Questionnaires were distributed at the beginning of lectures. Upon providing consent, participants completed demographic questions about age, gender, ethnicity, profession and highest qualification, as well as the 74-item questionnaire encompassing all scales described next.

Measures

In addition to the 15 items finalised in Study 2 the following measures were administered. The 14 item MAAS (Brown & Ryan, 2003). Globally, this scale is the one of the most commonly used measure of mindfulness attention and awareness and has demonstrated significant reliability and validity in a multitude of studies. The scale has also been validated in a wide variety of populations and countries (Abdi, 2015; Jose Ruiz, et al. 2016; Phang, 2016). Measuring the EBS with the MAAS was important as equanimity is proposed to be related to mindfulness. This scale was chosen as it focuses solely on awareness and attention as opposed to non-judgement.

The BFI-10 (Rammstedt & John, 2007). The short form has five subscales of extraversion, agreeableness, conscientiousness, neuroticism and openness. The BFI is a globally recognised scale with proven reliability and validity which has been validated in different countries (Alansari, 2016; Fossati, et al, 2011). The results of the BFI-10 indicate the subscales retain significant levels of reliability and validity (Rammstedt & John, 2007).

The SCS-SF (Raes et al., 2011) was chosen to relate the EBS to the different subscales of compassion. The short form has six subscales namely; self-kindness, self judgement, common humanity, isolation, mindfulness and over identified. The SCS has sufficient evidence of reliability and

validated in different languages (Azizi, et al 2013; Eirini, Christos & Anastasios, 2017). The SCS–SF confirmed adequate internal consistency and an almost perfect correlation with the long form SCS (Raes et al., 2010) and was chosen as the final measure.

The DERS-SF (Kaufman, et al. 2015). The Difficulties in Emotion Regulation Scale (DERS) is a well validated and widely used self-report measure for assessing emotion regulation problems (Gratz & Romer, 2004). The scale has been validated in different countries (Yamade, 2012) and subsequently a more accessible short form has been produced. The short form has six subscales including strategies, non-acceptance, impulse, goals, awareness and clarity. The Difficulty in Emotional Regulation Short Form [DERS-SF] was expected to demonstrate significant convergent validity due to the similarity of the overall construct. This scale, however, is not related to mindfulness and does not distinguish mindfulness awareness, therefore does not identify equanimity as a construct. Whereas the DER-SF focuses on an individual's emotional regulation, the EBS identifies wider challenges incorporating mindfulness awareness.

The ERQ (Gross & John, 2003). Again, this is a well-used and widely accepted psychometric measure that has been validated in different countries (Enebrink, et al. 2013). The ERQ has been designed to highlight the habitual use of reappraisal and suppression strategies, thus supporting the hypothesis that a person who has little equanimity will have difficulty in regulating emotion. The scale has two subscales of experience and expression.

Assumptions

The following assumptions were expected:

- 1) In relation to the MAAS, it was expected that there would be a significant negative correlation between the EBS interactive and reflective subscales. This is because of the two domains reflecting contemporary mindfulness.
- 2) The BFI-10 was chosen in order to examine personality traits in relation to equanimity. It was expected that this scale would correlate positively with the EBS.
- 2) It was expected that the self-kindness subscale would correlate positively with the social subscale of the EBS. It was also expected that the self-judgement, isolation and over identified subscales were expected to correlate positively with all the subscales of the EBS. Further, the common humanity subscale was expected to correlate positively with the social and interactive subscale of the EBS. Finally, it was assumed that the mindfulness subscale would correlate negatively with the interactive and reflective subscales of the EBS.
- 3) It was expected that the subscales of strategies, impulse, goals and clarity would positively correlate with each of the EBS subscales. It was also expected that non-acceptance would positively correlate with the social, interactive and reflective subscales of the EBS. Finally, it was anticipated that the awareness subscale would positively correlate with the innate and social subscales.
- 4) The ERQ was chosen as it was expected that an individual who finds it difficult to regulate emotion would face barriers to equanimity. It was expected that the ERQ would correlate positively with the EBS Innate subscale.

7.3 Results and Discussion

The purpose of Study 3 was to assess how the EBS would be related to theoretically overlapping constructs of mindfulness, non-judgmental acceptance and emotional regulation by testing convergent and discriminant validity. Overall, the findings in this study were in accordance with predictions. The reliability for each of the measures and subscales is reported in Table 6. The descriptive statistics are reported in Table 7. The correlations matrix and convergent and discriminant validity are reported in Table 8, 9, 10, 11 and 12.

Table 6 Internal reliability statistics Cronbach's alpha.

Mindful Attention Scale	.850
Difficulty Emotional Regulation Scale	.888
Emotional Regulation Questionnaire	
Cognitive appraisal	.875
Expressive suppression	.735
Expressive suppression	.133
Salf Companion Saala	.583
Self-Compassion Scale	.363
Equanimity Barriers Scale	
1 7	607
Innate	.607
Social	.874
Interactive	.838
Reflective	.715
_ Total	.876

Table 7 Descriptive statistics.

	range	minimum	maximum	mean	Standard	Standard
	U				Error	deviation
Big 5						
Extraversion	8.00	2.00	10.00	7.35	.10	1.79
Agreeableness	8.00	2.00	10.00	5.95	.10	1.70
Conscientiousness	8.00	2.00	10.00	6.91	.10	1.69
Neuroticism	7.00	3.00	10.00	6.80	.08	1.44
Openness	8.00	2.00	10.00	7.46	.09	1.55
Self-compassion total	45.00	17.00	62.00	40.66	.33	5.81
Self-compassion mean	3.75	1.42	5.17	3.39	.03	.48
DERS total score	74.00	25.00	99.00	53.96	.76	13.26
Mindfulness Awareness Total	64.00	14.00	78.00	46.12	.70	12.17

Mindfulness Awareness	4.57	1.00	5.57	3.29	.05	.87
Mean						
EBS Innate	12.00	2.00	14.00	9.06	.16	2.85
EBS Social	30.00	5.00	35.00	18.73	.44	7.59
EBS Interactive	60.00	6.00	42.00	25.76	.45	7.84
EBS Reflective	12.00	2.00	14.00	8.58	.18	3.18
EBS Total	88.00	15.00	103.00	62.13	1.01	17.55
ERS Cognitive reappraisal	36.00	6.00	42.00	27.73	.43198	7.51
ERS Expressive suppression	24.00	4.00	28.00	16.08	.30350	5.27

Table 8 Self-Compassion Scale (Short Form)

Self-compassion mean score	Correlation	innate .236**	social .283**	interactive .328**	reflective .258**	EBS total .380**
score	Significance	.000	.000	.000	.000	.000

The Self-Compassion Scale correlated significantly with all four subscales of the EBS, as well as with EBS Total. All correlations were significant at p=.001. The highest correlation was .380 between self-compassion and the EBS total. This indicates that a person who has greater self-cmpassion has less barriers to equanimity.

Table 9 Difficulties in Emotion Regulation Scale (DERS-18)

DERS-18 Total score Correlation .21 significance .0	0** .296**	interactive .437** .000	reflective .310** .000	EBS total .432** .000
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The DERS-18 correlated positively with all four subscales of the EBS and with the EBS total score. All correlations were significant at p = .001. The highest correlation was .437 between the DERS and the interactive subscale. These positive correlations indicate individuals who face barriers to equanimity are less able to develop positive coping strategies, more likely to drift into non-acceptance and less able to develop resilience when dealing with difficult situations. The results further suggest

that the further from equanimity a person may be, the more impulsive they become and lack in self-awareness and clarity.

Table 10 Mindfulness Awareness Scale

Mindfulness Awareness mean	Correlation	innate .026		interactive222**		
score	significance	ns	ns	.002	.002	ns

The Mindfulness Awareness Scale correlated significantly only with the Interactive and Reflective subscales, yet both correlations though significant, were low. While the EBS total was significant, when controlling for multiple comparisons p = .01 or less. The highest correlation was only .222, between Mindful Awareness and the interactive subscale. There was a very strong negative relationship, as expected, between the MAAS and both the EBS interactive and reflective subscales. This negative correlation suggests a person with low mindfulness is likely to be unaware of their feelings, sense of physical well-being during the present moment, or likely to be caught up with past experiences or nostalgia.

Table 11 Emotional Regulation Scale.

ERS Cognitive Reappraisal	Correlation Significance	Innate .129* ns	social .055 ns	interactive 036 ns	reflective .060 ns	EBS total .037 ns
ERS Expressive Suppression	Correlation significance	.112 ns	.013 ns	.053 ns	.068 ns	.060 ns

Neither scale of the Emotional Regulation Scale correlated with the EBS.

Table 12 Big 5 Personality Factors.

Extraversion	Correlation Significance	innate .025 ns	social .009 ns	interactive 014 ns	reflective 075 ns	EBS total 011 ns
Agreeableness	Correlation	.064	.207**	.132*	.073	.183**
	Significance	ns	.000	ns	ns	.001
Conscientiousness	Correlation	020	009	122*	161**	097
	Significance	ns	ns	ns	.005	ns
Neuroticism	Correlation	.037	.159**	.114	.154**	.142*
	Significance	ns	.005	ns	.008	ns
Openness	Correlation	.065	.123*	.253**	.150**	.196**
	Significance	ns	ns	.000	.009	.001

Extraversion failed to correlate with any EBS subscales or the EBS Total. Agreeableness correlated significantly with the social subscale and the Total EBS score. Conscientiousness correlated significantly only with the interactive subscale. Neuroticism correlated significantly with the social and reflective subscales. Openness correlated with two subscales, interactive, reflective and total EBS. Correlations at least with the short form of the Big 5 were quite low, with the highest correlation only being .253 between Openness and the interactive subscale.

7.4 Overall Discussion of the validation of the EBS

The aim of this research was to develop and provide an initial validation of a scale that measures barriers to equanimity. Little research attention thus far has focused upon barriers toward the non-judgmental, acceptance aspects of mindfulness and the concept of equanimity is rarely considered (Desbordes, et al. 2015). The development of a scale to measure these constructs is therefore timely.

Considered together, results from Studies 1 and 2 provide evidence for the construct validity of the EBS. The CFA confirmed the expected factors which subsequently encompass Innate, Social, Interactive and Reflective subscales. This highlights the layers of complexity upon individuals' ability to abide in equanimity (Wallace, 2010, Zopa, 2013). To judge based upon our own experience of likes, dislikes and feelings of neutrality is to reaffirm pre-existing and learned traits and behaviours. It is particularly significant to address maladaptive schemas that may have detrimental effects on wellbeing. "To set up what you like against what you dislike is the disease of the mind" (Seng ts'an, Cited in Putkonen, p7 1974, p 7). The EBS can play a key role in understanding therapeutically why we may think and behave the way we do and subsequently support healthier counterintuitive change. Thus, the EBS aids the identification of the myriad reasons why individuals may experience little or no equanimity in certain contextual scenarios.

Recent research has turned towards the question of how and why mindfulness results in prosocial change (Chiesa, et al. 2014; Gu, et al., 2015; Holzel et al. 2011). Future use of the EBS within literature on mindfulness experience and practice would enable the exploration into why some individuals face barriers to equanimity and would foster research into the causal factors that facilitate wellbeing. Should an individual strive for equanimity then it is vital that one is able to dissect the ways in which they may judge phenomena. The EBS to an extent may also help bring out unconscious bias once an individual has addressed the ways in which they formulate judgements (Baer, 2011). Further, this research could build on Condon and Barrett (2013) in understanding why individuals experience

differing levels of compassion and also may help in understanding the reason why some people may experience a fear of compassion (Gilbert, et al. 2011). From a therapeutic point of view, through the discovery of specific barriers to equanimity, an individual can reflect and explore these isolated matters in greater depth. Moreover, a person-centred therapist is better able to facilitate this process via the identification of such barriers. In this way, work on compassion and other prosocial behaviours has more contextual relevance.

Such is the complexity of individual layers of judgement; the ways in which we judge needs to be carefully and methodologically assessed should one hope to develop positive qualities such as compassion and so forth. Therefore, the EBS is helpful in distinguishing these barriers in practice. Self-awareness is measured within mindfulness, yet little attention has been given solely to what judgements mean for an individual and how they might influence a person's ability to cultivate equanimity. In order for an individual to reach equanimity, first and foremost an individual must deconstruct their own barriers in practice.

Assessing barriers to practice is also significant when taking into consideration the potential negative consequences of mindfulness practice. For example, Finucane and Mercer (2006) reported that some participants became more distressed during meditation due to extreme negative past experience. Preventative work on reasons why an individual thinks and behaves the way they do may enable mindfulness teachers to facilitate sensitive discussions prior and post meditation. Again, this suggests the EBS may play a therapeutic role in person-centred development by facilitating discussion around barriers to practice.

The confirmed model of the EBS has resulted in a measure of barriers to equanimity that is; 1) developed from current mindfulness scales and 2) does not focus on one specific domain of judgement. Using this scale complimentary to current mindfulness scales, especially those that focus on attention and awareness will have the ability to provide a deeper level of context about individuals' experience. More significantly, individuals will be able to understand the current ways in which they formulate feeling tones and could act as a therapeutic tool in psychological development. In order to promote

wellbeing and self-development, overcoming barriers to equanimity presents one part of a healthy therapeutic process. This is significant to explore further as current scales predominantly focus on gathering data on attention or combine attention with non-judgement in one scale, and no scales measure the relative barriers to practice. As the EBS measures individuals' judgements using differing subscales, the behavior can be viewed in comparison, with subscales for attention, awareness or loving kindness. This would allow the contribution of each of these factors to be explored within both mindfulness and equanimity concepts. This allows a richer exploration of this construct and opens new doors in research.

Future Research

Although the EBS consisted of four factors, the relationship between innate, social, interactive and reflective ones demonstrate multiple correlating relationships. The EBS does not identify the strength of an individual's cultivation of equanimity and so separate scales will need to be developed for this. Future research should more closely identify questions relating to an individual's likes, dislikes and feelings of neutrality. Further, a significant outcome of the study concerns the lack of information gathered by innate and reflective judgment exemplified by the small number of items in the final model. This subsequently may deliver questionable reliability. Future research should endeavour to revise these subscales. At present, there is an EBS Spanish validation study ongoing by the University of Zaragoza [See Appendix C], and a Portuguese translation for a Brazilian population validation study by the University of Sao Paulo [See Appendix D].

Limitations

The present studies were conducted using relatively large sample sizes, however further opportunity samples in different demographics would be beneficial. Moreover, the empirical work did not capture test-retest reliability. Future research is suggested to examine whether the results represent distinct factors in more diverse samples. Similarly, although the results suggest an overarching theme of barriers to equanimity, the scale needs external validation. Study 4 will test differences between groups in relation to psychiatric health, given the scales onus on emotional regulation.

7.5 Conclusion

In conclusion, being able to measurably assess barriers to mindfulness practice via the multifaceted construct of equanimity has the potential for future research to investigate how individuals
might best achieve a calm state of non-judgment and compassion. In addition, for those already engaged
in mindfulness meditative practice, understanding specific barriers to equanimity may allow
mindfulness teachers to facilitate sensitive discussions prior and post meditation. This suggests the EBS
may play a diagnostic and therefore a therapeutic role in person-centred therapy and personal
development (Desbordes et al, 2015; Hadash et al, 2016; García-Campayo, Navarro-Gil & Demarzo,
2016). Future research needs to consider the complexity of equanimity judgments further by
investigating it in longitudinal studies as well as more diverse demographics. This supports further
research built on differentiating 'non-judgmental acceptance' within current mindfulness understanding
and proposes equanimity as a separate entity for future studies, however further extensive examination
of the scale is demonstrated in the following chapter, which is necessary in order to generalise these
initial findings

Chapter 8: Study 4: Evaluating the Discriminative validity of the Equanimity Barriers Scale [EBS]

8. Introduction to chapter

This chapter highlights the final exploration of the EBS in a community sample in relation to differences between groups. The chapter discusses the EBS in relation to mental-ill health in order to situate the scale within a broader context of health and wellbeing. The chapter discusses mental health and wellbeing in general before focusing on anxiety, depression and wellbeing. The chapter highlights four hypotheses that are to be tested before outlining the method and results in relation to each of the hypothesis. The EBS would be considered to have greater validity should the scale be able to discriminate between different populations. "Discriminant validity is evidenced by the extent to which a relevant behavior or other test response is performed differentially by specifically selected samples in accordance with expectations or hypothesized relationships among the selected groups." (Cicchhetti, 1994, p288). The chapter then discusses the findings in relation to the wider field of mental health and mindfulness.

8.1Introduction

The result of increased attention towards mental-ill health in the general population is a greater focus on psychological wellbeing. Since its inception in 1979, mindfulness-based stress reduction (MBSR) training has demonstrated efficacy in promoting health and wellbeing across a broad range of outcome measures (Gotink, et al 2015). Yet more recently, research has turned to the relatively unexplored construct of equanimity as a possible mediator of wellbeing. As mentioned earlier in the thesis, the 'how' and 'why' mindfulness results in such exceptional change is under supplementary investigation within mindfulness-based research (Desbordes, et al 2015; Weber, 2017; Weber & Lowe, 2018). Given equanimity has been relatively unexplored, the Equanimity Barriers Scale (EBS) was the first scale developed to address this gulf in research (Weber & Lowe, 2018). The authors hypothesise in this chapter that the EBS would correlate positively with wellbeing and negatively with anxiety and

depression because equanimity is closely related to emotional regulation and mindfulness. It is predicted that the scale will highlight differences between groups in relation to those with high or low anxiety and/ or depression. Variation among the population's mental wellbeing would demonstrate how the barriers to equanimity are more prevalent in anxiety and depression and less prevalent amongst those with better mental wellbeing.

The National Comorbidity Survey Replication (NCS-R) demonstrated that anxiety disorders are the most prevalent class of mental disorders in the general population (Kessler, et al 2005). Despite the availability of treatment, only a minority of patients with anxiety are recognised in primary care and 41% of patients report receiving no treatment (Kroenke, et al 2007). More recently, according to the UK National Health Service (NHS), generalised anxiety disorder is estimated to affect up to 5% of the population (NHS UK, 2018). Although there have been numerous anxiety assessment tools, the Generalized Anxiety Disorder Assessment scale (GAD-7) was developed in order to embody a robust screening tool for detecting generalised anxiety disorder in clinical settings and has been also found to detect panic disorder, social anxiety disorder, and posttraumatic stress disorder (Kroenke, et al 2007).

Additionally, depression is one of the leading causes of disability worldwide and contributes to decreased functioning and a diminished quality of life (Moussavi, et al 2007). A recent NHS report stated that depression affects around 1 in 10 people and studies show that about 4% of children aged 5-15 in the UK are anxious or depressed (NHS, 2018). One in five older adults is affected with depression and/or anxiety and needs professional help (Gaysina, et al 2019). The Patient Health Questionnaire (PHQ-9) was developed as a preliminary tool to screen for not only depression but also sub-threshold depressive disorder in the general population (Martin, et al 2006). Therefore, observing the correlations of the EBS with the PHQ-9 increases clarity towards equanimity's relationship with depression and general mentail-ill health. In order to examine this relationship further, the EBS was also measured against the Short Form Warwick-Edinburgh Mental Wellbeing Scale (SWEMWBS).

The EBS has not yet been tested outside a university setting. Thus, it was necessary to

investigate the reliability and validity of this new instrument in the general population. Study 4 aimed to investigate the reliability and validity of the EBS in a large representative sample. Convergent validity for the EBS was assessed in the general population by investigating associations between the EBS and the aforementioned self-report measures.

The above three chapters have demonstrated sound psychometric properties and validity in relation to the Mindfulness Attention Awareness Scale (MAAS) (Brown & Ryan, 2003), the Big Five Inventory-10 (BFI-10) (Rammstedt & John, 2007), the Self-Compassion Scale Short Form (SCS-SF) (Raes, et al. 2011), the Difficulty in Emotional Regulation Scale Short Form (DERS-SF) (Kaufman, et al. 2015) and the Emotional Regulation Questionnaire (ERQ) (Gross & John, 2003). However, this study seeks to further explore the EBS in relation to differences between groups in relation to mental-ill health. Given the hypothesis that equanimity relates to mental-ill health, is was necessary to determine how this particular construct may be further correlated with anxiety (GAD-7), depression (PHQ-9) and general wellbeing (SWEMWBS).

Hypotheses

This external validation demonstrates the differences between equanimity, anxiety and depression, which is both pertinent and timely. The following hypotheses were tested:

- 1) Firstly, high scorers on the Generalized Anxiety Disorder Assessment (GAD-7) will score significantly higher on the Equanimity Barriers Scale (EBS) than low scorers on the GAD-7.
- 2) Secondly, high scorers on the Patient Health Questionnaire (PHQ-9) will score significantly higher on the EBS than low scorers on the PHQ-9.
- 3) Thirdly, high scorers on the Short Form Warwick-Edinburgh Mental Wellbeing Scale (SWEMSWBS) will score significantly lower on the EBS than low scorers on the SWEMWBS.
- **4**) The final hypothesis is that those who are older will have significantly lower scores on the EBS than younger participants.

8.2 Study 4 Method

Design

In total, 327 records were completed in Google Forms and an initial screening for anomalies took place. All records were fully completed and therefore utilised in the study. Records were transferred into SPSS v23 through Microsoft Excel.

Participants and Procedure

Participants were recruited via opportunity sampling, comprising 327 from online social media platforms (105 males, 32.1%, 217 females, 66.4%, 1 non-binary, .3% and 2 transgender, 6%). Ages ranged from 18 to 69 years old (mean = 30.24; SD = 9.52). An online questionnaire was published using Google Forms and promoted. Upon providing consent, participants completed demographic questions about age, gender, ethnicity and religious orientation, as well as the 39-item questionnaire encompassing all the scales described next.

Measures

GAD-7

In addition to the 15-item EBS the following measures were administered. The seven item GAD-7 has good reliability, criterion, factorial and procedural validity (Spitzer, et al 2006) and has been utilised in a wide variety of intervention studies (Anderson, et al 2014; Christensen, et al 2011). It has been translated and validated in different countries (García-Campayo et al., 2010; Zeng et al, 2013). The scale was chosen as it focuses solely on anxiety and states that those who score above 10 are likely to have Generalized Anxiety Disorder.

PHQ-9

The PHQ-9 is a valid and reliable measure of depression severity (Kroenke, et al 2001). The PHQ-9 has also been translated and validated in different countries (Lowe, et al 2002) and utilised in a variety of

clinical settings (Henkel, et al 2003; Rief, et al 2004). This scale was chosen as it is based on the DSM-IV-R criteria for major depressive disorder. Those who score above 10 are said to be moderately to severely depressed.

SWEMWBS

The SWEMWBS is a short version of the Warwick–Edinburgh Mental Well-being Scale (WEMWBS). The WEMWBS was developed to measure mental wellbeing in the general population. The SWEMWBS uses seven of the WEMWBS's 14 statements about thoughts and feelings. The SWEMWBS showed adequate internal consistency and reliability in a study examining its use in Norway and Sweden (Haver, et al 2015).

8.3 Results

The purpose of this study was to assess how the EBS identified differences between groups of high and low scorers with the theoretically overlapping constructs of anxiety, depression and mental wellbeing. This would add to the discriminative validity of the EBS also that it would be applied to a more diverse population. Application of Bonferonni corrections controlled for multiple comparisons and ensured statistical differences between groups were more robust. Normalisation was confirmed and so independent samples "t-tests" tests were used to compare group differences. Effect sizes were then calculated to assess the strength of the differences between groups using Hedges' "g." This was used as it allows for different sample sizes.

Hypothesis 1: High scorers on the Generalized Anxiety Disorder Assessment [GAD7] (those with scores of 10 or more) will have significantly higher scores on the EBS, than low scorers on the GAD-7.

 Table 1.

 Comparison of high and low anxiety scorers on the EBS

GAD-7	High Anxiety (n=123)	Low Anxiety (n=193)	Significance	Effect size
EBS Innate	9.69	8.64	t = -3.194, df = 319, p = .002	.37
EBS Social	20.36	18.00	t = -3.125, df = 318, p= .002	.36
EBS Interactive	32.26	26.37	t = -8.249, df = 317, p = .001	.94
EBS Reflective	10.11	8.90	t = -3.681, df = 317, p= 001	.42
EBS Total	72.48	62.08	t = -6.533, df = 314, p = .001	.75
	(p values should be below the criterion of p = .01)			

The GAD-7 states those who score above 10 on the scale are more likely to have Generalised Anxiety Disorder. Therefore, those who scored 10 or above (n=126) and those who reported scores of 9 or below (n=196), were split into groups recoded into a High or Low GAD group and transformed in IBM SPSS v23. As five statistical comparisons were made, a Bonferonni adjustment was applied $.05 \div 5 = .01$. Independent Samples "t-tests" were then carried out and the more robust value of p = .01 was set as the minimum level for detecting significance. All five comparisons were below the criterion of p = .01. The effect size was calculated for each z score and ranged from .37 to .94. **This hypothesis is supported.**

Hypothesis 2. High scorers on the Patient Health Questionnaire (PHQ-9), those with scores of 10 or more, will have significantly higher scores on the Equanimity Barriers Scale than lower scorers.

The PHQ-9 states that those who score 10 or above are moderately to severely clinically depressed (n=129) and those who score lower than this (n=185) are classified as not clinically depressed. Independent samples t-tests were calculated for all five comparisons, again with the Bonferonni coefficient set at p = .01. Again, all five comparisons were significant. Effect sizes ranged from .34 to .91. **This hypothesis is supported.**

 Table 2.

 Comparison of high and low depression scorers on the EBS

PHQ-9	High depression (n=123)	Low depression (n=193)	Significance	Effect size
EBS Innate	9.60	8.60	t = -3.025, df = 318, p = .003	.34
EBS Social	20.34	18.08	t = -3.006, df = 317, p = .001	.34
EBS Interactive	32.02	26.30	t = -7.963, df = 315, p= .001	.91
EBS Reflective	10.14	8.87	t = -3.877, df = 317, p = .001	.44
EBS Total	72.15	62.12	t = -6.322, df = 312, p = .001	.73
			(p values should be below the criterion of p = .01)	

Hypothesis 3: Thirdly, high scorers on the Short Form Warwick-Edinburgh Mental Wellbeing scale

(SWEMSWBS) will score significantly lower on the Equanimity Barriers Scale than low scorers. There are no specific cut-offs for high and low scorers on the SWEMWBS. The groups were divided into those scoring low on wellbeing 10 - 21 (n=128) and those who reported higher wellbeing 22-35 (n=188). On this occasion all five comparisons were below the criterion of p = .01. Effect sizes ranged from .30 to .85. **This hypothesis is supported.**

Table 3.

Comparison of high and low mental wellbeing scorers on the EBS

SWEMWBS	High wellbeing (n=123)	Low wellbeing (n=193)	Significance	Effect size
EBS Innate	8.64	9.52	t = 2.662 df = 320, p = .008.	.30
EBS Social	18.10	20.09	t = 2.650, df = 319, p = .008	.30
EBS Interactive	26.47	31.83	t = 7.412, df = 317, p = .001	.85
EBS Reflective	8.96	9.98	t = 3.068, df = 319, p = .002	.35
EBS Total	62.39	71.50	t = 5.686, df = 314, p = .001	.65

(p values should be below the criterion of p = .01)

Hypothesis 4: The fourth and final hypothesis is that those who are older will score significantly lower on the Equanimity Barriers Scale than younger participants. Of the five comparisons, four were below the criterion value. Effect sizes were lower, ranging from .05 to .41. **This hypothesis was partially supported.**

Table 4.

Comparison of high and low age groups on the EBS

AGE	High Age (n=132)	Low Age (n=137)	Significance	Effect size
EBS Innate	9.07	8.92	t = .428, df = 270, p = .669	.05
EBS Social	20.00	17.78	t = 2.729, df = 269, p = .007	.33
EBS Interactive	29.90	27.05	t = 3.374, df = 268, p = .001	.41
EBS Reflective	9.71	8.73	t = 2.726, df = 269, p = .007	.33
EBS Total	68.73	62.70	t = 3.325, df = 265, p = .001	.41
		(p values should be below the criterion of p = .01)		

PostHoc analysis

Linear regression analysis was also performed to examine how much variance the GAD-7, PHQ-9 and SFWEMWBS accounted for. The results demonstrate that these three scales predicted 19% of the variance in EBS scores with only the GAD-7 being a significant predictor (p=.006). The PHQ-9 (p =.053) and SFWEMWBS (p=.330) did not reach significance.

Table 5.

Regression analysis of the EBS

Model	<u>Unstandardise</u> B	d Coefficients Std.Error	Standardised Coefficients Beta	Т	Sig.
1 (Constant) GAD7 total	57.131 1.139	1.355 .142	.418	42.158 8.040	.001 .001
2 (constant) GAD7 total PHQ9 total	56.308 .705 .518	1.378 .216 .197	.259 .209	40.856 3.258 2.632	.001 .001 .009
3 (constant) GAD7 total PHQ9 total EBS total	62.970 .636 .425 234	6.962 .228 .219 .240	.233 .171 078	9.044 2.790 1.939 976	.001 .006 .053 .330

Discussion

The aim of this research was to enhance the discriminative validity of a scale that measures barriers to equanimity. It is known that mindfulness co-varies with psychological well-being and mental health. A meta-analysis confirms that mindfulness-based interventions (MBIs) are effective in treating anxiety and mood disorders and reduce anxious and depressive symptoms (Hofmann et al, 2010). As mentioned earlier little explicit focus has been given towards non-judgmental acceptance characteristics of mindfulness and the concept of equanimity is often overlooked (Desbordes et al, 2015).

Results from this study confirm the convergent validity of the EBS with regard to mental-ill health. This highlights the significant relationships between equanimity and mental stability. Equanimity toward one's own experience relates to healthy emotional regulation and could be argued to have a

similar effect to that of self-compassion when taking into consideration results from Chapter 7. Indeed, this would align with previous research that identified self-compassion as a more robust predictor of psychological health than mindfulness. Van Dam et al. (2011) demonstrated how self-compassion may be an important component for anxiety and depression in MBIs.

In relation to depression, those who score higher on the PHQ-9 are likely to face greater barriers to equanimity. This supports previous research (Keenan et al., 2009), who found that disinhibited expression of negative emotion is associated with depression and inhibited expression may be a relevant deficit in emotion regulation in the development of depression in females. In consideration with the results from Chapter 7, it could be assumed that the practice of equanimity may mediate against the development of depression via healthy emotional regulation.

Indeed, Didonna (2009) demonstrates how anxiety-related psychopathology is characterised by a desire to avoid the inner experience of fear. The authors suppose mindfulness promotes a wise and accepting relationship with one's internal cognitive, emotional, and physical experience, even during times of intense fear or worry. The association between the GAD-7 and EBS further demonstrates this. The results of this study suggest that equanimity may play a central role in mindfulness efficacy given the implicit overlap between constructs. Thus, the fine tuning of the therapeutic quality of MBIs via the multi-faceted construct of equanimity may play a key role in the improvement of clinical and non-clinical interventions. Moreover, assessing barriers to equanimity is particularly useful when taking into consideration the possible maladaptive consequences of mindfulness. Further research with equanimity as a central construct seeks to answer the questions related to how and why mindfulness interventions result in such prosocial change (Chiesa, et al. 2014; Gu, et al., 2015; Holzel et al. 2011).

Recent research seeks to connect mindfulness with prosocial qualities such as compassion towards others (Gilbert, 2017; Soysa and Wilcomb 2015). The connection between mindfulness, equanimity and compassion that is highlighted in Buddhism is also demonstrated for the first time in a Western

context. "We shed all discrimination and prejudice, and remove all boundaries between ourselves and others," ... "In a conflict, even though we are deeply concerned, we remain impartial, able to love and to understand both sides." (Thicht Naht Hanh, p. 162). This further promotes equanimity as a skill that endorses social change and conflict resolution.

8.5 Future Research

It is important to test the EBS in an intervention setting in both clinical and non-clinical environments. Further, given the breadth of mindfulness research, interventions should consider using the EBS alongside previously validated mindfulness scales. It is also important to measure the link between the EBS and mindfulness scales in a meditating and non-meditating population. Further, it is important to capture the level of mindfulness practice and years of experience. Moreover, the scale should be measured alongside instruments that assess positive mental states such as compassion in order to ascertain whether the cultivation of equanimity leads to the development of positive mental states. As previously highlighted (Weber & Lowe, 2018), the EBS does not identify the strength of an individual's cultivation of equanimity and so distinct scales will need to be developed for this. Finally, equanimity intervention studies are needed to explore the efficacy of mindfulness and equanimity theory and meditation in practice. This could be further enhanced via the use of EEG in order to capture the efficacy of equanimity level. at a neural

8.6 Limitations

The present study was conducted using relatively large sample sizes, however further opportunity samples with different demographic groups would be beneficial. The use of convenience sampling raises the potentiality of sampling bias. Although this study makes claims around differences

between groups when split, the sample sizes arguably need more participants in order to demonstrate more robust differences between groups. In addition, it would have been beneficial to measure meditators /non-meditators in a longitudinal study. Moreover, translation studies and international studies will further enhance global generalisability of the EBS.

8.7 Conclusion

This external validation study has assisted the differentiation of 'non-judgmental acceptance' within existing mindfulness literature and isolates equanimity as a separate body for forthcoming research. The measurable difficulties towards mindfulness practice via barriers to equanimity demonstrates the obstacles one may face in achieving mental wellbeing. Thus, the EBS may play a therapeutic and investigative role in person-centered therapy and personal development, which suggests the therapeutic quality of mindfulness practice, is heightened via the underlying emotional regulatory mechanism of equanimity. In relation to mental-ill health, the knowledge of barriers to equanimity may assist practitioners in facilitating sensitive discussion with patients or service users. Subsequently, the EBS advocates the potential transition into the cultivation of mental wellbeing and lessening mental-ill health exemplified here by anxiety and depression.

Chapter 9: General Disucssion

9.0 Introduction to chapter

This chapter sheds light on the overall contribution of the EBS in relation to the wider field of mindfulness and psychotherapy. Whilst equanimity is suggested to be a pertinent topic in emotional regulation and exploration into self-concept, equanimity remains a relatively new area of interest and one that may raise some tentative questions for further exploration. A fundamental contribution of this thesis is the development and validation of the EBS that has withstood several reliability and validity assessments. Therefore, this thesis has provided a useful starting point for enquiry but is by no means definitive. This chapter seeks to outline the key questions raised in this thesis and seeks to summarise the results presented in the studies. The chapter also attempts to provide a summary of reflexivity in relation to the author's orientation of this thesis before discussing the limitations, applications, future research and implications. The chapter then provides a final conclusion

9.1 Synthesis of main research findings

The overall aim of this thesis was to refine the concept of equanimity and ascertain its applicability in Western psychology by examining the barriers that may present themselves in trying to achieve it. The thesis has produced one of the first two facing operational definitions of equanimity, the first systematic literature review examining equanimity in MBIs and has created and developed a cycle of judgement and naturally occurring ignorance in order to develop a scale to examine barriers to equanimity.

Although, the results cannot infer causality, the overall findings suggest that greater barriers to equanimity correlate with increased anxiety, depression and difficulties in emotional regulation, whereas lesser barriers to equanimity correlate with increased mental wellbeing, self-compassion and

mindfulness. Barriers to equanimity are also correlated with personality traits such as conscientiousness and agreeableness, whereas they are aggravated by neurotic traits.

More specifically, the more mindful a person is, the lesser the barriers to equanimity they face. In terms of emotional regulation, it was found that people with greater barriers to equanimity are likely to deploy negative coping strategies in times of emotional distress, be more impulsive and have the attitude of non-acceptance, whereas lesser barriers to equanimity suggests a person is better able to emotionally regulate via enhanced awareness, strategic goal setting and sharper clarity.

In relation to self-compassion, those with greater barriers to equanimity will have harsher self-judgements, more likelihood of self-isolation and become over-identified with experience. Whereas, those with lesser barriers to equanimity are likely to have greater mindfulness and more feelings of common humanity which are both key facets of self-compassion. Finally, those who report high generalised anxiety disorder and clinical depression will have higher barriers to equanimity and those with lesser barriers will have higher general mental wellbeing.

Research highlighting the linkage between mindfulness and equanimity is on the rise (Bajaj and Sengupta, 2018; Shoham, Hadash and Bernstein, 2018; Desbordes, et al 2015). The linkage with emotional regulation is significant given previous research. Research has shown that specific cognitive emotional regulation strategies are significant when taking into consideration the notion of internalising psychopathology (Garnefski, et al 2002; Garnefski, et al 2007). It has been commonly highlighted that strategies of self-blaming, catastrophising and rumination show strong significant relationships with depression in adolescents. More recently, Garnesfski and Kraaji (2016) studied 582 secondary school students cognitive emotional regulation strategies and confirmed the usefulness of the cognitive content-specificity model, in which anxiety is uniquely characterised by thoughts concerning the overestimation of threats and harm, and depression is supposed to be uniquely characterised by negative evaluations of self, and of past and future events.

An interesting finding was the correlation with the Big 5 inventory and the differences between barriers to equanimity and personality types. A congruency between personality and life stress is assumed to pose a particular risk for depression (Coyne & Whiffen, 1995). Ehret, Jooring and Berkman (2014) found that individual differences in self-criticism and self-compassion were related to depression status above and beyond additional potential correlates of major depressive disorder (i.e., perfectionistic beliefs and cognitions, rumination and overall adaptive emotion regulation). This supports the hypothesis that self-criticism and lack of self-compassion place certain individuals at increased risk for experiencing depression over the course of their lives.

Study 4 highlighted the linkages between the equanimity barriers scale and anxiety and depression. Several previous studies confirm the linkage between depression and self-criticism and dependency (Brewin & Firthcozens, 1997). Anxiety and depression improve with mindfulness training. This is confirmed via recent research exploring the efficacy of mindfulness in relation to depression and anxiety (Hearn, Cotter and Finley, 2019). Indeed, Chung and Ng (2018) highlight the underpinning role of awareness, acceptance, impulse control and emotional regulation play in reducing symptoms of depression and anxiety.

The more mental wellbeing a person has, the less barriers to equanimity they report. This supports previous research examining the nature of meditation mindfulness training in relation to wellbeing. Baer, Lykins and Peters (2012) found that in comparison to 75 demographically matched non-meditators, meditators has significantly improved wellbeing.

An interesting area touched upon was the relationship between the equanimity barriers scale, self-compassion and age. Indeed, Neff (2003) found a significant negative correlation between self-compassion and self-criticism, anxiety and depression. Age is a significant factor when considering the quality of self-compassion and wellbeing across lifespans (Phillps & Ferguson, 2013). The significance of age and its correlation with self-compassion is confirmed by Stapleton, Richardson and Kalla (2018), whom found that self-compassion was significantly higher in older adults in relation to wellbeing. This is affirmed by Neff (2011) theory that self-compassion links with aging due to Erikson's stages of

generativity versus stagnation and ego integrity versus despair. Indeed, ego integrity incorporates wisdom and self-compassion (Neff, 2011). There is a link between self-compassion and wellbeing (life satisfaction, emotional intelligence, wisdom etc.) (Sirois, 2014; Terry, Leary and Mehta, 2013).

9.2 General findings and implications

The scoping review of the literature highlighted where and to what extent equanimity has its place. This exploration suggests equanimity plays a vital role in emotional regulation and the generation of positive mental states. Based on the review, two key conclusions echoed this sentiment. Firstly, equanimity may be interrelated and implicitly relevant in the fields of mindfulness, self-compassion and compassion, within spirituality and self-concept. Secondly, there has been no widely accepted and explicitly tested theoretical underpinning, operational definition or psychometric scale to measure this construct. This brings together a more generalised search into equanimity towards core questions and gaps in knowledge.

Thus, after conducting the systematic literature review two central questions emanated. Firstly, how well established was equanimity recognised in MBIs and secondly, how effective has this construct been set up for psychometric measurement. These questions enabled the development of a model of judgement that seeks to theorise the ways in which we formulate judgements and feeling tones. This model of judgement helped the initial design of a questionnaire to measure judgements of human interaction. The development of the EBS is the first psychometric scale relevant specifically to barriers to equanimity. This thesis adds to the body of knowledge relevant to this broader conceptual framework and may provide crucial parameters for further enquiry.

This thesis found that in comparison to mindfulness, the concept of equanimity was largely ignored, and often implied under different labels. There is no robust body of knowledge generally accepting this concept, thus equanimity has different contextual meanings and relevance in contemporary research and practice. This has several implications such as the potential for

misinterpretation of its understanding and relevance in modern day mindfulness interventions, which suggests an appropriation of the usefulness of its application. Further, it could mean that mindfulness interventions that do not spend significant time developing this facet and as such, practitioners miss out on a crucial element of mindfulness's meanings.

Alternatively, a lack of understanding of equanimity could restrict it to simply open acceptance to all phenomena without discernment; which has potentially dire consequences when considering moral and ethical concerns. It is more pertinent to suggest equanimity allows for discernment via full awareness, but that within the context of self not being attached or averse to the discernment, one is able with patience to allow the fluidity and transience of time to pass. Whilst discernment and judgement remain a fundamental hallmark of the human condition, equanimity acknowledges this, but with awareness does not hold the self to such emotive parameters. Failing this, it could be suggested we are restricting moral and ethical intonations via an intention of non-judgement. It is not judgement that is 'wrong' per se, it is the self-attached to the identified constructs of good, bad, neutral that embed the individual within a specific context that pose the potentiality for distortion; should an individual's governance remain self-interest and emotion.

In responding to our own mind's reactivity with equanimity, we grow our ability to extend this outwards to all our relationships and beyond. At a recent conference in Zaragoza, Kabat-Zinn (2018) stated that mindfulness without 'kindfulness' or 'heartfulness' is not mindfulness implying the roots of mindfulness goes beyond self to developing care for others. At present, mindfulness is a potent form of stress reduction and a tool for building acceptance and resilience toward experience as well as providing therapeutic merit in a variety of clinical settings. However, it perhaps falls short of capturing some of the fullest qualities such as developing compassion and equanimity which would further fine tune the therapeutic process.

On the opposite side of this remains the possibility that MBIs are perhaps restricting themselves both in a quality and therapeutic sense. Due to the current lack of emphasis on equanimity, there is no quality control about the teachings, or whether this is focused on via distinct meditations. On a research

level, this has meant many of the scales developed for mindfulness do not capture equanimity in any sense of the word, and as such, we are unable to make predictions about its usefulness or applicability in a Western setting. Therefore, mindfulness practitioners are not being adequately measured, progress is perhaps distorted, and potential further research is subsequently restricted. For example, the possibility that mindfulness leads to the cultivation of positive mental states is tentative and as such requires further research into equanimity as a possible mediator.

This was in order to scrutinise whether the scale did indeed capture elements theorised missing in existing mindfulness scales. The central theme of this thesis was to further examine how and why mindfulness results in prosocial change (Chiesa, et al. 2014; Gu, et al., 2015; Holzel et al. 2011). Thus, results indicating differentiation in individual's barriers to equanimity in direct relation to mindfulness and psychiatric health support previously published knowledge in this area (Desrossiers, et al 2013; Finance & Mercer, 2006; Kropp & Sedlemeier, 2019).

The thesis raised the question that there were no explicitly aimed psychometric scales to measure equanimity. Thus, the development and validation of the barriers to equanimity scale have provided a useful starting point to explore this construct further. The thesis has shown that barriers to equanimity correspond with emotional regulation. Those who are able to regulate are in a sense harnessing inner equanimity. There is also clear links with self-compassion, showing someone who is more self-compassionate has reduced barriers to equanimity. The final study highlights how an individual who has anxiety has more barriers to equanimity. This is the same as saying; someone who has equanimity will have more equanimity. This was the same as with depression. Finally, these results are confirmed via the results with greater wellbeing. Those who report greater wellbeing score significantly less barriers to equanimity. These results highlight the usefulness of the EBS in conceptually mapping out individuals starting points for the development of equanimity. It highlights the ways in which mindfulness practice can be further enhanced in the therapeutic sense.

The scale in essence focuses on the construction of 'self'. The (interactive and social) look towards the social construction of T and the innate and reflective domains focus on the T from its own projected side. Those two domains are Buddhist inspired. The scale represents the fabrication of a solid and fixed sense of self - cultivating equanimity being a huge step in ultimately realising this. Thus, Tich Nhat Hanh's famous metaphor of equanimity being like standing at the top of the mountain and viewing it all objectively (free from likes and dislikes/attachments/aversions) then enables you to drop the ego. Therefore, items that show how things alter the feelings toward sense of self thus become barriers to equanimity. The domains are supposed to capture the holistic human condition.

The overarching hypothesis being equanimity as a construct is integral to the emotionally regulative faculties that subsequently enable the cultivation of positive mental states. Further exploration into barriers to equanimity would enable a thorough examination into the underlying reasons of why mindfulness is effective in individuals. This could also explain why some people find mindfulness more difficult than others and offers explanation into the nature of individual differences and meditation practice. The thesis also simultaneously enhances the efficacy of equanimity in mindfulness interventions by narrowing in on facets of non-judgement, acceptance and openness and by producing a practical psychometric scale. This both aids future research and practice. Only via a thorough examination of the underlying reasons of what makes mindfulness so effective are we able to accurately assess individual growth and potential transformation. Questions in relation to the reasons why positive mental states are produced are seemingly answered via barriers to equanimity that mitigate the potential benefit of mindfulness practice.

As mindfulness/equanimity is part of a therapeutic approach to health and wellbeing, a narrower examination of the questions in relation to psychiatric health was essential. Thus, the thesis original

contribution to knowledge was the development and validation of the Equanimity Barriers Scale, which supports the gap in knowledge identified in the preliminary chapters of this thesis.

9.3 Encapsulating Equanimity in a clinical setting

The following approaches are put forward as encapsulating the spirit of the construct.

- With the ability to monitor one's own discernment towards experience/others and patiently withhold from reaction
- With the ability to be aware of one's own mental discernment yet not necessarily hold this as a true representation
- With the ability to remain calm in times of conflict
- With the wish that everyone is equally benefitted.
- Even tempered towards all people, in the sense of even when helping, not becoming too involved or not being too indifferent.
- Expanding tranquility and even-mindedness towards happiness and unhappiness, pleasure and pain, in all circumstances, such as when meeting friends and enemies.
- Lessening of attachment, repulsion, and indifference toward others, and without feelings of some being close and others distant.
- Extending feelings of love, compassion, and joy equally to everyone, without consideration of friends, enemies and strangers.
- Remaining steadfast, open and present in our interactions in daily life without wishing anything different (Weber, 2019)

At present, mindfulness has been implemented well by clinical psychologists and research continues to show promising results. However, as a method of fine tuning the quality of practice, it is perhaps pertinent to turn towards equanimity. Making equanimity explicit would enable a thorough dissection of individual nuances in relation to mental discernment. In practice, exploring barriers to

equanimity (Weber & Lowe, 2018) would enable an individual to conceptually map out the potential obstacles to practice, which would subsequently improve the therapeutic process. A clearer understanding of equanimity would enable practitioners to further develop the non-judgmental facets taught in mindfulness and experienced during mediation.

After all, mindfulness and meditation are individual practices and the breadth of human experience, suggests it will not yield the same results for everyone. There are some of examples of mindfulness causing distress (Finucane & Mercer, 2006; Foster 2015). Therefore, exploring why we think and behave the way we do seemingly relies on a closer inspection of our own unique mental discrimination faculties. In order to support healthy adaptive change, it is important to consider our individual barriers to practice, thus the therapeutic process relies on sensitive discussions. It is perhaps worth questioning whether this cannot be done without a clear understanding of equanimity.

Equanimity is entwined into every part of mindfulness-based programs. The ability to be equally present with the spectrum of feelings is taught. Subsequently, researchers and psychologists would benefit from this clearer operational definition, in order to fully explore the therapeutic potentiality of equanimity in mindfulness. This primary lesson of equanimity suggests it is not the experience that knock us off balance and leads us to be overwhelmed, but our reactions to those events. Thus, focusing on individual reactions and nuances can only be measured effectively via the correct instruments.

Equanimity can act as effective self-emotional regulation, which aligns the therapeutic element of mindfulness programmes of self-awareness and self-compassion. Secondly, equanimity as a springboard for the development of positive mental states aligns with the compassionate drive of mindfulness. Finally, as a tool for authentic and compassionate response in varying contexts would benefit wider social cohesion and counter maladaptive psychological affect.

9.4 Equanimity Meditation – cultivating positive mental states

One of the main themes in this thesis is barriers to equanimity, however there is little to mention how to overcome these obstacles. A key element of mindfulness is experiential insight via meditation practice (Kabat-Zinn, 1993). However, at present mindfulness meditation remains focused on breath awareness and the body scan with some compassion-orientated meditations. However, as this thesis has highlighted, potentially none on equanimity itself. In Tibetan Buddhism, equanimity although also considered in great depth is predominantly cultivated via its own specific meditation practice (Zopa, 1993).

Below is an example equanimity meditation that could be adapted for contemporary mindfulness programmes:

Sit in a comfortable meditation posture. Follow your breath until you feel centered and grounded. Meditate on three people separately (a loved one, an enemy, and a neutral person), examining and correcting your feelings toward them. Each time you bring them to mind you begin a mental journey into the reasons why you may like them, what they do for you etc. Then contemplate whether these relationships are permanent and if they did things uncharacteristically how would that make you feel. What if the friend did something you disliked for example? The stranger becoming too close? One by one, take the individuals in turn and focus on how these individuals may change places. Friends become enemies, strangers become friends etc. Doing this one by one mindfully is a traditional Mahayana way of equanimity meditation and is gradually extended towards communities, nations and the entirety of sentient beings.

9.5 Limitations & future research

In the burgeoning field of mindfulness research, this thesis is limited by several factors. Firstly, studies have been published in the field of mindfulness that do discuss equanimity in greater precision. However, these have not been included in the thesis due to the theoretical nature and lack of empirical evidence. At present equanimity does seem to be given more kudos in mindfulness literature and so it

seems the field openly accepts equanimity as an interrelating concept that is worthy of inclusion. However, this thesis began in late 2015 and so may not have uncovered all relevant parameters. It may have been pertinent to do a more thorough review of existing psychometric measurements and incorporate all the potentially overlapping constructs. For example, constructs on compassion for others and empathy would have been useful. It is also noteworthy to mention as research into equanimity is in its infancy, developments in the way of EEG in order to measure this construct would be beneficial. It would be very relevant to establish psychologically, process wise, what is different for inner and outer equanimity.

The results are limited in relation to the thesis's chosen self-report measures and by the nature of self-report itself. Firstly, there are several issues with self-report questionnaires such as relying on the honesty of participants, the introspective ability of an individual and issues with conceptual understanding (Hoskin, 2012). These issues might be true for some of the feedback in these studies given the wide variety of student population, issues concerning social desirability and the fact that a questionnaire evaluating an individual's judgmental tones relies on an individual's introspective skills. The concept of equanimity can be confusing and so even with the questionnaires attempt at capturing a person's 'likes', 'dislikes' or 'neutrality' towards phenomenon, this too might have been conceptually misunderstood or confused.

When considering some of the measures, it must be noted that the psychometrics chosen are not without limitation. The MAAS for example, is limited as a mindfulness measure as it appears only to capture attention or awareness. One study found that some items in the MAAS did not function well as indicators for a single latent construct (Cordon & Finney, 2008) Further, studies have highlighted how correlations between the MAAS and other mindfulness instruments, such as the FMI, CAMS-R AND KIMS were weak to moderate (Christopher & Gilbert, 2010). Thus, it was perhaps more pertinent to choose a mindfulness measure that also captured non-judgement, acceptance or de-centering as these

constructs would have provided useful correlation feedback and also perhaps aided conceptual clarity as identified in chapter 1.

Moreover, in relation to the PHQ-9 few studies have investigated the criterion validity of the PHQ (Eack, Greeno & Bong-Jai, 2006) and many argue against the validity of diagnosis without structured clinician interviews (Löwe, et al 2004). Equally it could be argued that another measure could have been chosen instead of PHQ-9, for instance the Beck Depression Inventory (BDI) or the Centre for Epidemiological Studies Depression Scale (CES-D). The PHQ was chosen again for brevity as the BDI has 21 items and the CES-D 20 items. The PHQ-9 has also been used in many community surveys and each of the nine symptoms, maps onto the DSM IV criteria for major depressive disorder. In relation to the GAD-7, this measure has been criticised for not being culturally sensitive enough (Parkerson, et al 2015). Again, the GAD-7 has the advantage of being brief. The Spielberger State Trait Anxiety Inventory has 40 items. Both the PHQ-9 and the GAD-7 have been widely used in Britain, especially in the Improving Access to Psychological Therapy Services (IAPT).

Moreover, The Self-Compassion Scale, Short Form has been criticised for its psychometric properties. Even the author of the scale, Kristin Neff does not recommend using the six subscales on their own, but suggests that researchers are best using only the total score (Raes, Pommier and Neff, 2011) These are just some of the limitations of the specific measures used, that may affect the discriminant validity of the EBS.

There will also be contrasting views to what background equanimity is contextualised, given the wider variety of understanding of the term and its use in contemplative practice. However, it is hoped that the EBS comes from a place that correlates with all Buddhist traditions including contemporary mindfulness. In summary the main findings of this thesis are that the more barriers to equanimity that are found, the less mindful a person is, the more likely they are to suffer anxiety, depression and have less mental wellbeing. The less barriers to equanimity found, the more likely a

person is to be mindful, have self-compassion and less difficulties in emotional regulation. The results also indicate a person's personality type may play a role in whether a person faces more barriers to equanimity. Also, age was found as a correlating variable and so as a person becomes older, they face less barriers to equanimity. This would be interesting to measure with different demographics. This brings up a further question of whether there may be trait or state equanimity present which will have to be further examined.

EEG needs to be utilised in order to determine equanimity's effects on the brain. Meditators should focus on specific equanimity meditations as well as breath awareness and bodily sensation. It would be useful to extrapolate breath awareness and focus, to that of non-reactivity towards stimulus in order to capture specific brain function. The EBS will need to be translated further and tested in different countries with cultural sensitivity.

Further, there are no published psychometric scales that measure equanimity itself, so scales that directly give insight into an individual's likes, dislikes and neutralities will need to be adapted to compliment the EBS. However, there is one scale that has been developed in France called the 'Equanimity Scale' [EQUA-S] that is currently in review. The authors from the University of Clermont Auvergne have been in touch and wish to partake in a dual translation study to see how the Equanimity Scale works with the EBS [See Appendix E]. Moreover, the University of Zaragoza are conducting a validation study of the EBS in a Spanish-speaking population [See Appendix C] and the University of Sao Paulo are conducting a Portuguese speaking population study in Brazil [See Appendix D]. These projects are underway.

Perhaps the most pertinent exploration lays with the EQUA-S in France. Having reviewed the scale, although the items focus only on positive valence rather than displeasure and neutrality, research combining both the EBS and the EQUA-S would confirm whether the EBS correlates with equanimity in relation to positive feelings. This study will capture age, sex and country of participants and then importantly capture hours of mindfulness practices versus frequency and types of practices. The question that seems to warrant logical enquiry is whether equanimity increases mindfulness, or whether

a mindful mind increases an equanimeous relationship with emotions and external stimuli. Non-reactivity is a central construct and so decentration is perhaps a crucuial mechanism in the development of equanimity. However, caution must arise to dissociation or apathy given this sentiment.

Further studies should also consider how hedonic independence increases, whether this is due to behavioral de-conditioning via the non-reactive aspects of mindfulness or whether this is due to repetitive non-judgement and acceptance of daily life situations. This would be more akin to an evaluation element upon stimuli.

9.6 Reflexivity

In the beginning of this thesis there was reference made to my own background in relation to Buddhism and mindfulness. This was important given the concept of reflexivity in which an individual both constructs and is affected by the research in question. There is little doubt that in all research there is a risk of confirmation bias given the interrelated mechanisms of self, inquiry and empirical exploration. A researcher is not an unbiased instrument; however, special attention must be given to both recognise what I brought to the PhD proposal and how the research was subsequently affected.

Because I spent the early years of my life with Tibetan Buddhist cultural connotations, as well as being a typical white Western child from the North West of England, I have developed an epistemological lens that correlates the two and thus, see the world through this dual perspective. In the 1960s, the Tibetan Buddhist teachings that were filtered to a Western audience, were made as applicable to a Western lifestyle. These values consequently affected the lifestyles and choices made by my parents and as such affected my own values and beliefs that echoed the epistemological lens through which I came to see the world.

Thus, at beginning of this thesis it could be said that I already had an unconscious bias towards the value of equanimity in a Western setting. However, given the explosion of mindfulness it only

seemed logical to scrutinise equanimity in the same way. This is also, why the thesis took the path of barriers to equanimity and not equanimity itself. The idea being, if barriers were shown to be useful in a Western audience then this was a valuable pre-contemplation before venturing into equanimity itself. As a mindfulness practitioner, I have regularly maintained a meditation practice and remained contemplative towards equanimity. Thus, whilst I think it may be impossible to say whether I have become more equanimous, I have a deeper affinity with the concept and understanding of how it may be of benefit. Seeing barriers to equanimity has certainly helped me identify the level of neurosis within myself as I am now more consciously able to monitor my propensity for judgement and categorisation of phenomenon. If anything, it has given me a heightened sense of awareness towards my own biases, and as such I regularly practice equanimity by accepting my own mental projections as temporary and illusory. At best this process has built a layer of restraint and pause within me, so I try to respond with care and compassion rather than from autopilot. Naturally, this is a work in progress and is dependent on the strength of clarity of my mindfulness practice.

Chapter 10: Conclusion

"Where the Sanskrit had a one word term, the English explanation was a paragraph long. In refined areas of consciousness, English is pretty impoverished. Our language is great at emotions. We've got words for every shade of feeling. But for the fine details of the inner reaches of consciousness, it's hard to find words that really give an accurate and complete picture and that do not cause us to lose our way" (Amaro, 2003, p7).

This thesis has introduced the significance of equanimity in MBI's by reviewing relevant literature and honing in on fundamental questions. The thesis has introduced the first operational two facing definitions for both inner and outer equanimity. The thesis has conducted the first systematic literature review which highlighted the pragmatic need for the development of a tool to measure barriers to equanimity. This thesis has further developed and validated the first psychometric tool to do exactly this. The development and validation of such tool and analysis of results with associated measures enabled a critical discussion around the linkages with wellbeing and potential for future research.

The results of this thesis suggest the non-judgmental acceptance facets of mindfulness may be more effectively measured via barriers to equanimity. This affects how results of mindfulness research may be dismantled and proportioned against health and wellbeing conditions. Elements that are incorporated into mindfulness such as mind wandering and attentional facets should be differentiated from the curiosity, acceptance, and non-judgmental spheres, suggesting advancements in the field consider equanimity as a distinct and invaluable construct. Equanimity raises the significance of social conditioning upon an individual and demonstrates why individuals experience such diverse affects of mindfulness.

Within the field of health and wellbeing in order for further efficacy-based mindfulness interventions and research, equanimity must be brought to the forefront of current contemplation. Only

then, will the quality and depth of mindfulness be captured for individuals and only then can individual self-development can be adequately tracked.

Given the current plight of humanity, mindfulness should be taught through a social and critical lens. In order to mitigate any potential exploitation of mindfulness via neo-liberal consumerism and to situate mindfulness within an expansive form of person-centred development, equanimity lends itself to both individual transformation on a personal wellbeing sense and a more compassionate outlook on a collective level. It is here mindfulness and equanimity cuts across socio-economic boundaries and inequalities. After all, social and critical mindfulness that breeds extensive self-awareness becomes a platform to mediate between the self and other – the individual and the social. In this way equanimity moves beyond mindfulness to a more prosocial movement. In quieting the mind; an individual may experience a potential reordering of priorities and an ethical shift in awareness towards the cause and affect of ones actions. The true role of mindfulness perhaps mediates between individual acceptance and prosocial activism. In this sense it is perhaps pertinent to suggest mindfulness can move from the personal to the political. However, one must not forget that in Buddhism, mindfulness is only a segment of a much larger picture that includes the development of compassion and altruism and ultimately to evolve self. Equanimity explores how individual discrimination faculties solidify judgements and teaching around this enables an individual to lessen their cognitive rigidity and in turn build on unanimous compassion.

In a field, that demands relentless self-development, mindfulness practitioners should consider any practices that adequately engage in self-transformation and holistic development. Certainly, from a health perspective, one could argue societal wellbeing is dependent upon it. From a research perspective, scientifically rigorous instruments that accurately assess individual growth, compliment the backdrop of mindfulness interest and propel it into new directions. The fine-tuning of underlying mechanisms that support transformative change are a necessary way forward in both a research and practical context. How else is the development of consciousness going to be pontificated in order to further the search for meaning?

Summary of Publications

The following is a list of published work by the author during the course of the doctorate. Much of these works are cited in the text and therefore appear in the full bibliography that follows.

- Weber, J and Taylor, R (2016) Can a leopard change its spots: An investigation of mindfulness in relation to brain plasticity, *Person-centered and experiential* psychotherapies, vol. 15, 3, 221-234.
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Appendicies

Appendix A: Example information Sheet and consent form

Information sheet

Dear Participant,

My name is Joey Weber and I am currently a PhD student studying at the University of Bolton. As part of my thesis I am conducting this research study under the supervision of Dr Michelle Lowe.

I am interested in the processes associated with making judgements regarding others and situations. I am interested in what makes us engage in these judgements and ultimately suggest ways in which we, as a society, can become less judgmental. More specifically I am interested in equanimity as a state of non-judgement in relation to mindfulness practice.

This study is looking at the external validation of the Equanimity Barriers Scale [EBS] with previously validated scales in relation to Anxiety [GAD-7], depression [PHQ-9] and general wellbeing [SWEMWS]. This research will enable us to see the positive and negative correlations of the EBS in relation to anxiety, depression and wellbeing.

Participation in this study is voluntary and it involves completing a set of questionnaires. Should you wish not to participate, you simply return a non-completed questionnaire to the facilitator. You do not have to provide reasons for not participating.

Participation simply requires completing the questionnaires and returning these to the facilitator. After handing back the completed questionnaires you cannot withdraw from the study (i.e., these data will be used). By completing the questionnaires, you are consenting to me using the data you have provided.

Completed questionnaire data will be safely stored at the University of Bolton and will be kept anonymous and confidential. These data will be destroyed after 12 months.

Any further information you may require, please do not hesitate to contact myself (J.Weber@bolton.ac.uk), Dr Michelle Lowe (Michelle.lowe@bolton.ac.uk), or Professor Jerome Carson (J.Carson@bolton.ac.uk).

Thank you for your participation

In the very unlikely event of the issues raised by completing the questionnaires cause any form of distress, please contact the following:

Mind Sane

Telephone: 020 8519 2122 Telephone: 845-767-8000 (Mon-Sun 6pm –

http://www.mind.org.uk/

http://www.sane.org.uk/

Thank you for your attention,

Joey Weber

Consent Form
Completing this questionnaire is a way of providing the investigator with your consent to take part in the study. If you do not wish to take part within this study, then do NOT complete this questionnaire.
Please read through the following:
I am participating entirely voluntarily with this study.
• I understand that anonymity will be ensured and my information will be kept confidential.
• I understand my information will be retained for a further twelve months on completion of the dissertation.
 I confirm I have been provided with contact details of the support services in case I feel distressed.
 I know the only people who will see the data file will be Joey Weber and Professor Jerome Carson.
• I understand that I cannot withdraw from the study once the questionnaires have been completed and handed back to the facilitator.
Personal details please answer correctly:
Age: Gender:
What is your ethnic background?
☐ White (British, Scottish, Welsh, Irish) ☐ Asian (Pakistani, Bangeldeshi, Indian, Chinese) ☐ Black (British, Carribbean, African) ☐ Arab ☐ Mixed (White and Black Carribbean, White and Black African, White and Asian) Please state any other:
What is your religion? ☐ Athiest ☐ Christian ☐ Muslim ☐ Hindu ☐ Judaism ☐ Buddhist
Please state any other:

Participant number: _____

Appendix C: EBS Poster certificate 5th International Mindfulness Conference

5º Congreso Internacional MINDFULNESS del 20 al 23 de junio

World Trade Center Zaragoza C/ de Maria Zambrano, 31. 50018

Zaragoza **Spain** 2018













El Dr. Javier García Campayo, en calidad de Presidente del Comité Organizador del 5º Congreso Internacional de Mindfulness

CERTIFICA QUE

Joey Weber & Michelle Lowe

han presentado el siguiente póster en el 5º Congreso Internacional de Mindfulness, celebrado en Zaragoza del 20 al 23 de junio de 2018

Development and Validation of the Equanimity Barriers Scale [EBS]

A los efectos oportunos firmo el presente en Zaragoza a 23 de junio de 2018

Javier García Campayo Director del Congreso



