

Empirical Validation of a Mental Health Intensive Outpatient Program in a Private Practice Setting

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This article demonstrates the treatment effectiveness of a mental health Intensive Outpatient Program (IOP) in a private practice setting. Pretreatment and posttreatment symptom and clinician-rated Global Assessment of Functioning (GAF; American Psychiatric Association, 2000) scores were used to determine treatment effectiveness. Reliable change indices and clinically significant change scores were used to control for measurement error and to validate functional change. The IOP patients demonstrated statistically and clinically significant symptom reductions on all 9 clinical scales and 4 global measures of distress, demonstrated movement to less severe levels of functioning, and reported a very high degree of consumer satisfaction. Follow-up data indicated continued improvement and satisfaction. Client satisfaction data and follow-up survey data are also reported.

During the 1980s, numerous literature reviews reported that the costs associated with inpatient care in adult and adolescent psychiatric and substance abuse populations typically exceeded the clinical benefits compared to outpatient care (e.g., Cummings, 1991; Kiesler, 1982; Miller & Hester, 1986). Other literature demonstrated that partial hospital programs could effectively substitute for inpatient hospitalization (e.g., Herz, 1982; Kiser, 1990; Piper et al., 1996; Sledge et al., 1996). Thus, by 1988, 94% of multi-service mental health organizations provided partial hospitalization programs (PHPs), and 53% of private psychiatric hospitals provided this level of care (Sunshine, Witkin, & Manderscheid, 1992). More recently, 92% of specialty psychiatric hospital respondents reported providing PHP services (National Association of Psychiatric Health Systems, 1997). A parallel trend is likely to be seen in the future for similar alternative outpatient service delivery models.

In response to the increased activities of managed care and similar economic factors, Intensive Outpatient Programs (IOPs) have been developed. IOPs provide 3 to 4 hr of structured programming 3 to 5 times a week (e.g., American Association of Community Psychiatrists, 1998; American Society of Addiction Medicine, 1991; Kiser et al., 1996; Kiser et al.,

1998). Obviously, the costs for 9 to 15 hr of programming per week are considerably less than the typical 30 hr per week partial program and far less than 24-hr care. Like the PHPs before them, however, IOPs are currently underutilized as a result of inequitable funding, insurer arrangements, and clinician bias (Piper et al., 1996; Washton, 1997).

Although there is some literature evaluating the effectiveness of IOPs with psychiatric patients (Raskin et al., 1996; Wise, 2000), the majority of these studies focus on substance abuse populations treated in community mental health settings, where such innovations have traditionally been more easily accepted (e.g., Gottheil, 1997) and less reliant on private insurance for reimbursement.

This mental health IOP was developed in response to the increasing need to provide less restrictive and more cost-efficient levels of care for those in acute psychological distress, while keeping the patients at home. Our practice is centrally located in a middle-class area of a large metropolitan city. To be admitted to the IOP, clients must have at least one Axis I diagnosis and cannot be imminently suicidal, homicidal, or psychotic. The IOP requires a large group room, conference room, restrooms, and so on that are handicap accessible. The IOP consists of a process group, skills group, and focus group. The process group is a traditional psychodynamically oriented group with an emphasis on confronting resistance to change, identifying current and repetitive relationship themes, and facilitating the expression of affect. In contrast, the skills group is designed to address coping skills deficits in such areas as assertiveness, relaxation training, anger management, self-talk, and practical

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solutions. The focus group is also psychoeducational but highly contingent on individual and group needs. Frequent educational topics include coping with such issues as loss and grief, physical illness, job stress, aloneness, leisure, codependency, conflict resolution, and pain management. All individuals see either a psychiatrist or their primary care physician for a medication evaluation and management. Linkages with psychiatrists, primary care physicians, PHPs, and inpatient psychiatric units are in place and utilized as necessary. Community support groups and other resources are also utilized as appropriate.

The purpose of this study was to demonstrate the treatment effectiveness of this IOP. Pretreatment symptom scores were used to compare the IOP treatment group with two inpatient samples to demonstrate symptom severity and to assess the possibility that an IOP could treat individuals symptomatically comparable to hospitalized patients. The IOP treatment group was evaluated to assess patients' pretreatment and posttreatment symptom rating scores, clinician functional ratings, hospitalization rates, and satisfaction scores. This study also served as an attempt to replicate findings reported earlier in an effort to demonstrate the effectiveness and reliability of this treatment modality (Wise, 2000).

Method

All patients went through an intake screening process. During this time, a mental status exam and psychosocial history were obtained, along with the completion of numerous admission forms (e.g., insurance, consent, releases). Patients were specifically assessed to be sure that they met the admission criteria mentioned above. Patients completed a Symptom Checklist-90-Revised (SCL-90-R; Derogatis, 1983) prior to beginning the IOP. The SCL-90-R has been repeatedly demonstrated to be a sensitive measure of therapy outcomes in a wide variety of settings with a diversity of patient populations and numerous types of treatments (Derogatis & Lazarus, 1994; Piotrowski & Keller, 1989; Waskow & Parloff, 1975), and it has been recommended for assessing outcomes in clinical settings (Ogles, Lambert, & Masters, 1996). The SCL-90-R is a self-administered, 90-item, 5-point rating scale (0-4) that has been shown to be a valid and reliable measure of nine psychological symptom dimensions: Somatization, Obsessive-Compulsive, Interpersonal Sensitivity, Depression, Anxiety, Hostility, Phobic Anxiety, Paranoid Ideation, and Psychoticism. Three additional global indices assess broad domains of psychological distress. Positive Symptom Total is a measure of the total number of symptoms endorsed. Positive Symptom Distress Index (PSDI) reflects the average intensity of symptoms endorsed. The Global Severity Index (GSI) "represents the best single indicator of the current level or depth of the disorder"

(Derogatis, 1983, p. 12). The GSI is often used as a single global measure of psychological distress in psychotherapy outcome studies because it uses data from both the total number of symptoms endorsed and the intensity level of distress (Ogles et al., 1996). All patients who completed treatment as well as pretreatment and posttreatment SCL-90-Rs were included in the study.

IOP pretreatment SCL-90-R scores were compared with Derogatis's (1983) inpatient normative sample, as well as with a more contemporary local sample of 100 consecutive psychiatric inpatients referred for psychological testing. During the last week of treatment, patients again took the SCL-90-R along with the Client Satisfaction Questionnaire 8 (CSQ-8; Attkisson & Zwick, 1982). Data regarding total number of visits, pretreatment and posttreatment scores on the Global Assessment of Functioning (GAF; American Psychiatric Association, 2000), diagnoses, and so on were gleaned from the charts.

Reliable Change Indices (RCIs) were calculated on the treatment group pre- and posttreatment mean scores. RCIs were introduced by Jacobson and Truax (1991) to determine whether the magnitude of statistically significant differences in psychotherapy outcome studies reflected measurement error or significant clinical change beyond that accounted for by such error. Clinically significant change was also assessed and determined by the mean treatment group GSI score crossing the defined cut-off from one categorical level of functional severity to another, as defined in the formulas provided by Tingey, Lambert, Burlingame, and Hansen (1996).

A subset of 100 IOP admissions was sent a 7-item questionnaire to obtain additional longitudinal follow-up data. This questionnaire addressed posttreatment issues, such as symptom severity, hospitalization rates, and aftercare.

Results

This sample ($N = 183$) may be described as predominantly White (70%) women (84%) whose average age was 40. They had an average of 14 years of education, and 29% had 16 or more years of schooling. Eighty-three percent were employed. Forty-nine percent were married, 23% were single, 21% were divorced, 2% were widowed, and 5% checked "other" in the marital status category. The majority of the sample was diagnosed with Major Depression (89%), 50% had a second Axis I diagnosis, Anxiety was present in 38%, and 69% also received a comorbid personality disorder diagnosis, most frequently with mixed features. Sixty-seven percent ($n = 123$) had diagnosable Axis III disorders. Eighty-eight percent ($n = 161$) were direct admits to the IOP, and 12% ($n = 22$) were stepped down from a higher level of care. Seventy-eight percent ($n = 143$) of these patients were already receiving some type of psychotropic medication at the time of admission. Thirty

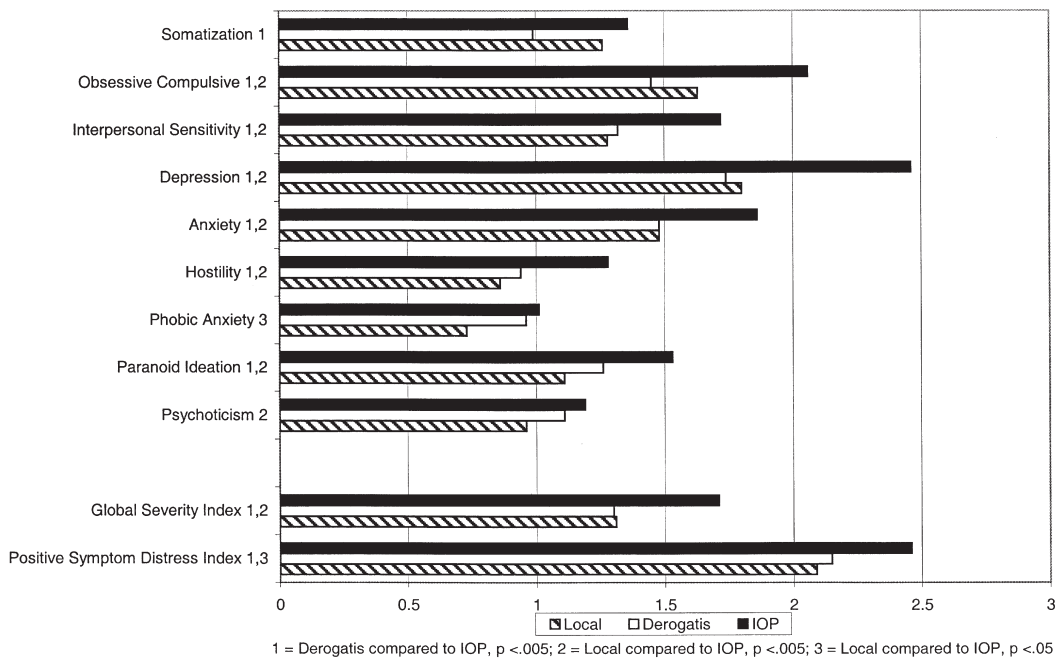


Figure 1. Pretreatment Symptom Checklist-90-R mean scores. IOP = Intensive Outpatient Program.

percent ($n = 55$) had a total of 108 previous psychiatric inpatient admissions between them, or an average of 2 admissions. Eight percent ($n = 14$) had three or more previous admissions (range = 3–8). Of the 183 IOP admissions, 8% ($n = 15$) were re-admissions. Of the 15 IOP re-admissions, 10 (66%) had an average of 2.7 previous inpatient admissions per patient. During the course of treatment, 4% ($n = 8$) were referred to a higher level of care. Seven percent ($n = 12$) attended 3 or fewer sessions, terminated unilaterally, and were considered dropouts.

At the beginning of treatment, the average GAF was 40, indicating major to serious impairment in several to most areas of life. More specifically, the majority of these patients were severely depressed, voiced suicidal ideation, were unable to work, were unable to carry out household duties, and ignored family and friends. The average number of total days in IOP enrollment was 53, or approximately 8 weeks. However, because the patients were seen an average of 2–3 IOP sessions per week, their actual average number of attended treatment days was 17 ($M = 17$, $SD = 9$).

The IOP sample pretreatment SCL-90-R average raw scores were compared with Derogatis's (1983) psychiatric inpatient normative group and with 100 local inpatient psychiatric patients (Wise, 2000),

using unpaired t tests. The IOP sample was significantly more symptomatic on 10 of 12 scales compared to the local and national hospitalized samples (Figure 1). The only score that was not significantly different between the IOP sample and an inpatient group was on the Psychoticism scale. (Although the IOP score on Positive Symptom Total scale was significantly different, $p < .01$, from both inpatient samples, it is not shown in the graphs because it is based on a different metric.)

The SCL-90-R demonstrated highly significant pre- to posttreatment symptom reductions on all nine clinical scales (Figure 2). Very significant pre- and posttreatment effects were also demonstrated on the three global scales. Similarly, the clinician-rated posttreatment GAF mean of 57 was very significantly higher than the pretreatment score of 40, $t(181) = -23.24$, $p < .01$. When the posttreatment GAF (57) is compared to the pretreatment rating of the highest GAF over the past year (62), it is evident that functional improvements approaching premorbid level of functioning were made. All statistically significant group treatment effects were also examined using RCIs and were shown to be of such a magnitude as to be the result of reliable change, as opposed to measurement error (i.e., $\geq \pm 1.96$). Furthermore, according to Tingey et al.'s (1996) criteria ($t < .05$; $d \geq .5$),

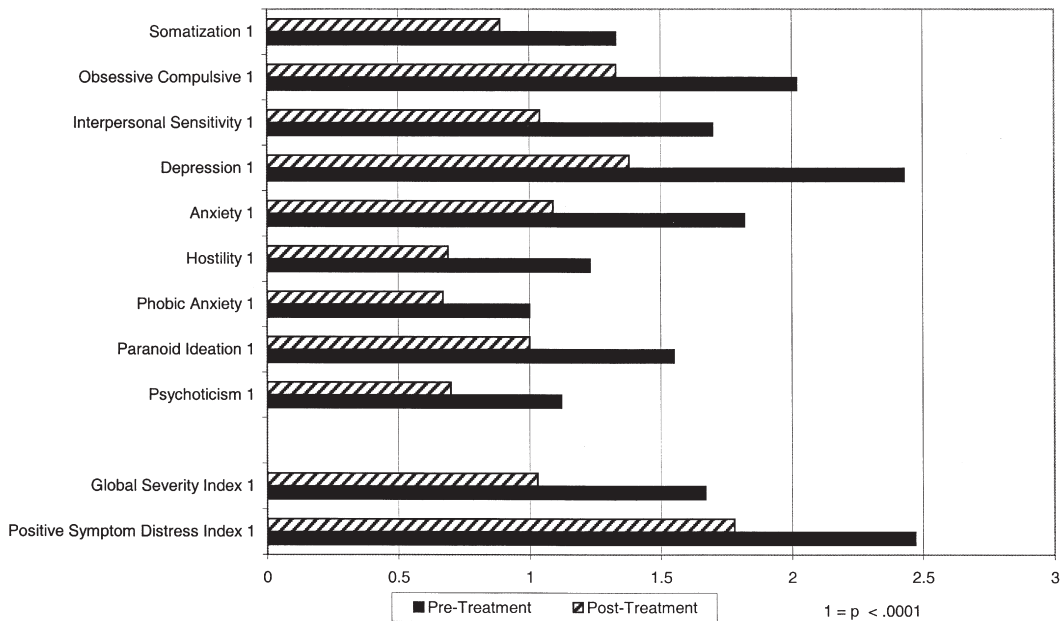


Figure 2. Pretreatment and posttreatment mean scores on the Symptom Checklist-90-R.

the IOP pretreatment group, based on the mean GSI score, formed a significantly more severe and distinct group, compared to Derogatis's (1983) inpatient normative group. Additionally, Tingey et al.'s formula showed that the pretreatment mean GSI score would have to fall below the theoretical cut-off of 1.5 in order to be classified as moving into a less severe category of the functional continuum. The pretreatment IOP mean GSI of 1.7 crossed the 1.5 GSI cut-off to a posttreatment mean GSI of 1.0, thereby demonstrating clinically significant change for the treatment group.

The Client Satisfaction Questionnaire resulted in an overall average rating of 3.6, with 4 being the highest rating (Figure 3). For example, these clients were very satisfied overall with the program, they were satisfied with the quality of the service, they felt the program helped, they would come back if needed, and they would recommend the program to others.

In a further effort to collect data related to the effectiveness and quality of the IOP, the first 100 admissions were mailed a follow-up survey. The average length of time between discharge for the first 100 patients and this data collection effort was 16.5 months. Of the 100 surveys sent, 35 were returned. Of this self-selected sample, 69% reported continued symptom improvement, and 77% continued to obtain some type of mental health care. None

of these patients had been hospitalized since their IOP experience, 2 had subsequently been admitted to a partial hospitalization program, and 1 was admitted to another IOP, indicating that 3% required higher levels of care subsequent to discharge. Moreover, 89% indicated that if the need arose, they would return to our IOP for treatment.

Discussion

This study, like the one before it (Wise, 2000), demonstrated that the IOP sample was more significantly distressed and endorsed a greater number of symptoms and to a greater degree of severity than both local and national inpatient samples. Nonetheless, the IOP treatment group made statistically reliable and clinically significant improvements on every symptom scale, moved to a less severe range of functioning, and improved GAF scores while being treated on an outpatient basis.

Patients in our IOP met for an average of 17 days, spread out over a 7–8 week period, and each patient was gradually phased out of treatment. Thus, an individual might initially be seen every day for the first week, then 3 sessions per week for 3 weeks, then move to 2 sessions the following week, and then 1 session the last week. In contrast, the National Association of Psychiatric Health Systems (1998),

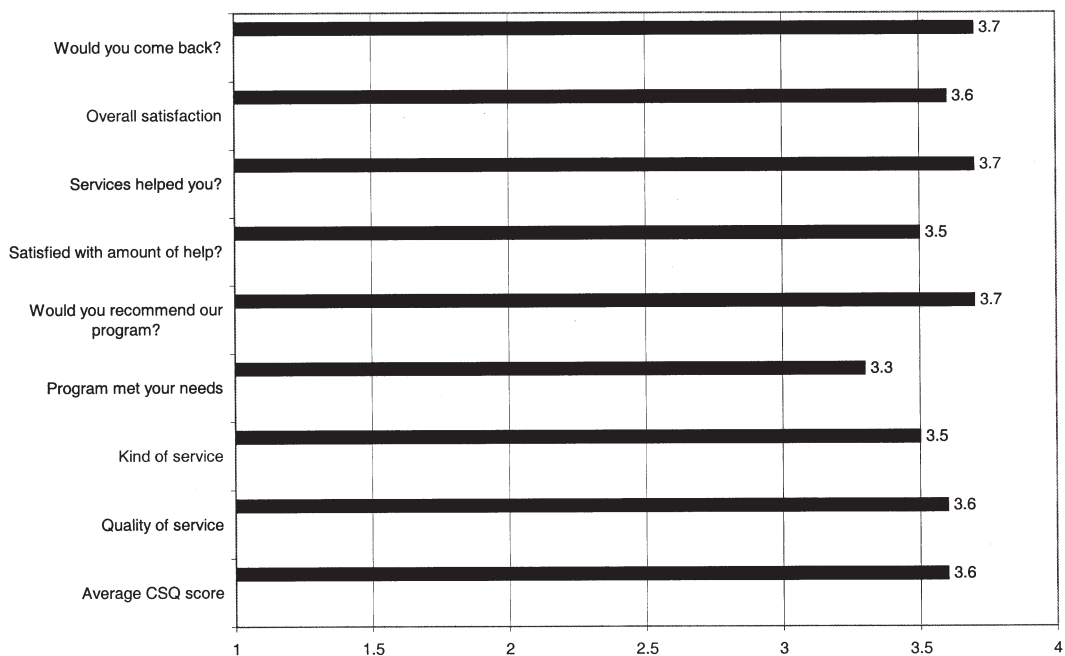


Figure 3. Mean Client Satisfaction Questionnaire (CSQ) score.

as well as Scheffler, Kiser, and Knight (2001), reported that the national average number of IOP treatment days was 21. Consistent with the latter national data, which reported that 83% were diagnosed with an Affective Disorder, 89% of our IOP sample was diagnosed with Major Depression. Whereas the national sample reported 8% with a personality disorder diagnosis, our sample contained 69% who were diagnosed with a personality disorder. While the latter national data report a re-admission rate of 18%, our readmission rate was 8%. Limited follow-up data revealed that the majority of patients continued to report symptomatic improvement with no hospital admissions. Compared to these national data, our patients appear to be somewhat more complicated as a result of personality confounds, but they were treated for fewer sessions and with fewer re-admissions.

It is clear that these patients were very satisfied with the IOP service. Consequently, it is not surprising that nearly all reported that they would refer a friend or family member if the need arose. Perhaps most important, patients reported at the time of discharge, and in the follow-up survey, that they would return to this program for additional services if the need arose. When requested to list things that they found to be the most helpful, nonspecific therapeutic factors such as "caring," "concern," "understanding," and "support" were the most frequently reported

items. The therapy groups and accessibility of the clinical staff and support staff were also repeatedly mentioned as very helpful.

This study demonstrates that a mental health IOP can be a very effective treatment modality that can be carried out in the context of a group private practice setting. Although patients must be screened for severity of pathology, lethality, and manageability, patients with multiple diagnoses, significant levels of psychopathology, and severely disrupted activities in daily living were effectively treated in this setting.

Limitations to the present study include the lack of a randomized control group and the inability to partial out differential treatment effects for medication, group therapies, and no treatment. This is also a selected sample in that these are severely depressed individuals, typically with suicidal ideation, who are able to enter a "no harm" contract. A randomized control design was beyond the scope of ordinary practice patterns. The study aimed to demonstrate the effectiveness of an IOP as it is actually practiced, including the combined effects of medication and group psychotherapies. Hence, whereas these issues are recognized as potential shortcomings of the study, they also reflect actual and typical "real world" practice patterns. In an effort to mitigate threats to the validity of this naturalistic study, RCIs and clinically significant change scores were used to control for measurement

error and to further validate functional change. Additionally, the study was piloted, conducted (Wise, 2000), and replicated with a large sample. All pre- and post-IOP treatment improvements with these severely symptomatic individuals were consistently found to be statistically reliable and clinically significant.

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