

MINDFULNESS FOR OBSESSIVE-COMPULSIVE AND SUBSTANCE USE DISORDERS: TOWARD INTEGRATED TREATMENT OPTIONS FOR DUAL DIAGNOSES

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Abstract

Many individuals diagnosed with a mental illness will also struggle with substance use in their lifetime. Yet, interventions for specific comorbidities are seldom used and scarcely researched. The following review will explore the efficacy of mindfulness-based therapies for obsessive-compulsive (OCD) and substance use disorders (SUDs), respectively, in order to inform the development of new interventions for this dually-diagnosed population. Based on the literature, two promising therapies stand out: Acceptance and Commitment Therapy (ACT) as well as a group-based therapy called Mindfulness-Based Relapse Prevention (MBRP). Key skills espoused by mindfulness-based approaches will be reviewed, and a combined intervention approach is proposed.

Almost 20 percent of all adults with a mental illness also experience comorbid substance use dependence (Substance Abuse and Mental Health Services Administration 2010). An estimated 45 percent of individuals in state and local prisons and jails experience comorbid mental health and substance abuse disorders (National Institute on Drug Abuse 2010). Social workers in social service, mental health, and substance use treatment settings should expect to engage, at one time or another, with clients suffering from dual diagnoses. Despite such rates of comorbidities, these disorders are still researched separately, and services for mental health and substance use are for the most part heavily segregated. Many providers “play ‘pass the buck’ with clients diagnosed with co-occurring disorders,” claiming that symptoms of one disorder must abate before treatment for the other can begin (Mueser 2003; Surface 2008, 14). The current system is failing to reach this population with much-needed services: according to a 2010 study by SAMHSA, only 13.5 percent of clients with dual diagnoses received treatment for both disorders and 37.6 percent did not receive any treatment at all (SAMHSA 2010).

It is therefore the responsibility of the individual social work practitioner to provide a thoughtful, integrated approach to treating both disorders, the need for which is clearly great. As stated by the International Federation of Social Workers in its *Statement of Ethical Principles*, “social workers should be concerned with the whole person” (IFSW 2012). Thus, our field ought to be questioning current practices that attempt to divide a person’s mental health into circumscribed categories treated disjointedly. New solutions are needed.

THE CHALLENGE OF DUAL DIAGNOSIS

Comorbidities present unique challenges in assessment, treatment, and evaluation. Symptoms from one disorder can be difficult to distinguish from symptoms of the other. Note how, for example, the symptoms associated with substance use withdrawal overlap with those of some diagnosed mental illnesses (Baillie et al. 2013; Brady and Verduin 2005). Studies have shown that treating each disorder in isolation—either with parallel or sequential approaches—typically will not suffice (Mueser 2003). In a sequential approach, stabilizing psychiatric symptoms without addressing substance use is rarely successful. An increase in symptoms of either disorder tends to worsen symptoms of the other; alcohol use, for example, has been seen to interact with anxiety in a “circular fashion, resulting in an upward spiral of both anxiety and problem drinking” (Kushner et al. 1990, 692). Poor communication and a lack of cohesion in treatment make parallel approaches similarly ineffective because the burden of integration falls on the client (Mueser 2003).

In particular, with clients presenting with Obsessive-Compulsive Disorder (OCD), substance abuse exacerbates OCD symptoms, limits insight, and lowers overall functioning (Mancebo et al. 2009). Research on effective treatments for individuals dually diagnosed with OCD and substance use disorders (SUDs) is limited. Kelly et al. (2012) suggest that because OCD is both least prevalent and most predictive of other disorders such as depression and anxiety, these diagnoses tend to take precedence in treatment and study design. Fals-Stewart and Schafer (1992) highlight the underreporting of OCD symptoms by clients, as well as the tendency of clinicians to overlook the disorder in clients presenting primarily with substance use at addiction treatment centers. This presents a key deficit, since studies have shown that over 30 percent of individuals with OCD also suffer from a SUD compared with 16.7 percent in the general population (Mueser 2003). Given the complexities of treating dually-diagnosed clients, a potential approach is to locate a single intervention that can be effective for both disorders.

This paper reviews recent findings on the use of mindfulness- and acceptance-based interventions for OCD and substance use, respectively, and from this suggests that Acceptance and Commitment Therapy (ACT) may be effective for both OCD and SUDs (Luoma et al. 2012; Twohig et al. 2006; Twohig et al. 2010; Zgierska et al. 2009). It outlines the basic mindfulness “ingredients” offered by alternative interventions studied. Promising results were found for a group-based therapy called Mindfulness-Based Relapse Prevention (MBRP) in the treatment of SUDs (Bowen et al. 2014). New interventions might draw upon components of ACT, MBRP, and other mindfulness-based manuals for OCD and SUDs in order to adequately address both disorders simultaneously (Bowen et al. 2010; Hannan and Tolin 2005; Hershfield and Corboy 2013; Hyman and Pedrick 2010; Twohig 2007). A potential intervention plan is then suggested that incorporates features of both ACT and MBRP. This intervention would include, but is not limited to, regular mindfulness practice (in-session and at home), assessment of “workability” of current behaviors, acceptance of distressing emotions and experiences, and engagement in values clarification and commitment activities.

LITERATURE REVIEW: MINDFULNESS- AND ACCEPTANCE-BASED THERAPIES FOR OCD

Exposure and Response/Ritual Prevention (ERP) for OCD has become something of an industry-standard. Nonetheless, it is estimated to be ineffective for anywhere between 15 percent and 50 percent of clients (Hanstede et al. 2008; Twohig et al. 2006). ERP requires clients to confront feared situations without engaging in habitual “safety” behaviors or compulsions. Individuals with so-called “pure” obsessions—clients with intrusive, obsessional thinking but no obvious compulsions (or covert compulsions)—respond particularly poorly to ERP (Abramowitz et al. 2008). To complicate matters further, since alcohol, “as-needed” (PRN) medications, and other drugs obstruct the direct experience of anxiety, ERP exposures are far less effective if the client is under the influence of any of these substances. For clients with this dual diagnosis, the prospect of confronting feared situations without the use of medication or substance use may be overwhelming. Unsurprisingly, between 5 and 25 percent of individuals will refuse ERP and another 3 to 25 percent will drop out of treatment due to the aversive nature of the technique (Twohig et al. 2006; Twohig et al. 2010).

Mindfulness- and acceptance-based therapies have been found far less aversive (Wahl et al. 2013). Furthermore, mindfulness skills contribute substantially to the reduction of meaning and significance of intrusive

thoughts, factors that largely explain the maintenance of OCD (Hanstede et al. 2008). In mindfulness-based interventions, clients are asked to observe, in a nonjudgmental way, their intrusive thoughts as “transient mental events”—not facts. In contrast to the goals of ERP—namely, anxiety reduction—the goal of these therapies is to promote client acceptance of anxiety and the potential to live fully in spite of aversive thoughts and emotions.

ACT, already widely used with a variety of disorders, is one mindfulness-based option for OCD. ACT helps clients to achieve greater cognitive flexibility by focusing on present-moment contact, acceptance, and *cognitive defusion* (changing the relationship with one’s thoughts through distancing techniques). ACT also emphasizes purposefully engaging in values-driven behaviors in spite of any anxiety. This somewhat mirrors the functions of ERP, while enhancing motivation by remaining client-centered and engaging the client in discussions regarding personal values.

In a small, non-controlled study by Twohig et al. (2006), four individuals who met criteria for OCD participated in eight one-hour sessions of ACT. All four participants experienced decreased compulsions, lower scores on the Obsessive-Compulsive Inventory (OCI), Beck Depression Inventory, and Beck Anxiety Inventory, and rated the intervention as highly acceptable. Twohig et al. (2010) built on the results of this study with a randomized clinical trial: seventy-nine participants meeting criteria for OCD on the Structured Clinical Interview for DSM Disorders (SCID) were randomly assigned to either an ACT condition (n=41) using the same intervention as the aforementioned study, or a control condition (n=38) using Progressive Relaxation Training (PRT). Two participants in each condition were dually-diagnosed with a SUD. Clients in the ACT condition saw greater improvements on the Yale-Brown Obsessive-Compulsive Scale post-treatment and at three-month follow-up. The treatment was rated significantly more acceptable to participants, even when controlling for outcomes. Unfortunately, participants in the PRT condition were not told to use these strategies in response to obsessions and the PRT protocol used was briefer than the course recommended by studies supporting it. Both of these factors could have limited PRT as an effective control. A large strength of both studies is that the intervention is highly efficient in comparison with ERP. While this ACT intervention requires eight hours of clinical time, most studies on ERP are based on interventions that average 27.4 hours of total time spent in treatment (Twohig et al. 2010). The latter study thus exhibits higher rigor with respect to sample size and control condition. But in both studies the “packaged” nature of the ACT intervention meant mindfulness comprised

just one component, making it difficult to discern what the “active” ingredient might be.

Two additional studies were more successful at isolating the mindfulness skills effective for use with OCD. Hanstede et al. (2008) utilized a quasi random-assignment design to divide participants who scored significantly on the OCI-revised into mindfulness (n=8) and waitlist control (n=9) groups. Individuals in the mindfulness group received eight one-hour sessions of mindfulness skills, including a four-step sequence for handling psychological experiences (noticing, putting no energy, observing flow, returning to one's breathing) and a four-step mindfulness sequence to manage obsessions and compulsions. The mindfulness group experienced significant decreases on OCI-R scores. Unfortunately this study suffers from serious methodological limitations, including small sample size, poor control condition, lack of formal OCD diagnosis, and inappropriate randomization.

Wahl et al. (2013) used a loop tape exposure method to compare use of mindfulness with distraction strategies. The loop method, in which the client listens to recorded scripts of obsessive thoughts, is a potentially less aversive alternative to in-vivo ERP and more effective for “pure” obsessions. In this study, thirty clients were randomly assigned to a mindfulness condition (n=15) and a distraction condition (n=15). Written instructions for coping strategies per condition were displayed on a screen while the client listened to the tape. Individuals in the mindfulness group showed significantly greater reductions in anxiety levels and urges to neutralize, as measured by analog self-report scales. This study suffers from several limitations, such as small sample size, no post-treatment follow-up, and self-report subjectivity. However, it also bears one important strength: it indicates that mindfulness skills—frequently thought to require significant practice to cultivate—might be taught and implemented briefly with immediate results.

LITERATURE REVIEW: MINDFULNESS- AND ACCEPTANCE-BASED THERAPIES FOR SUDS

The literature on mindfulness for substance use disorders (SUDs) suggests that the technique could be highly effective in dealing with the primary risk factors of SUDs: craving and negative affect (Witkiewitz et al. 2013). Mindfulness teaches clients to practice “awareness of environmental cues and internal phenomena, including cognitive and affective states that have previously triggered relapse, interrupting the habitual response of substance abuse” (Bowen et al. 2014, 548). In contrast to therapies

that prepare clients for specific cues and situations, mindfulness skills generalize to any triggering situation or aversive state.

In Zgierska et al.'s (2009) review of twenty-five studies on the use of mindfulness meditation-based interventions (MM) for substance use disorders, seven of which were published randomized controlled trials with a total of 383 pooled participants, one utilized Mindfulness-Based Stress Reduction (MBSR), two used Spiritual Self-Schema therapy (3-S), two used ACT, and two used an adapted version of Dialectical Behavioral Therapy (DBT) for SUDs. Three of the studies compared MM with “standard of care,” with four comparing MM to active treatment (behavioral, pharmacotherapy, etc.). Four of the studies showed “substantial reduction” of substance use compared with control groups, with two finding no between-group differences but a higher accuracy of drug use reporting for clients in the MM condition (Zgierska et al. 2009, 285). One limitation to generalization of these results is the heterogeneity of the interventions and client variables such as comorbidities and type of drug used, as well as the difficulty, as previously stated, in determining whether the “active” ingredient is mindfulness in “packaged” interventions like DBT and ACT. Taken together, however, the majority of the twenty-five reviewed studies showed positive outcomes among SUD-affected subjects treated with MM compared with baseline or other therapy.

Since the Zgierska et al. (2009) review, several studies have investigated the efficacy of MBRP, an intervention that combines elements of relapse prevention (RP) therapy with mindfulness meditation. MBRP aims to help clients build awareness of triggers, destructive habitual responses, and “automatic” reactions that maintain substance use (Bowen et al. 2010). Of particular interest is the Bowen et al. (2014) study that investigated the efficacy of different aftercare methods for individuals exiting a private treatment facility for SUDs. Individuals were randomized to eight weekly group sessions of MBRP (n=103), standard RP (n=88), and treatment as usual (TAU)—a twelve-step process group (n=95). Substance use was assessed using a “Time-Line Follow-Back” self-report measure that typically shows high reliability against urinalysis testing. At three-month follow-up, no group differences were found and at six months, findings for the RP and MBRP groups were equivalent; however at twelve months, individuals in the MBRP group reported 31 percent fewer days of use than the RP condition, suggesting a durability of effect. Apart from the subjectivity of self-report and the differences in structure between the TAU condition and RP/MBRP conditions, this study was methodologically strong. Additionally, MBRP does not simply utilize mindfulness as an add-on, but rather it underlies the entire treatment (Bowen et al. 2014).

Only limited research has been conducted since the Zgierska et al. (2009) review on the use of ACT for substance use. One study by Luoma et al. (2012) investigated the impact of a six-hour group-based ACT intervention at a twenty-eight-day inpatient program for substance use. Participants were assigned in random pairwise fashion to either a TAU condition (n=65) or ACT condition (n=68); individuals in the ACT condition saw higher treatment attendance and fewer days of substance use at four-month follow-up. Obviously, it is difficult to generalize these findings to outpatient or individual treatment, and it is possible that outcomes were influenced by “attention from providers outside the unit or unusually skilled therapists” (Luoma et al. 2012, 51).

DEVELOPMENT OF TREATMENT FOR DUAL DIAGNOSIS

In the above review of the literature, four potential mindfulness mechanisms emerged as theoretically important for efficacious and concurrent treatment of OCD and SUDs. These ask clients to: (1) remain *present-focused*, rather than past- or future-focused; (2) *observe* their thoughts, emotions and sensations as objects rather than as facts (“defusion”); (3) through awareness, *pause* and make choices before reacting to such objects out of habit (acting on “autopilot”); and (4) *accept* the existence of unwanted or unpleasant experiences in the interest of choosing less reactive, values-driven responses in order to pursue a full and meaningful life. To the first point, clients suffering from OCD often live in a world of “what if”—a future-oriented space (Hershfield and Corboy 2013). Second, a key underlying feature of OCD involves the client attributing excessive significance and meaning to his or her thoughts, emotions, and sensations, such that they are regarded as fact and synonymous with actually having acted upon internal events. Similarly, the extent to which a client “buys into” (is “fused with”) particular emotions and thoughts can precipitate a substance use relapse, which in turn leads to additional emotions and thoughts (e.g., “I already relapsed, it’s too late now”); if fusion with these events occurs, a continued relapse pattern can form (Bowen et al. 2010). Additionally, both clients with OCD and clients with a SUD experience urges that they tend to *react* to, out of habit; mindfulness teaches clients to observe and ride out or “surf” such urges—whether to use substances, or to neutralize anxiety by performing rituals and compulsions (Bowen et al. 2010). Finally, just as a person with OCD cannot control his or her thoughts and feelings associated with the OCD—and according to more recent research, nor can he or she “unlearn” the fear response to them—a person with a SUD cannot necessarily control or prevent urges to use, or the unpleasant feelings that precipitate use. With

both disorders, a key skill is the ability to accept and relinquish control over negative internal events and focus on values-driven action (Hershfield and Corboy 2013; Bowen et al. 2010).

To best address each disorder, I propose the combined use of two treatment manuals, slightly modified for their pairing: ACT for OCD and MBRP for SUDs (Bowen et al. 2010; Twohig 2007). A full outline of the curriculum is available but outside the scope of this paper. For this proposal it is sufficient to outline its key components and goals.

In the proposed treatment, sessions would be structured to include an opening mindfulness practice, a review of homework and previous material, the presentation and practice of new material, and conclude with assignment of new homework, including daily mindfulness practice. The first session orients the client to basics of mindfulness and how it can be applied to both OCD and SUDs. In the second session, the therapist and client assess the client's current strategies, which typically involve avoidance or control strategies regarding unpleasant emotions, for "workability." They assess whether these behaviors are effective in the long term. The third session is aimed at developing an awareness of triggers and "cravings" (for OCD and for SUDs). In session four, the fundamental practice of mindfulness of breath is introduced. The skill of SOBER breathing is also introduced—a five-step exercise that includes "Stop" (step out of automatic pilot), "Observe" (emotions, sensations, or thoughts), "Breath" (focus on the breath), "Expand" (expand awareness to include the rest of the body, mind, and experience), and "Respond" (respond mindfully). SOBER breathing, while designed for SUDs, can be applied to either OCD or SUD symptoms (Bowen et al. 2010).

Session five addresses high-risk situations. Here the client identifies such situations and considers an attitude of willingness and acceptance of unpleasant sensations, thoughts, and emotions as an alternative to control and avoidance. This session marks the start of "behavioral commitment" or willingness exercises, which allows the client to participate in self-directed "naturalistic" exposure outside of session. Session six continues the discussion of acceptance. Additional time is given to this concept because it is particularly important that the client does not see acceptance as "tolerating" negative emotions, since "tolerating" both endorses judgment of those experiences and limits the client's experience of the present moment to focusing on and enduring suffering (Twohig 2007). Session eight is dedicated to identifying client values, and widening the discussion to lifestyle choices that can create a sense of fulfillment in the client's life. Finally, in session nine the therapist and client discuss social supports and other strategies for maintenance.

The specific order of the aforementioned sessions might be adjusted depending on individual needs of the client. Until further research is conducted and proves otherwise, the order of these proposed sessions is not necessarily crucial. For the purposes of this article, the suggested order loosely follows the outlines presented in the ACT curriculum for OCD and MBRP curriculum for SUDs, respectively.

As indicated above, one of the primary benefits of the use of mindfulness is its ability to provide a less aversive format for conducting traditional exposure methods (Wahl et al. 2013). The intervention proposed here can be done with or without “formal” exposure sessions. While ACT does not specifically necessitate formal exposure work, typically when clients are asked to participate more fully in values-driven action through a course of ACT, they will likely come into contact with previously-avoided situations and thus experience exposure less formally (“naturalistic exposure”). Similarly, many of the thought-defusion and mindfulness exercises serve as a form of exposure to the unpleasant thoughts or emotions associated with particular words or images. Whether or not to include formal exposure work or ERP should depend on the client’s willingness. If used, ACT can be employed as a specific means by which to approach formal exposure. Currently, studies are underway to investigate a combined approach that specifically alters traditional ERP protocols with ACT principles. Some initial changes recommended include assessing “willingness” in place of Subjective Units of Distress typically used in ERP and an explicit focus on values in constructing a hierarchy and to determine response prevention (Jacoby and Abramowitz 2014).

CONCLUSION

Obviously, significant modifications have been made to the original structure and form of interventions outlined in the review of the literature in order to craft an intervention that addresses both disorders. As such, original findings regarding efficacy are called into question. That said, the current intervention contains the basic mindfulness “ingredients” central to most, if not all, aforementioned treatments. Primary limitations to generalizing the efficacy of mindfulness for OCD and SUDs include the heterogeneity of both subjects and interventions studied (including group versus individual treatments, etc.), the “packaged” nature of therapies like ACT and DBT which would require deconstructive studies to validate the efficacy of mindfulness and acceptance alone, and the significant methodological limitations (including sample size, improper design, etc.) of the reviewed studies. Additionally, the authors of MBRP explicitly state that it has been researched with clients who have already gone through

inpatient or outpatient substance use treatment, and is intended for use with clients who are dedicated to sobriety. Alternatively, clients may not be committed to sobriety and instead wish to pursue moderation strategies. Further, MBRP is group-based; however, for the purposes of this intervention I have focused on its applicability for individual use. Clearly, additional research must be done on an integrated treatment with comorbidity in mind, as well as on a modified version of exposure methods. Clients who prefer moderation or non-sobriety approaches to recovery should also be considered. That said, due to the limited research and information on an integrated mindfulness treatment (or any treatment, for that matter) for dually-diagnosed clients with OCD and a SUD, the current intervention is an adequate first step. Mindfulness-based therapies have the potential to serve as briefer, less aversive alternatives to ERP, as well as to produce a successful concurrent effect on substance use.

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