Personality disorders and depressive symptom improvement in a randomized clinical trial

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Abstract

Background: The impact of personality disorders on depressive symptom improvement has been approached by several studies. Nonetheless, results are still controversial. The aim of this study was to compare depressive symptom improvement between individuals with and without personality disorders in a clinical sample of depressed patients.

Methods: This was a clinical trial nested within a university outpatient service of mental health. It tested the efficacy of two short-term psychotherapies for depression (Supportive Expressive Dynamic Psychotherapy and Cognitive-Behavioral Psychotherapy). This was a convenience sample composed of 69 individuals. Personality disorders were evaluated using the Millon Clinical Multiaxial Inventory and depressive symptoms were assessed using the Outcome Questionnaire-45 and the Beck Depression Inventory.

Results: Median scores of the OQ-45 and the BDI were significantly lower at post-intervention in all individuals. Baseline/post-intervention scores presented by individuals with personality disorders were not significantly different than the ones presented by individuals without personality disorders, although a trend to significance could be observed regarding the total score and the symptom distress domain from the OQ-45. Also, the variation (score reduction) from baseline to post-intervention did not differ between the groups.

Limitations: We had a relatively small sample, we did not stratify analysis by specific personality disorders, and we did not consider depression characteristics, such as type and duration.

Conclusions: Short-term psychotherapy was effective in reducing depressive symptoms regardless of the presence of a personality disorder. Thus, as long as the patient receives

proper care for depression, personality disorders should not preclude symptom improvement.

Keywords: Depression; Personality Disorders; Supportive-Expressive Dynamic Psychotherapy; Cognitive-Behavioral Therapy.

Introduction

Depression is estimated to affect 350 million people over the world. It is expected to be the second leading cause of world disability by 2020 and the largest contributor to disease burden by 2030 (WFMH, 2012). The prevalence of Depression in most countries ranges between 8 and 12 percent (WFMH, 2012). In Brazil, the prevalence figures of Depression range from 17-20% in population-based samples (Andrade et al., 2012) and between 22% and 47% in clinical samples (Fleck et al., 2003).

In addition to the high prevalence figures and the great impairments caused by this often recurrent disorder, treatment effectiveness in depression may be affected by several variables, including comorbidities. On this matter, one characteristic that could interfere with the treatment of depression is the presence of comorbid Axis II disorders (Mulder, 2002; Bédard et al., 2015; Gabbard and Simonsen, 2007).

Personality disorders are associated with ways of thinking and feeling about oneself and others that significantly and adversely affect how an individual functions in many aspects of life (APA, 2013). Personality-disordered individuals tend to be adaptively inflexible and to exhibit a tenuous stability, or lack of resilience, under conditions of stress (Millon et al., 2004).

The association between depression and personality disorders (PD) has been widely studied, especially concerning its impact on treatment outcome (Gabbard and Simonsen, 2007; Mulder, 2002; Newton-Howes et al., 2006). One 10-year cohort study

identified that depressed patients with comorbid personality disorder remained clinically ill at a greater rate than the ones without comorbid PDs (Kennedy et al., 2004). Moreover, one meta-analysis study revealed that comorbid PDs were associated with a doubling of the risk of a poor outcome for depression (Newton-Howes et al., 2006).

Even though recent studies present corroborating results on the association between depression and personality (Jylhä et al., 2016; Noteboom et al., 2016), controversial results can still be found (Bédard et al., 2015; Mulder, 2002). On this matter, one recent investigation found that the presence of a personality disorder does not negatively impact therapy adherence or success in short-term psychotherapy for an Axis I disorder, including depression (Bédard et al., 2015). Also, studies present positive results in the treatment of depression with comorbid PDs (Abbass et al., 2011; Muszer and Bailer, 2011).

Thus, the aim of the present study was to compare depressive symptom improvement between individuals with and without personality disorders in a sample of depressed patients from a randomized clinical trial.

Methods

This study evaluated depressed patients who participated in a randomized clinical trial that tested the efficacy of two short-term psychotherapeutic models for depression. Treatment consisted on 18 sessions of Supportive Expressive Dynamic Psychotherapy (SEDP) or 16 sessions of Cognitive-Behavioral Psychotherapy (CBT). The clinical trial was nested within an outpatient research and mental health evaluation service (APESM) from the Catholic University of Pelotas. Information regarding patient evaluation and the APESM logistics were described elsewhere (Araújo et al., 2016).

Patients who were diagnosed with depression were included in the clinical trial if they had signed informed consent and if they fulfilled the following criteria: (1) Depression was the only or the most distressing current disorder; (2) the patient was not currently using or had used any antidepressant medication in the two months prior to the treatment; (3) the patient was not receiving concomitant psychotherapeutic treatment elsewhere; (4) the patient did not present moderate or severe suicide risk; (5) there was no dependence of alcohol and/or illegal substance abuse; (6) there were no psychotic symptoms.

Data collection occurred from July 2012 to December 2015. Major Depressive Disorder was evaluated using the Mini International Neuropsychiatric Interview Plus, which is a diagnostic interview based on DSM-IV and ICD-10 criteria (Amorim, 2000). Personality disorders were evaluated using the Millon Clinical Multiaxial Inventory – III (MCMI-III) which is widely used on the assessment for personality disorders

(Millon, 1994). For the purposes of this work, personality disorders were grouped accordingly to the DSM-IV (Schizoid, Schizotypal, Paranoid, Narcissist, Borderline, Compulsive, Antisocial, Avoidant, Dependent, and Histrionic) and then recoded into a dichotomous variable (Without PD X With PD). The Outcome Questionnaire-45 – OQ-45 (Lambert et al., 2004) and the Beck Depression Inventory – BDI-II (Beck et al., 1996) were used at baseline and at post-intervention to evaluate the severity of depressive symptoms and symptom improvement. The OQ-45 measures the frequency of situations/feelings/thoughts during the administration intervals. It provides a total scale score and three independent domain scores: Symptom Distress (SD), Interpersonal Relationship (IR), and Social Role Performance (SR). The BDI is an inventory designed to evaluate the severity of depression in population-based and clinical samples. Its 21 items are composed of four statements that evaluate the severity of a particular symptom and the higher the score the more severe are the symptoms.

Statistical analyses were performed in the software SPSS 21.0. Sociodemographic and clinical variables between the groups of individuals with and without PD were compared using the Mann-Whitney Test and the Kruskal-Wallis test. Baseline and post-treatment median values were compared using the Wicoxon signed-rank test. Differences between median scores and between the groups were considered meaningful when $p \leq 0.05$.

This study design was approved by the ethics committee of the Catholic University of Pelotas, which is associated to the National Committee of Ethics in Research (National Counsel of Ethics in Research - CONEP) under the number 66066 from July 2012. Informed consent of the participants was obtained after the nature of the procedures had been fully explained. After treatment, patients who remained

depressed were referred to the Psychology Clinic of the Catholic University of Pelotas (for free treatment) or to public health facilities in the city.

Results

A total of 322 individuals were initially enrolled in the clinical trial. From these, 37 participants were excluded for scheduling the first session and not attending it (for three times) or for fulfilling exclusion criteria after beginning treatment. Moreover, 58 individuals refused treatment. The clinical trial was composed of 227 individuals (120 in the SEDP group and 107 in the CBT group) and 175 individuals concluded treatment (116 participants in the SEPD and 59 in the CBT model). Cases with missing OQ-45 or BDI data or invalid MCMI were excluded (n=76). Thus, sample of the present study consisted on 99 individuals who have concluded psychotherapy.

Sample was mostly composed of women (78.8%), who were white (85.9%), with median 33.00 (27.00; 46.00) years of age and 11.00 (10.00; 14.00) years of schooling. Most of them were currently working (55.6%), lived with a partner (55.6%) and belonged to socioeconomic class B (55.6%). There were no significant differences regarding any of the independent variables, including the psychotherapy models, between the groups without PD and with PD ($p > 0.05$).

The prevalence of personality disorders in this sample was 76.8% (n=76). Intragroup comparison (Table 1) was performed in order to evaluate the efficacy of psychotherapy in the sample and to evaluate whether symptom improvement was affected when a PD was presented. Results from the three groups (total sample, without PD and with PD) show that both the OQ-45 (total score and all its domains) and the

BDI median scores were significantly lower ($p \leq 0.05$) at post-intervention when compared to baseline.

Median OQ-45 and BDI scores were also compared between individuals without PD and the ones with PD (Table 2). Both baseline and post-intervention scores in the group with PD appeared to be higher than the ones presented by individuals without PD, but this difference was only statistically significant regarding the Post-intervention Total Score (p=0.036). and the Post-intervention SD score (p=0.037) from the OQ-45 . Also, scores from the group with PD presented a trend to be significantly higher regarding the post-intervention IR Score (p=0.087) when compared to the individuals without PD.

Nonetheless, the variation (reduction) from baseline to post-intervention scores was very similar between the groups ($p > 0.05$) when they were compared.

Discussion

The examination of the relationship between personality disorders and depression is essential due to its theoretical and clinical implications. This study aimed to contribute to the important discussion regarding the impact of PDs on depressive symptom improvement, given that literature still presents mixed findings on the matter.

Most studies suggest that individuals presenting personality disorders and depression show less improvement concerning depressive symptomatology (Kennedy et al., 2004; Newton-Howes et al., 2006) or may need longer treatment to affect the major symptoms of depression in a positive way (Gabbard and Simonsen, 2007). Nevertheless, our results show that short-term psychotherapy was effective in reducing depressive symptoms regardless of the presence of a personality disorder. This is in accordance with literature showing that the presence of an Axis II diagnosis is not necessarily associated with poor outcome in depression and that comorbid personality pathology should not be seen as an impediment to good treatment response in Depression (Abbass et al., 2011; Bédard et al., 2015; Mulder, 2002; Muszer and Bailer, 2011). Specifically, studies found that short-term psychodynamic psychotherapy (Abbass et al., 2011) and cognitive-behavioral therapy (Bédard et al., 2015) are effective in depressed patients with comorbid personality disorders.

The prevalence of personality disorders in the sample was high, although similar to other findings (van den Hout et al., 2005). Also, there were more individuals

in the group of individuals with PD than in the group without it. Nonetheless, there were no differences regarding the sociodemographic variables, which is in accordance to one recent study (Bédard et al., 2015).

The first hypothesis of this study was that patients with comorbid PD would show higher baseline and/or post-treatment scores when compared to individuals without PD. Our results showed that the post-intervention Total Score and Symptom Distress score from the OQ-45 were significantly higher in the group with PD when compared to the individuals without PD. This result is in agreement with a meta-analysis study (Newton-Howes et al., 2006), indicating that patients with comorbid personality disorders may not improve as much as depressed patients without comorbid PDs. However, the variation (reduction) from baseline to post-intervention scores did not differ between the groups. Our hypothesis for that is that depressed patients with comorbid personality disorders may present higher final scores, which demonstrate increased symptom severity, but they show a similar improvement rate concerning depressive symptoms when compared to patients without personality disorders.

The present study presents some methodological strengths: patients were carefully evaluated by professionals (Psychologists) using a semi-structured diagnostic interview and referred to a randomized clinical trial composed of widely used psychotherapy models. Moreover, this was an outpatient sample where the prevalence of personality disorders was very high and where the efficacy of two brief psychotherapy models has been observed.

This study also has some limitations. Newton-Howes et al. (2006) states that at least 1000 patients would be needed to detect reliable significant difference in outcome between people with PD and the ones without PD. However, we had sufficient statistical power (99%) despite the relatively small sample size. Another limitation

could be related to the fact that we did not evaluate the impact of particular personality disorders (i.e. Borderline PD) on symptom improvement, but this was not the main purpose of this work. Finally, we did not control for depression characteristics, such as type and duration of the depressive episode. These factors should be taken into consideration when interpreting the results and when conducting future studies.

This study has important clinical implications regarding the impact of personality disorders on depression outcome since most studies have reported that personality pathology appears to be very common in patients with depression (Mulder, 2002) and personality features often inform strategies to be considered when confronted with patients who have treatment- refractory depressions (Gabbard and Simonsen, 2007). Also, individuals presenting personality disorders may also present Axis I comorbidities, such as Depression, at some point of their lives and may then benefit from short psychotherapy models for depressive symptoms.

In conclusion, whether or not personality pathology significantly worsens outcome in patients with major depression appears to depend on methodological differences, such as the study design, sample size, outcome measures, and inclusion/exclusion criteria (Bédard et al., 2015; Mulder, 2002). Our results demonstrate the efficacy of short-term SEDP and CBT in treating depression even when one or more personality disorders are presented. Thus, personality disorders should not preclude depressive symptom improvement when depression is properly treated.

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Highlights

Personality disorders do not preclude depressive symptom improvement.

Pre- and post-treatment scores do not differ when personality disorders are presented.

Short-term psychotherapy is effective in reducing depressive symptoms.

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