Acceptance and Mindfulness-Based Interventions Robert D. Zettle and Suzanne R. Gird

Wichita State University

## Abstract

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## Acceptance and Mindfulness-Based Interventions

During the latter part of the twentieth century, a number of psychotherapeutic approaches that represented an evolution of the conventions of traditional behavioral and cognitive-

approaches as one way to promote acceptance. It should be emphasized that acceptance is not merely the opposite of attempting to run away from or an indirect way to control unpleasant thoughts and other private events. Acceptance also is not viewed as an act of resignation or tolerance. Rather, acceptance is most usefully construed as a proactive effort to nonjudgmentally receive all of what is experienced from moment to moment, including otherwise unpleasant psychological events (Hayes et al., 2012).

Acceptance and mindfulness-based interventions (AMBI) are characteristic of what +  $D \setminus H \vee$  W H U P H G of Wg Kn H at for V of CBT G dz for yulshing them from their therapeutic predecessors. The so- F D O O H G <sup>3</sup> ldr behavior do behavior therapy emerged in the mid-twentieth century, and represented a paradigmatic shift away from the then-dominant psychoanalytic and humanistic treatment approaches. Based on classical and operant learning theory, early behavior therapy focused on applying the rigorous body of laboratory-based learning principles to effect changes in the form or content of behavioral problems (e.g., decreasing anxiety, reducing tantruming, etc.) (Hayes et al., 2011).

The emergence of cognitive science led, in the 1970s, to an emphasis on dysfunctional thinking (e.g., information processing, beliefs, etc.) as a putative major determinant of the development of sundry psychopathologies 7 K X V W K H <sup>3</sup> V H F R Q G Z D Y H <sup>2</sup>

WUHDWPHQW HIIRUWV RQ FKDQJLQJ D FOLHQW¶V UHODWLR depressing thoughts, rather than changing the content or form of these events.

As Hayes (2004) discusses, one of the defining characteristics of AMBI and other contextual CBT is an alteration of clinical focus. At the heart of both the first-wave behavior therapies and the ensuing cognitively-based second-wave therapies was a focus on first-order change; that is, directly changing the content or form (i.e., the topography) of problematic behaviors. While the target for modification shifted between the first and second generations of CBT, from problematic classically conditioned emotional reactions or overt operant behavior to maladaptive thinking, the two approaches shared a common emphasis on a first-order change strategy of replacing dysfunctional thoughts, feelings, and actions with more adaptive ones.

While not abandoning first-order change strategies completely, AMBI seek instead to alter the function of problematic thoughts and emotions behaviors by teaching clients new ways of relating to them. To do so, AMBI rely heavily on experiential in-session exercises and related homework assignments to develop and strengthen W K H <sup>3</sup> U H GkDlW LIRIQD KEISS W D Q F H and mindfulness. For example, the acquisition of alternative and more flexible ways of responding to depressing thoughts and affective states, in turn, ostensibly enables clients to engage in valued and vitalizing activities by surmounting such psychological barriers (Hayes, 2004).

## **ACT vs. MBCT Comparisons**

Because of space limitations, we are precluded from considering all but the most salient of the multiple dimensions across which ACT and MBCT could be compared and contrasted. **How ACT and MBCT Are Alike**  In our view, the most meaningful similarities between the two approaches are in their developmental histories and in the incorporation of mindfulness practices and exercises within each.

Parallel developmental histories. Although AC 7 ¶ V G H Y H O R S P H Q W D O K L V W R R I 0 % & 7 E \ D W O H D V W \H D U V E R W K K D Y H <sup>3</sup> F R P H R I D J H ´ I alternatives to traditional cognitive therapy (CT) of depression (Beck, Rush, Shaw, & Emery, 1979). Because ACT is grounded in functional contextualism (to be discussed in greater detail below), its development occurred in large measure in reaction to philosophical and theoretical misgivings about the causal status afforded private events more generally, and thinking in particular, within the second generation of CBT.

Unlike the conceptual and theoretical framework from which CT is derived (Beck, 1976), the contextualistic model of human functioning on which ACT is based does not regard thinking as a causal influence over emotional responding and overt activities (Hayes et al., 2012; Zettle,

) URP D EHKDYLRU DQDO\WLF FRQWH[WXDOLVWLF SHU environmental variables that at least in principle can be directly manipulated (Hayes & Brownstein, 1986; Skinner, 1974) in order to meet the scientific goals of both predicting and influencing behavior with sufficient precision, scope, and depth (Vilardaga, Hayes, Levin, & Muto, 2009), Thinking, like any other behavior, cannot be directly manipulated, but only influenced by altering the contextual variables of which it is a function. Thinking, however, is recognized within ACT as exerting considerable influence, in turn, over other behavior for at least two reasons, only one of which will be addressed at this juncture. Ruminating about why one is depressed, for example, may produce a coherent, socially-expressed narrative and set of reasons that helps maintain it. In short, a convincing story about why one is depressed that is shared socially may be a factor that functions to support continued depression (Zettle, 2007). We will address another reason why proponents of ACT see thinking as important, despite its noncausal status, a bit later in discussing relational frame theory.

Unlike the philosophical disputes that served as the impetus for the development of ACT, the development and elaboration of MBCT, based upon two converging factors, was more strategic and pragmatic 6 H J D O H W D O 7 K H I L U V W Z D V W K H V X J A mechanism of change had less to do with altering the content of depressive thoughts and more with fostering a decentering process through which clients adopt a new relationship with them (Ingram & Hollon, 1986). With the understanding that the mere occurrence of a thought is not evidence of its veracity, negative thoughts can be seen as transient cognitive phenomena that P D \ R U P D \ Q R W E H <sup>3</sup> W U X H ´ U D W K H U W K D Q D V Y D O L G U H I O I that adjustments can be made to CT-as-usual to place more emphasis on decentering and less on cognitive restructuring.

The second factor that contributed to the development of MBCT was an accumulating body of research highlighting the need to develop a maintenance form of CT as a means of relapse prevention (Segal et al., 2002, Ch. 2). Although a recent meta-analysis (Cuijpers et al., 2013) has further substantiated earlier findings (e.g., Simons, Murphy, Levine, & Wetzel, 1986) that CT clients are significantly less likely to relapse following treatment termination than those who have received pharmacotherapy, their relapse rates may still be as high as 30% during the following year (Hollon et al., 2005).

Insofar as ACT originated as a transdiagnostic approach, the degree to which its development constituted a reaction against the limitations of cognitive therapy of depression in particular, as opposed to CBT viewed more broadly, would perhaps appear to be more muted

than is the case with MBCT. This assessment, however, is tempered by a closer consideration of \$&7¶V KLVWRU\ = HWWOH ,WLV QRW E\PHUH KDSSHO following its inception in the early 1980s, what is today known as ACT was often referred to as <sup>3</sup>FRPSUHKHQVLYH GLVWDQFLQJ´r wheatHisMdW Oxdone commonly <sup>3</sup>'LVWDQFL WHUPHG DV <sup>3</sup>GHFHQWHULQJ´ ZLWKLQ 0%&7 6HJDO HW DO RULJLQDOO\EHHQ UHJDUGHG E\%HFN DV <sup>3</sup>WKH ILUVW (Hollon & Beck, 1979, p. 189) that enables process thought to contribute to it. Psychological flexibility, or the ability to make on-going EHKDYLRUDO DGMXVWPHQWV LQ RUGHU WR SXUVXH RQH¶V seen as essential for living a meaningful and fulfilled life (Hayes et al., 2012). Defusion is one of six interrelated processes thought to contribute to psychological flexibility with the others being: (a) acceptance, (b) present-moment awareness, (c) self-as-context, (d) chosen values, and (e) committed action. (Hayes, Luoma, Bond, Masuda, & Lillis, 2006). Further elaboration on what is meant by acceptance and present-moment awareness will be provided in the next section. Self-as-FRQWH[W ZLWKLQ WKH PRGHO RI SV\FKRORJLFDO IOH[L psychological experiences from a transcendent and invariant perspective (i.e., noticing who is paying attention in a particular way 'during mindfulness exercises). The last two processes UHIHU WR FODULI\LQJ RQH¶V YDOXHV DV Foking joaHing) afRiQJRLQJ engaging in behavior c RQVLVWHQW ZLWK WKHP H J UHDGLQJ D EHGV

Incorporation of mindfulness practices. Perhaps the most striking similarity between ACT and MBCT is that each, as already mentioned, has incorporated the approach to mindfulness popularized by Jon Kabat-Zinn (1990) and which has formed the basis for related programs for stress reduction (Kabat-Zinn et al., 1992; Miller, Fletcher, & Kabat-Zinn, 1995) and pain management (Kabat-Zinn, Lipworth, & Burney, 1985). While structured meditation plays a larger role in MBCT than ACT, mindfulness exercises and practices, regardless of the form they might take, presumably serve two shared purposes within both approaches. The first of these is the decentering or distancing/defusion function that enables clients to see their thoughts as mental events rather than a reflection of objective reality. As already discussed, this PLQLPL]HV WKH OLNHOLKRRG WKDW FOLHQWV ZLOO JHW <sup>3</sup>FI truthfulness of depressive thoughts. Findings from psychological (e.g., Raes & Williams, 2010) as well as neuroscience research (e.g., Berkovich-Ohana, Glicksohn, & Goldstein, 2012; Keune, Bostanov, Hautzinger, & Kotchoubey, 2013) suggest that mindfulness and rumination are opposing processes, such that strengthening one weakens the other.

Excessive

comprehensive discussions of each in Biglan and Hayes (1996) and Hayes et al. (2001), respectively.

Functional contextualism has emerged as an elaboration of contextualism as one of the four philosophies of science originally explicated by Stephen C. Pepper (1942). It regards all behavior, including thinking and feeling, as acts of the entire organism that are embedded as whole events within historical and situational contexts (Hayes, 1993). All behavior, as well as talk and analyses of it whether by clients, therapists, or psychologists, is viewed through a SUDJPDWLF <sup>3</sup>WUXWK FULWHULRQ ´ 7KDW LV <sup>3</sup>WUXWK´ LV GH <sup>3</sup>VXFFHVVIXO´ LQ DW-WaBd-g@al. @his ph@cdsHveYteHtehEsDo@h@automatic thoughts of clients in ACT. The more critical therapeutic question is not if a given thought UHIOHFWV H[WHUQDO UHDOLW\ EXW LI LW LQVWHDG LV <sup>3</sup>XV Evaluating thoughts from this perspective is not unique to ACT, but is emphasized to a greater degree than by other approaches such as CT.

RFT regards relational framing, or our ability to arbitrarily relate events to each other, as providing the basis for language and cognition as well as human suffering. As alluded to earlier, RFT also underscores why thinking is an important focus within ACT. According to RFT, one of the properties of language is its bidirectional nature. Because, loosely speaking, words stand for things and things can be described by words, we can, for example, think about and talk to ourselves about the loss of a loved one long after its occurrence. According to RFT, merely thinking about the death of a loved one can be just as emotionally painful as the loss itself was at the time of its occurrence because of another defining property of relational framing and language. Through the transformation of stimulus functions, the grief attached to the death is now transferred to the words used in thinking about it. Efforts to minimize such suffering by deliberately not thinking about it may be one factor that exacerbates normal grief into clinical depression (Zettle, 2007).

MBCT is less clearly tied to a given philosophical approach, such that its basis in any of 3HSSHU¶V ZRUOG K\SRWKHVHV LV GLIILFXOW WR VSHF SKLORVRSKLFDO IRXQGDWLRQ RI 0%&7 UHIOHFWV WKH EUR the way we perceive events largely determines how we feel about them and, in turn, how we EHKDYH' &KLHVD 0DOLQRZVNL S \$ZRUOG YLH2 to functional contextualism (Hayes & Brownstein, 1986) and is dominant in modern psychology LV WKDW RI PHFKDQLVPPH3QHVS/SHOUUHDOLVRPU <sup>3</sup>HDMSHWE HW DO see it, MBCT appears to fit best within this world view.

In CBT, for example, a model of depression may be proposed that specifies the relationship among thoughts, feelings, and overt behavior. According to Pepper, such models are to be understood in much the same way as machines, such as car engines, are. In doing so, differing models of the machine (i.e., of depression and the engine) may be hypothesized and SURSRVHG EHIRUH LW UX VGK INXIDVQ/IHVE/VE/QRMIGH-bDeF/KLated by the degree to which its predictions map on to what is actually found. Is the car engine indeed constructed in the way we expected when we literally take it apart, and does research on depression suggest that thoughts, feelings, and overt behavior relate to each other in the manner predicted by our model of it? To the extent that MBCT adheres to this correspondence-based truth criterion, it is much closer philosophically to Beckian cognitive therapy than it is to ACT.

Support for the inference that MBCT employs a mechanistic world view is provided by 6 H J D O H W D O & K Z K R G H V F U L E H W K H <sup>3</sup> P R G H V R I P L given mode of mind, when activated, determines information processing and leads the client who experiences recurrent depressive episodes to experience a disproportionate onslaught of negative automatic thoughts in response to slight increases in dysphoric mood. This recurrent activation of negative thinking patterns i Q UHVSRQVH WR VWUHVVRUV UHIHUUHG WF as a putative common diathesis among individuals susceptible to the development and recurrence RIGHSUHVVLRQ 6FKHU ,QJUDP 6HJDO outdolee6 HJDO H<sup>1</sup> the activity of the mind as continually shifting, recurring, or evolving patterns of interaction among its components ±a little like a car driven through a busy city undergoes a continuous VHTXHQFH RIJHDU VKLIWV ´)dUd? IPB001KistcoVeduCdDeQn00/fibm1Hariz6 RLQW V clients with the various modes their minds can assume and provide them with mindfulness skills DV D ZD\ RI <sup>3</sup>VKLIWLQJ´ EHWZHHQ <sup>3</sup>GRLQJ´ DQG <sup>3</sup>EHLQJ´ PRO

**Technical/methodological differences.** ACT and MBCT differ in the degree to which they emphasize a structured and meditative approach to mindfulness practices, as well as in the format in which they are delivered. In ACT, mindfulness practices are seen as one way of supporting open and centered response styles more generally and the process of present-moment awareness in particular. Other techniques that may serve the same purpose involve those used to activate the processes of acceptance and defusion, as well as other procedures that may strengthen moment-to-moment awareness, such as attentional training adapted from metacognitive therapy (Wells, 2000). Although ACT for depression has been evaluated in a group format (e.g., Zettle & Rains, 1989), it has ma commy e open applied10( indi)-3(vidln d)-11(y) at 3e.g.a With other clients, the amount of such training could approach, or even exceed, the standard dose provided

ZKDW GHJUHH \$&7 FRQWULEX, Whith Ghe Winking W Kould Se ExRendited BoP ¶ V VXFF a clinically depressed sample. The latter issue was addressed to some degree by a recent internet-based program combining behavioral activation (BA) and ACT offered to a Swedish community sample meeting diagnostic criteria for a major depressive episode (Carlbring et al., 2013). While a large between-group effect size on self-reported depression was obtained, it was in comparison to another waiting-list control condition, thus precluding the identification of what DFWLYH FRPSRQHQWV LIDQ\ IURP HLWKHU %\$ RU \$&7 DF

The third research approach taken most recently extending ACT in the treatment of depression has examined the impact of adding it to other services already being received by depressed subgroups. Folke, Parling, and Melin (2012), for example, reported that supplementing public health care and assistance Swedish workers receive during sick leave due to depression with one individual and five group sessions of ACT resulted in significant reductions in depressive symptoms and enhanced general health and quality of life. There were, however, no corresponding improvements in sick leave status or employment, at least over 18-month follow-XS VXJJHVWLQJ WKH DGYLVDELOLW\ RI HYDOXDWLC over a longer period of time.

More recently, a preliminary open trial additionally suggests promise in combining pharmacotherapy with an ACT-based program that also includes elements of BA in treatment of major depression with psychotic features (Gaudiano, Nowlan, Brown, Epstein-Lubow, & Miller, 2013). Specifically, a small treated group (N = 14) primarily of inpatients achieved clinically significant reductions in depressive and psychotic symptoms that were maintained through 3month follow-up. Further research is necessary to determine the specific contribution that the ACT-based program may have made to the comb LQHG WUHDWPHQW¶V VXFFHVV E both pharmacotherapy alone as well as the combination of the two with a larger clinical sample. While the three most recent approaches investigating ACT for depression have extended and adapted it as an intervention to serve both secondary and tertiary functions with a wider array of subclinical and clinical populations, this aggregate work, unfortunately, does little to add further WR WKH <sup>3</sup>PRGHVW′ HPSLULFDO VXSSRUW WkapdMar \$&7 DOUHDO depression (Society of Clinical Psychology).

**Process research.** From its inception, proponents of ACT have demonstrated a commitment to identify and further understand its mechanisms of action. Findings from studies of the processes of change support the view that therapeutic improvement in ACT is mediated by changes in processes distinct and specific to the model of psychological flexibility on which is it based. For example, a reanalysis (Hayes et al., 2006) of the first randomized clinical trial favoring a version of individual ACT over CT (Zettle & Hayes, 1986) showed that defusion, as assessed by reductions in the believability of negative automatic thoughts, fully mediated GLIIHUHQWLDO WUHDWPHQW RXWFR Rttelfity. DFFRUGLQJ WR 0D

therapeutic change in ACT than in CT (Forman, Chapman, et al., 2012). Particularly noteworthy given the focus of this chapter are additional findings that improvement in ACT is correlated ZLWK LQFUHDVHV LQ WKH <sup>3</sup>DFFHSWLQJ ZLWdKnRnXidWs dVIXGJPHQV mindfulness, as assessed by the Kentucky Inventory of Mindfulness Skills (KIMS, Baer, Smith, & Allen, 2004), whereas changes in CT are mediated instead by increases in observing and describing skills (Forman, Shaw, et al., 2012). Although r HVHDUFK RQ \$&7¶V PHFKDQL action has yielded interesting and impressive preliminary findings, the accumulation of a body of coherent work in this area has been limited by the failure of researchers to use common process measures with similar depressed

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in the MBCT+TAU groups, relative to TAU alone. While these relapse rates are slightly higher than those reported by Hollon et al. (2005) for clients treated with traditional CT, it should be recognized that differing client characteristics may account for these discrepant findings. There was a greater degree of variability in the number of prior depressive episodes (M = 2.4, SD = 2.6) for participants in the Hollon et al. study compared to the participants in the studies reviewed in the meta-analyses discussed above, all of whom had histories of three or more prior episodes.

As empirical support for MBCT as a depressive relapse-prevention intervention has accrued, investigations applying MBCT to other clinical issues and populations have begun to emerge. For example, in a meta-analysis by Hofmann, Sawyer, Witt, and Oh (2010), the effect of MBCT on secondary symptoms of depression in individuals with primary psychiatric (e.g., anxiety) or medical (e.g., hypothyroidism) diagnoses was examined, while another by Piet, Würtzen, and Zachariae (2012) examined the effect of mindfulness-based therapies, including MBCT, on depressive symptoms in adult cancer patients. These meta-analyses reported withincondition (pretreatment vs. posttreatment) effect sizes ranging from low to high for MBCT in reducing symptoms of depression.

MBCT has also been examined as a relapse-prevention approach for those with fewer than three prior major depressive episodes. To evaluate limitations on the preventive effects of MBCT, Geschwind, Peeters, Huibers, van Os, and Wichers (2012) compared adults with residual (i.e., subclinical) depressive symptoms and fewer than three prior depressive episodes with similar participants with a history of three or more depressive episodes. Both groups experienced significant and equivalent reductions in depressive symptoms from baseline to postintervention, with benefits maintained at 6-month and 1-year follow-up. These findings, taken together with

reactivity than those in the maintenance medication condition. The authors suggested that  $0\%\&7\PV$  IRFXV RQ DZDUHQHVV RI WKRXJKWV DV ZHOO DV W explain this discrepancy.

As previously discussed, cognitive reactivity is a theoretical diathesis for the recurrence of depressive symptoms and is thus a focus of MBCT (Segal et al, 2002). Van Rijsbergen and colleagues (2013) found support for a link between mood reactivity (i.e., a negative emotional response to stressors), rather that cognitive reactivity, and depressive symptoms and relapse. This study utilized a traditional CT protocol, in a preventative context, and thus cannot be directly compared to MBCT protocols. However, Britton, Shahar, Szepsenwol, and Jacobs (2012) found that participants with partially or fully remitted depression who participated in an MBCT program evidenced a quicker decrease in emotional reactivity relative to a wait-list control group, and that treatment impact on depressive symptoms was partially mediated by improved management of anxiety. As was noted in regard to the literature on the processes of change in ACT, inconsistencies in the methods used to assess the presence and severity of depressive symptoms, as well as mindfulness as a mediating or moderating variable, and the relative lack of methodological consistency between studies, have limited our ability to characterize the mechanisms of change associated with MBCT.

## **Future Directions**

Until now, as far as we know, there has been no research directly comparing ACT and MBCT perhaps related to their focus on different clinical populations and objectives. However, as both increasingly expand beyond their original bases of operation, it appears that there is a growing likelihood that they may eventually meet on some common clinical ground. This could occur in two ways. The possible preventive reach of ACT could be extended to the recurrence of

major depressive episodes within the same clinical populations for whom MBCT was developed. Alternatively, MBCT might be further developed and explored as another acceptance and mindfulness-based option, along with ACT, for treatment of active, acute episodes of depression.

Being able to evaluate the application of ACT and MBCT in randomized trials with a shared clinical purpose, whether it be treating a current depressive episode or preventing relapse, would appear to be an especially exciting and promising future research opportunity. However, from our perspective, the primary purpose of directly comparing the therapeutic impact of the two approaches should not be to declare D <sup>3</sup>ZLQQHU′YV <sup>3</sup>ORVHU′TEHWZHHQ \$& Rather, a more desirable outcome would be if ACT and MBCT were shown to be equally efficacious in impacting both current and recurrent episodes of depression, thereby making those who struggle with depression the ultimate winners.

Perhaps of even greater importance than addressing the comparative outcome question between ACT and MBCT would be the opportunity for process and mediational analyses. For example, insofar as both interventions incorporate mindfulness practices, the use of a measure, such as the KIMS, that assesses the multiple dimensions of increased present-moment awareness, might help elucidate the degree to which ACT and MBCT have shared versus distinctive mechanisms of action. A better understanding of their respective mechanisms of action, even if differing, may be useful in enhancing them further, thereby potentially increasing the clinical impact of both ACT and MBCT. A finding of shared mechanisms of action would suggest that these two acceptance and mindfulness-based interventions for depression have much more in common than previously thought. References

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