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Effectiveness of Mentalization-Focused Dynamic Interpersonal Therapy on Attachment and Self-Differentiation in Patients with Pathological Narcissism: A Single-Subject Design

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Abstract

Introduction: Pathological narcissism is a common disorder in clinical populations, characterized by two distinct yet related presentations, namely grandiose and vulnerable narcissism, and is often associated with insecure attachment and poor self-differentiation. The aim of this study was to investigate the effectiveness of Mentalization-focused Dynamic Interpersonal Therapy (DIT) on attachment and self-differentiation in patients with pathological narcissism.

Method: The research design was a single-subject with baseline, intervention, and follow-up assessments. Six participants with pathological narcissism received Mentalization-focused DIT in weekly individual sessions. The Experiences in Close Relationships-Revised (ECR-R) and the Differentiation of Self Inventory-Revised (DSI-R) were used to measure the study's dependent variables. Cohen's d Effect Size (ES), the Reliable Change Index (RCI), and Percent of Maximum Possible Improvement (PMPI) were used for data analysis.

Results: The findings showed reductions in insecure attachment and increases in self-differentiation across the intervention phase. These changes were generally maintained at the short-term follow-ups conducted three and six weeks after treatment, although some participants showed slight increases in insecure attachment scores during follow-up.

Conclusion: These findings suggest that Mentalization-focused DIT may show promising clinical potential in reducing insecure attachment and increasing self-differentiation among a demographically restricted sample of young, educated adults with pathological narcissism, in this uncontrolled single-subject study (N=6).

Keywords: Pathological Narcissism, Narcissistic Personality Disorder, Attachment, Self-Differentiation, Mentalization-Focused Dynamic Interpersonal Therapy

Introduction

Narcissistic Personality Disorder (NPD) is defined as an exaggerated sense of self-importance, an overwhelming need for admiration, and a general lack of empathy for the feelings of others [1]. The psychodynamic literature on NPD is somewhat confusing because the label seems to apply broadly to patients with quite different clinical pictures [2]. Furthermore, NPD is considered to have the broadest spectrum of severity among all personality disorders [3]. The present DSM categorical formulation of NPD may not fully capture the complex dynamics and broad spectrum of narcissistic patients [4]. NPD and pathological narcissism are often used interchangeably, and they overlap to some extent. Pathological narcissism refers to a broad spectrum of conditions that includes the more specific NPD. Pathological narcissism can be conceptualized as a dimensional diagnosis that exists at different levels of severity and encompasses diverse clinical presentations, rather than considering NPD as a categorical diagnosis [4-5]. This framework is consistent with

transdiagnostic and dimensional models of psychopathology and provides a more integrated approach for research and clinical practice [6]. Numerous studies support the notion that pathological narcissism comprises two subtypes, grandiose and vulnerable, which may coexist, although one presentation is often dominant [7-8]. Both subtypes have been linked to interpersonal antagonism/low agreeableness, low altruism, and tough-mindedness. However, grandiose narcissism has been associated with social dominance, agentic extraversion, and low neuroticism, whereas vulnerable narcissism has been associated with interpersonal distrust and high levels of neuroticism [9-10]. A dimensional conceptualization of pathological narcissism has broad implications for clinical practice, given that patients with grandiose and vulnerable narcissism differ in psychopathology, countertransference reactions, and treatment planning [11-12].

Insecure attachment is characterized by two dimensions, anxiety and avoidance. Higher levels of anxiety reflect concerns about rejection and abandonment, whereas higher levels of avoidance reflect discomfort with intimacy and dependence on others [13]. Several studies have linked pathological narcissism with specific patterns of attachment [14]. In any case, most of the evidence indicates that attachment patterns in pathological narcissism are insecure, with predominantly avoidant attachment in grandiose narcissism and predominantly anxious attachment in vulnerable narcissism [15]. Self-Differentiation describes the ability to distinguish and balance emotional and intellectual functioning while maintaining a healthy equilibrium between intimacy and autonomy, enabling individuals to remain emotionally connected to others without losing their sense of self [16]. Higher levels of self-differentiation are associated with fewer interpersonal problems over time [17]. Findings from previous studies suggest that pathological narcissism is associated with lower levels of self-differentiation. Patients with vulnerable narcissism exhibit heightened emotional reactivity and a strong dependence on external validation. In contrast, patients with grandiose narcissism often emphasize self-sufficiency and emotional cutoff [18].

Research on treating pathological narcissism is extremely limited in both number of studies and reports of success [19]. However, more recently there has been a groundswell of interest in the development of psychotherapies specifically targeted for pathological narcissism [20-21]. Dynamic Interpersonal Therapy (DIT) is an evidence-based, empirically supported treatment whose theoretical principles are derived from attachment theory and object relations theory [22]. Pathological narcissism is closely linked with significant impairments in mentalizing capacity [23-24]. Some studies have shown that mentalization-based treatment is effective in reducing insecure attachment [25-27]. Although DIT and MBT are distinct modalities, they share a significant genealogical overlap, unified by the clinical leadership of Peter Fonagy, the primary architect behind both MBT and DIT protocols. DIT functions as a brief psychodynamic translation of MBT's long-term mentalizing framework. Accordingly, the core technique of DIT, the Interpersonal Narrative (IPN), remains mechanistically isomorphic to the mentalizing processes that underpin MBT's clinical efficacy. Therefore, mentalization-focused interventions can be considered as an appropriate intervention for altering attachment status and improving secure attachment. Because most patients with pathological narcissism seek short-term treatment, there is a need for interventions that can provide lasting therapeutic effects within a limited timeframe. Mentalization-focused DIT is particularly suited to this need, as it aims to achieve durable therapeutic change within a time-limited framework [19, 21-22]. The purpose of this study was to evaluate the potential effectiveness of Mentalization-focused DIT in the treatment of patients with pathological narcissism.

Method

This study used a non-concurrent replicated A-B single-subject design to examine treatment effects, consisting of three phases: baseline, intervention, and follow-up. Six patients with a primary diagnosis of pathological narcissism were selected through purposive sampling from among those presenting to Shiraz University's Psychological Services and Counseling Center in 2025. Inclusion criteria were: (a) willingness to participate in the study; (b) being in the age range of 20 to 29 years; (c) diagnosis of pathological narcissism using the SWAP-II Narcissistic scale (T-score ≥ 60) and PNI (Mean total score ≥ 3); (d) up to high school or higher level of education; (e) disturbed interpersonal relationships; (f) No current psychological or psychiatric care; and (g) able to complete treatment. Exclusion criteria were: (a) comorbidity with borderline personality disorders (T-score < 60 on the SWAP-II Borderline scale); (b) endorsement of active psychosis; (c) severe suicidal ideation and intent; (d) engagement in self-injurious behaviors; (e) alcohol or drug addiction; and (f) psychotropic medication usage.

The tools used in this study were as follows:

Shedler-Westen Assessment Procedure (SWAP-II): The SWAP is a comprehensive clinician-rated instrument designed to assess personality disorders. This assessment tool consists of 200 personality-descriptive statements, each of which may describe a given patient well, somewhat, or not at all. Clinicians rate each statement based on their clinical judgment derived from clinical interviews. These rated statements are then sorted by the clinician into eight categories, progressing from "least descriptive" to "most descriptive" of the patient [28]. The SWAP-II trait personality scales demonstrated good test–retest reliability (average r = .85) and acceptable internal consistency (average α ≈ .73) in clinical samples [29]. For the Persian version of the SWAP, studies reported adequate diagnostic validity [30] and acceptable concurrent validity with the Millon Clinical Multiaxial Inventory-IV [31].

Pathological Narcissism Inventory (PNI): The PNI is a self-report instrument designed to assess pathological narcissism. This inventory consists of 52 statements that

participants respond to on a 6-point Likert-type scale ranging from "not at all like me" to "very much like me". The PNI subscales are organized into two higher-order dimensions, including narcissistic grandiosity and narcissistic vulnerability. Multiple studies have established the psychometric properties of the PNI and suggest that it is well suited for the assessment of pathological narcissism [32]. For the Persian version of the PNI, Cronbach's alpha coefficients for all subscales ranged from 0.57 to 0.89, and the test-retest reliability coefficients ranged from 0.69 to 0.83 over a 15-day period. Confirmatory factor analysis supported the validity of the narcissistic grandiosity and narcissistic vulnerability factors of the PNI [33].

Experience of Close Relationship Scale Revised (ECR-R): The ECR-R is a self-report instrument designed to assess insecure attachment in adults. This questionnaire consists of 36 items that participants respond to on a 7-point Likert-type scale ranging from "strongly disagree" to "strongly agree". The ECR-R is organized into two attachment dimensions, including attachment anxiety and attachment avoidance. Higher scores indicate greater attachment avoidance or attachment anxiety. Previous research has demonstrated the high reliability and validity of the two ECR-R scales [34]. For the Persian version of the ECR-R, Cronbach's alpha coefficients were 0.88 for attachment anxiety and 0.89 for attachment avoidance. Three-week test–retest reliability coefficients were 0.91 for attachment anxiety and 0.93 for attachment avoidance. Confirmatory factor analysis supported a two-factor structure consisting of the anxiety and avoidance dimensions [35].

Differentiation of Self Inventory Revised (DSI-R): The DSI-R is a self-report instrument designed to assess self-differentiation in adults. This inventory consists of 46 items that participants respond to on a 6-point Likert-type scale ranging from "not at all true of me" to "very true of me". The DSI-R subscales include Emotional Reactivity (ER), I-Position (IP), Emotional Cutoff (EC), and Fusion with Others (FO). Higher scores indicate greater levels of differentiation of self. Cronbach's alpha coefficients for the subscales of the inventory ranged from 0.81 to 0.89, and the internal consistency coefficient for the total scale was 0.92 [36]. For the Persian version of the DSI-R, Cronbach's alpha coefficients for the subscales ranged from 0.55 to 0.75, and the internal consistency coefficient for the total scale was 0.77 [37].

The treatment protocol comprised sixteen individual therapy sessions for each participant. Therapy sessions were conducted once a week, with each session lasting 60 minutes. Treatment was delivered by the first author, who was a doctoral candidate with previous experience in treating narcissistic patients. All treatment sessions were conducted under the weekly clinical supervision of the corresponding author. The first author's clinical performance was discussed during weekly supervision to promote fidelity to the treatment model while ensuring that interventions were informed by individualized case formulation. Brief descriptions of Mentalization-focused DIT processes are presented in Table 1. The treatment typically adhered to the outline presented in Table 1, although the specific content of therapy was adjusted to the idiosyncrasies of the patient. Baseline assessments were performed three times, with one week between each assessment. Five sessions (4th, 7th, 10th, 13th, and 16th) were designated as assessment points for treatment. Follow-up assessments were performed at three and six weeks after treatment.

Table 1. Treatment Process

The initial phase (sessions 1-4)	Establishing a therapeutic relationship characterizing basic attachment patterns Identifying patient's significant relationships and their connection with presenting problems Assessing the patient's current and past interpersonal functioning to identify recurring interpersonal patterns Reaching agreement with the patient on the formulation, treatment rationale, and goals
The middle phase (sessions 5-12)	Maintaining the focus on the patient's mind and mentalizing deficits Highlighting underlying distorted representations of self and others Helping the patient to confront and integrate the conflicting internal object relations Enhancing mentalizing capacity Making transference interpretations Interpreting the patient's defenses Encouraging the patient to try out new ways of communicating with others
The ending phase (sessions 13-16)	Facilitating the expression of patient's anxieties and fantasies about ending Reviewing the work that has been accomplished Acknowledging the progress made Anticipating future difficulties and areas of vulnerability

Results

The demographic characteristics of participants have been presented in Table 2. Participants had a mean age of 24.50 years (SD = 2.81).

All participants completed the ECR-R and DSI-R during the baseline, treatment, and follow-up phases. Means and standard deviations across study phases for Attachment Anxiety and Attachment Avoidance across participants are presented in Table 3. Means and standard deviations across study phases for differentiation of self across participants are presented in Table 4.

Table 2. Participants' Demographic Characteristics

Participant	Sex	Age	Level of Education	Relationship Status	Occupation	Previous treatment
1	Male	21	Bachelor's student	Engaged	Student and Self-employed	No
2	Female	23	Bachelor's student	Single	Student	Yes
3	Male	26	Master's student	Engaged	Student and Employed	No
4	Female	29	Master's student	Married	Student	Yes
5	Female	25	Bachelor's degree	Married	Unemployed	Yes
6	Male	23	Associate degree	Single	Employed	Yes

Table 3. Mean and Standard Deviation of ECR-R Subscales Across Study Phases

Participant	Subscale	Baseline Mean ± SD	Intervention Mean ± SD	Follow-up Mean ± SD
1	Attachment Anxiety	60.3 ± 1.5	59.4 ± 4.6	49.5 ± 0.7
	Attachment Avoidance	108.7 ± 7.6	95.4 ± 12.7	67.0 ± 1.4
2	Attachment Anxiety	80.0 ± 2.0	73.6 ± 6.1	63.0 ± 1.4
	Attachment Avoidance	103.7 ± 4.2	85.4 ± 8.4	68.0 ± 5.7
3	Attachment Anxiety	60.0 ± 2.0	54.4 ± 4.4	46.0 ± 1.4
	Attachment Avoidance	98.0 ± 4.6	76.8 ± 17.6	54.5 ± 2.1
4	Attachment Anxiety	109.3 ± 12.5	85.2 ± 20.1	70.0 ± 8.5
	Attachment Avoidance	81.3 ± 1.5	68.4 ± 9.9	55.0 ± 2.8
5	Attachment Anxiety	90.7 ± 2.5	61.2 ± 11.3	50.0 ± 4.2
	Attachment Avoidance	56.7 ± 4.0	41.2 ± 7.5	35.0 ± 1.4
6	Attachment Anxiety	105.3 ± 3.5	81.4 ± 22.6	60.5 ± 2.1
	Attachment Avoidance	70.0 ± 3.0	54.4 ± 10.2	45.0 ± 1.4

Note. Values are Mean ± Standard Deviation (M ± SD). Baseline = 3 measurement points; Intervention = 5; Follow-up = 2.

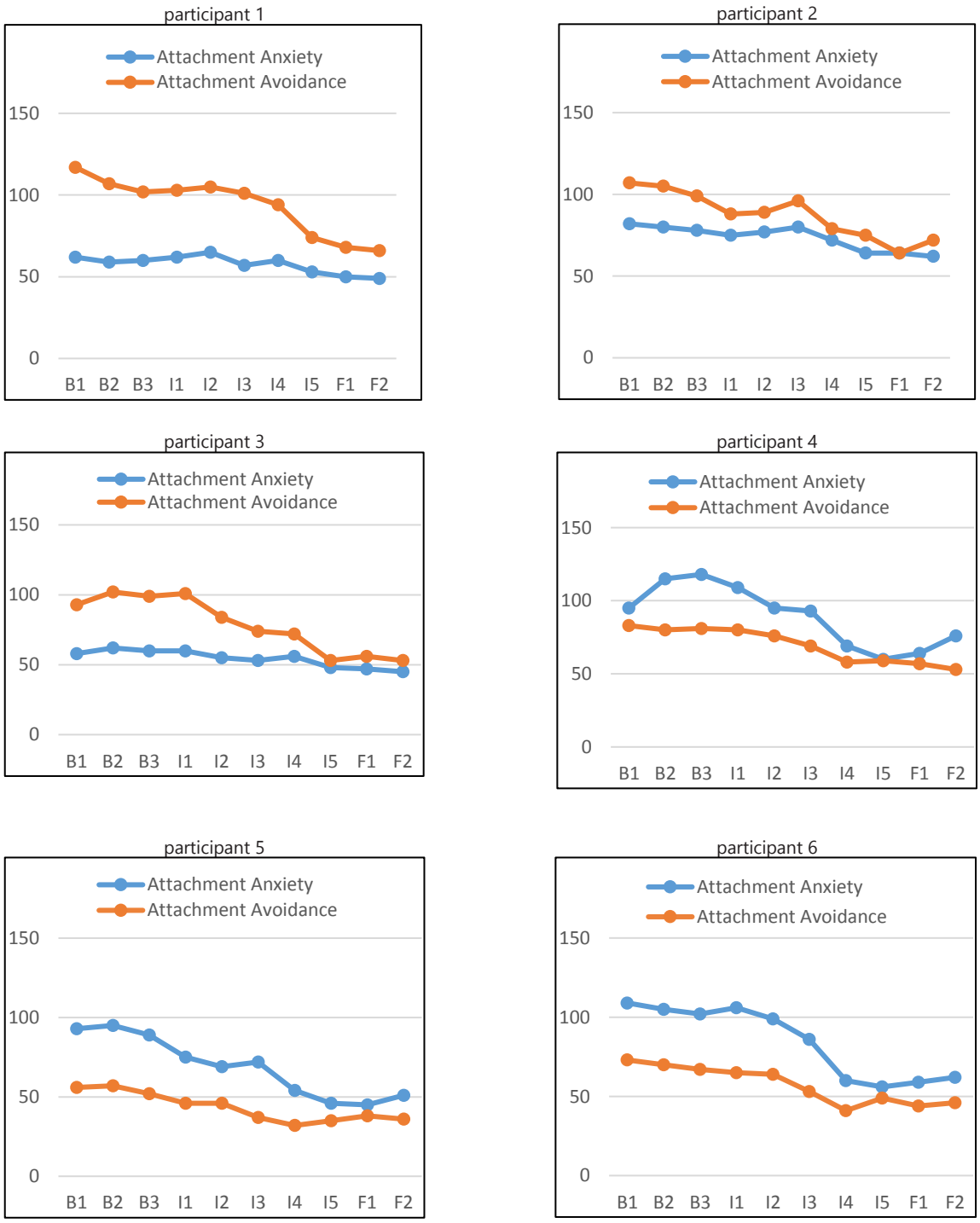
As shown in Table 3, descriptive trends indicated an overall reduction in mean scores for both attachment anxiety and attachment avoidance across all participants from baseline to intervention, with lower mean levels maintained at follow-up. Correspondingly, descriptive trends in Table 4 shows an overall increase in total differentiation of self-mean scores across the study phases.

Changes in attachment dimensions (ECR-R anxiety and avoidance) and differentiation of self (DSI-R) for each participant across study phases have been presented in Figures 1 and 2, respectively.

Table 4. Mean and Standard Deviation of DSI-R Subscales Across Study Phases

Participant	Subscale	Baseline Mean ± SD	Intervention Mean ± SD	Follow-up Mean ± SD
1	Emotional Reactivity	25.3 ± 2.9	32.4 ± 6.9	43.0 ± 1.4
	I-Position	43.3 ± 1.5	48.8 ± 2.3	51.0 ± 0.0
	Emotional Cutoff	30.7 ± 3.5	38.2 ± 6.3	49.5 ± 0.7
	Fusion with Others	22.3 ± 2.9	28.8 ± 8.0	45.0 ± 1.4
2	Emotional Reactivity	12.7 ± 1.2	23.4 ± 9.2	34.5 ± 2.1
	I-Position	23.7 ± 2.1	32.4 ± 5.9	42.5 ± 2.1
	Emotional Cutoff	28.3 ± 1.5	35.0 ± 8.0	48.0 ± 2.8
	Fusion with Others	17.7 ± 2.9	28.0 ± 7.8	38.0 ± 0.0
3	Emotional Reactivity	25.3 ± 2.1	32.6 ± 7.6	46.0 ± 0.0
	I-Position	30.7 ± 2.9	43.0 ± 7.8	55.0 ± 2.8
	Emotional Cutoff	24.3 ± 1.5	37.0 ± 9.4	50.0 ± 4.2
	Fusion with Others	27.0 ± 2.0	35.0 ± 8.3	44.0 ± 2.8
4	Emotional Reactivity	17.0 ± 2.0	32.0 ± 13.2	45.0 ± 4.2
	I-Position	22.3 ± 1.5	31.0 ± 7.3	42.0 ± 0.0
	Emotional Cutoff	38.7 ± 3.1	42.8 ± 3.6	50.0 ± 1.4
	Fusion with Others	24.7 ± 1.5	34.6 ± 8.3	44.5 ± 2.1
5	Emotional Reactivity	32.3 ± 2.1	38.0 ± 6.9	49.5 ± 2.1
	I-Position	29.3 ± 2.5	37.6 ± 6.4	49.5 ± 0.7
	Emotional Cutoff	26.3 ± 2.3	38.2 ± 8.5	49.0 ± 1.4
	Fusion with Others	38.3 ± 2.1	43.6 ± 7.3	54.5 ± 2.1
6	Emotional Reactivity	16.3 ± 1.5	28.0 ± 11.0	42.0 ± 1.4
	I-Position	19.7 ± 2.1	32.6 ± 8.9	45.0 ± 1.4
	Emotional Cutoff	28.0 ± 1.7	38.4 ± 6.3	47.5 ± 0.7
	Fusion with Others	21.7 ± 1.2	31.6 ± 7.9	43.5 ± 2.1

Note. Values are Mean ± Standard Deviation (M ± SD). Baseline = 3 measurement points; Intervention = 5; Follow-up = 2.

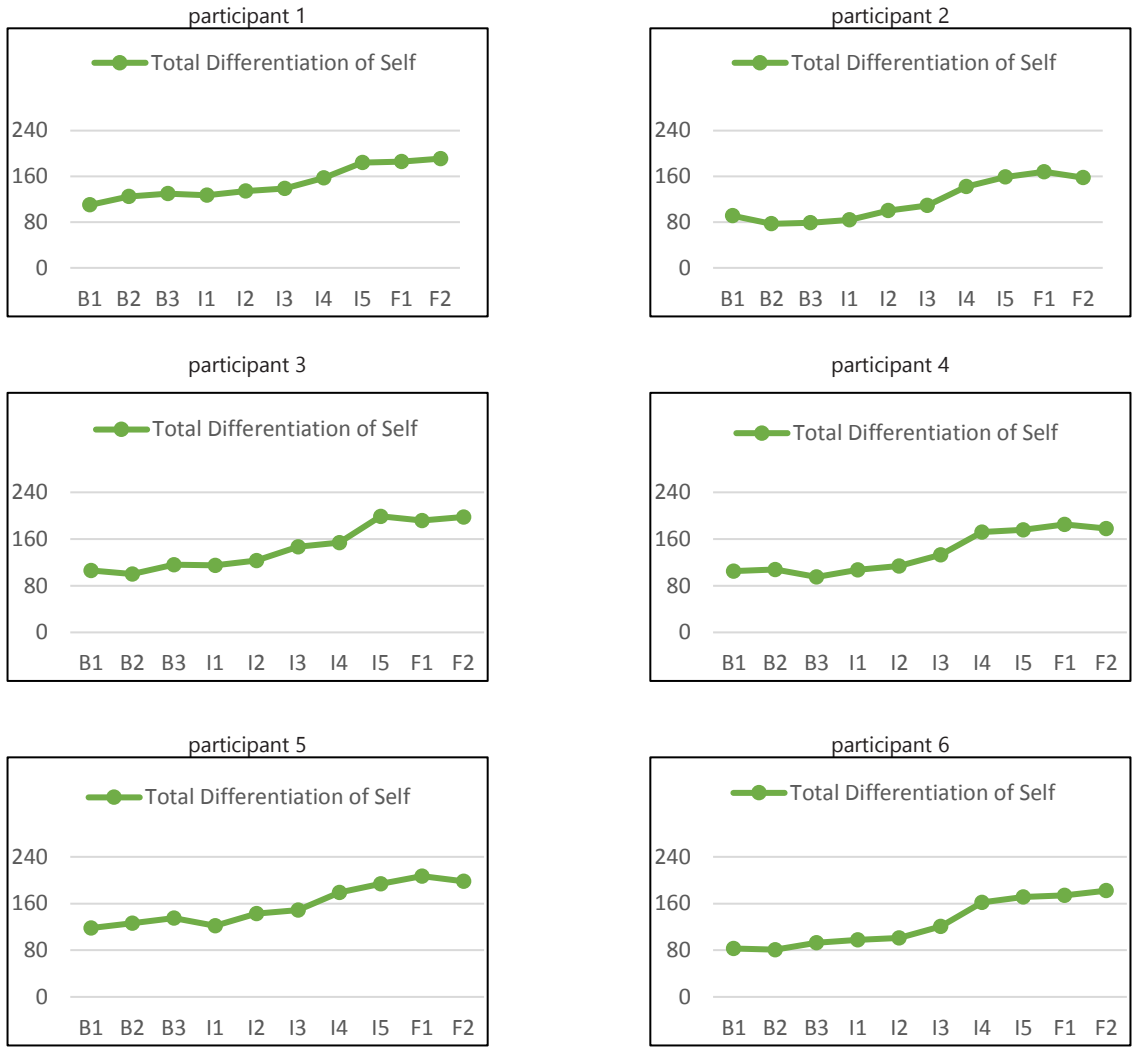


Note. ECR-R = Experiences in Close Relationships-Revised; B = baseline; I = intervention; F = follow-up. Blue lines represent Attachment Anxiety, and orange lines represent Attachment Avoidance.

Figure 1. Attachment anxiety and avoidance scores (ECR-R) across study phases for all participants.

Visual inspection of Figure 1 shows relatively stable baselines for both attachment dimensions. Following the intervention, a general downward trajectory was noted, and these reductions appeared to be largely maintained at the follow-up stage; however, individual variations in the immediacy and steepness of response were evident, with some participants exhibiting minor fluctuations or slight increases in anxiety or avoidance during the intervention or follow-up phases.

Visual inspection of Figure 2 indicates relatively stable baseline trajectories across participants, followed by an overall upward trend in total differentiation of self (DSI-R) upon initiating the intervention. Although minor individual variations in the rate of change were evident, these observed increases were generally maintained across the follow-up phase, with some participants displaying minor fluctuations during intervention or follow-up.



Note. DSI-R = Differentiation of Self Inventory-Revised; B = baseline; I = intervention; F = follow-up.

Figure 2. Differentiation of self-total scores (DSI-R) across study phases for all participants.

Table 5. Baseline and Follow-up Coefficients of Variation and Relative Level Changes Across Study Phases

	Participant	Baseline CV	RLC (B→I)	RLC (I→F)	RLC (B→F)	Follow-up CV
Attachment Anxiety	1	2.53%	3.33%	-5.66%	-16.67%	1.43%
	2	2.50%	-3.85%	0.00%	-17.95%	2.24%
	3	3.33%	0.00%	-2.08%	-21.67%	3.07%
	4	11.44%	-7.63%	6.67%	-45.76%	12.12%
	5	2.78%	-18.18%	-6.00%	-46.59%	8.49%
	6	3.33%	3.92%	5.36%	-42.16%	3.51%
Attachment Avoidance	1	7.03%	0.98%	-8.11%	-33.33%	2.11%
	2	4.02%	-11.11%	-14.67%	-35.35%	8.32%
	3	4.68%	2.02%	5.66%	-43.43%	3.89%
	4	1.88%	-1.23%	-3.39%	-29.63%	5.14%
	5	7.13%	-7.55%	16.13%	-32.08%	4.04%
	6	4.29%	-2.99%	-10.20%	-34.33%	3.14%
Self-differentiation	1	8.65%	-2.31%	+1.09%	+43.08%	1.87%
	2	9.29%	+6.33%	+5.66%	+112.66%	4.34%
	3	7.63%	-0.86%	-3.52%	+65.52%	2.18%
	4	6.78%	+12.63%	+5.11%	+94.74%	2.73%
	5	6.75%	-9.63%	+6.70%	+53.33%	3.14%
	6	7.58%	+5.38%	+1.75%	+87.10%	3.17%

Note. CV = Coefficient of Variation; RLC = Relative Level Change; B = Baseline (B1–B3); I = Intervention (I1–I5); F = Follow-up (F1–F2). RLC represents the percentage change between the final data point of one phase and the first data point of the subsequent phase. Negative RLC values indicate improvement in attachment insecurity (Anxious and Avoidant), whereas positive RLC values indicate improvement in Differentiation of Self.

Baseline and follow-up Coefficients of Variation (CVs) alongside between-phase Relative Level Changes (RLCs) across study phases for Attachment Anxiety, Attachment Avoidance, and differentiation of self are presented in Table 5. Attachment dimensions and differentiation of self, remained relatively stable during the baseline phase for all participants (baseline CVs < 10%), with the sole exception of participant 4 in Attachment Anxiety. RLCs from baseline to intervention (B→I) showed that an immediate expected change did not occur across all participants. For Attachment Anxiety, participants 2, 4, and 5 showed initial decreases, participants 1 and 6 showed initial increases, and participant 3 remained stable. For attachment avoidance, participants 2, 4, 5, and 6 exhibited initial decreases, while participants 1 and 3 showed initial increases. Regarding Differentiation of Self, participants 2, 4, and 6 demonstrated immediate increases, while participants 1, 3, and 5 exhibited initial decreases. Relative level changes from intervention to follow-up (I→F) reflected the maintenance of changes observed during the intervention, alongside minor score fluctuations in some participants. For Attachment Anxiety, participants 1, 3, and 5 decreased, participants 4 and 6 increased, and participant 2 remained stable. For Attachment Avoidance, participants 1, 2, 4, and 6 decreased, while participants 3 and 5 increased. Regarding Differentiation of Self, participants 1, 2, 4, 5, and 6 increased, while participant 3 showed a slight decrease. Relative level changes from baseline to follow-up (B→F) showed consistent changes in the expected directions across all participants, where scores for both Attachment Anxiety and Attachment Avoidance decreased, while scores for Differentiation of Self increased. Attachment Dimensions and Differentiation of Self, remained relatively stable during the follow-up phase for all participants (follow-up CVs < 10%), with the sole exception of participant 4 in Attachment Anxiety.

The effect size (ES), Reliable Change Index (RCI), and Percent of Maximum Possible Improvement (PMPI) were presented in Table 5. Cohen's effect sizes were used to compare the magnitude of change between study phases. According to standard guidelines, *d* values of 0.20–0.49 indicate a small effect size, 0.50–0.79 a medium effect size, and 0.80 or greater a large effect size [38]. Large effect sizes were observed across between-phase comparisons for Differentiation of Self in all participants, and across the majority of between-phase comparisons for Attachment Anxiety and Attachment Avoidance, with exceptions only for participant 1 from baseline to intervention (ES=0.24) and participant 5 from intervention to follow-up (ES=0.38). The RCI was calculated by dividing the difference between pretest and posttest scores by its standard error. Since the outcomes are z scores, they are considered statistically significant when their absolute values are ≥ 1.96. An RCI greater than 1.96 also indicates that the results are not due to random variation and that the improvement is the result of the therapeutic intervention [39]. During the baseline-to-intervention comparison, reliable change in Differentiation of Self was demonstrated by all participants except participant 1 (RCI=1.93). For insecure attachment dimensions, reliable change was observed in Attachment Anxiety for participants 4, 5, and 6, and in Attachment Avoidance for all participants except participant 4 (RCI=−1.91). During the intervention-to-follow-up comparison, all participants achieved reliable change in Differentiation of Self. In contrast, reliable change in insecure attachment dimensions was maintained for subsets of participants: participants 4, 5, and 6 for Attachment Anxiety, and participants 1, 2, 3, and 4 for Attachment Avoidance.

Percent of Maximum Possible Improvement (PMPI) is a simple way to quantify the amount of improvement relative to the maximum possible improvement [40]. For the purposes of the present study, PMPI values above 50% were interpreted as indicating high improvement, values between 25% and 49% as moderate improvement, and values below 25% as small improvement. From baseline to follow-up, participants 5 and 6 showed substantial improvement in Attachment Anxiety (PMPI > 50%), whereas the remaining participants showed moderate improvement (25% ≤ PMPI ≤ 49%). For Attachment Avoidance, only participant 3 demonstrated substantial improvement (PMPI > 50%), while all other participants showed moderate improvement (25% ≤ PMPI ≤ 49%). Similarly, participants 3 and 5 showed substantial improvement in differentiation of self (PMPI > 50%), whereas the remaining participants showed moderate improvement (25% ≤ PMPI ≤ 49%).

Discussion

The purpose of the current research was to determine the effectiveness of Mentalization-focused DIT on attachment and self-differentiation in patients with pathological narcissism using a single-subject design. The results of the statistical analyses showed a reliable reduction in insecure attachment and a reliable increase in self-differentiation from baseline to follow-up. Despite differences in therapeutic frameworks and study populations, these findings share a close conceptual affinity with the studies by Drozek and Unruh [24], Hauber et al. [25], Khabir et al. [26], Tahmasebiashtiani et al. [27], which indicate that mentalization-focused interventions were able to shift attachment patterns in the direction of greater security.

To explain these findings, it is worth noting that some participants did not exhibit immediate changes at the first intervention-phase assessment but showed gradual improvement over the course of the intervention. Furthermore, several participants demonstrated additional improvement during the follow-up phase. This pattern may be interpreted as reflecting a delayed treatment effect, suggesting that, for some participants, therapeutic changes became evident after several treatment sessions and, for others, continued to develop following the completion of treatment.

The dual focus on process and content is a key feature of DIT. Intrapsychic and interpersonal patterns of behavior interact with one another, mutually influencing and reinforcing each other. Mentalization-focused interventions within DIT aim to support a therapeutic process in which the mind of the patient is the focus of

the treatment. A key therapeutic aim is to support patients' capacity to mentalize by fostering a deeper understanding of their own and others' mental states. This reflective focus may help patients recognize how distortions in interpreting these mental states contribute to maladaptive interpersonal patterns and defensive attempts to maintain psychological stability [22]. In work with narcissistic patients it is important to clarify the dynamics of the way the patient is relating to the therapist before focusing on content. In this way we can monitor and modify what happens both within the patient and between the patient and others [20-21]. Full mentalization, defined as the integration of cognition and affect, represents a central mechanism of psychotherapeutic change in which affective and cognitive processes are seamlessly integrated, enabling changes that occur over the course of treatment to be translated into enduring therapeutic outcomes [20-21]. Enhancing mentalizing capacity may contribute to improvements in self-differentiation. A key characteristic of self-differentiation is the ability to maintain a cohesive sense of self in close relationships. New mental representations based on new models of relatedness that develop during treatment lead to the formation of a cohesive sense of self and greater tolerance of a range of affects, resulting in lower emotional reactivity in close relationships. Self-differentiation is reflected in greater capacity to manage emotional reactivity and more mature interpersonal functioning [16-17].

As an initial investigation, this study included a relatively small number of participants. Therefore, caution is warranted when generalizing the findings to a broader population. Future studies with larger samples are needed to further establish the generalizability of the present findings. As the participants in this study were between 20 and 29 years of age, caution is warranted when generalizing the findings to other age groups. The follow-up period of three and six weeks post-intervention constrains conclusions regarding long-term treatment durability. Longer follow-up periods (three or six months) would provide more informative data on the long-term maintenance of treatment effects.

Table 6. Effect Size (ES), Reliable Change Index (RCI), and Percent of Maximum Possible Improvement (PMPI) Across Study Phases

	Participant	ES (B→I)	ES (I→F)	RCI (B→I)	RCI (I→F)	PMPI (B→I)	PMPI (I→F)	PMPI (B→F)
Attachment Anxiety	1	0.24	2.39	-0.12	-1.31	2.20%	23.91%	25.59%
	2	1.25	1.93	-0.85	-1.41	10.32%	19.06%	27.42%
	3	1.49	2.11	-0.74	-1.11	13.33%	23.08%	33.33%
	4	1.34	0.83	-3.20*	-2.02*	26.42%	22.62%	43.07%
	5	2.80	1.33	-3.86*	-2.02*	39.19%	33.63%	59.64%
	6	1.29	1.03	-3.17*	-2.77*	27.40%	32.97%	51.34%
Attachment Avoidance	1	1.18	2.50	-1.96*	-4.19*	14.63%	36.69%	45.96%
	2	2.52	2.20	-2.70*	-2.57*	21.32%	25.82%	41.63%
	3	1.45	1.42	-3.13*	-3.29*	26.50%	37.93%	54.37%
	4	1.60	1.50	-1.91	-1.98*	20.42%	26.59%	41.58%
	5	2.88	0.38	-2.33*	-0.32	42.70%	10.38%	48.65%
	6	1.84	1.03	-2.30*	-1.39	30.00%	25.82%	48.08%
Self-differentiation	1	1.35	1.96	1.93	3.05*	17.19%	31.53%	43.30%
	2	1.42	1.59	2.66*	3.34*	18.83%	28.12%	41.65%
	3	1.47	1.60	2.93*	3.58*	23.87%	36.92%	51.98%
	4	1.42	1.43	2.75*	3.11*	21.77%	30.31%	45.48%
	5	1.29	1.74	2.26*	3.41*	20.76%	38.03%	50.89%
	6	1.60	1.55	3.27*	3.58*	23.61%	32.60%	48.51%

Note. ES = Cohen's d effect size (positive values reflect reduction in symptoms/improvement); RCI = Reliable Change Index (negative values reflect score reduction, positive values reflect score increase; |RCI| ≥ 1.96 denotes statistically reliable change, $p < .05$); For RCI calculations, the reliability coefficients (α) and standard errors of measurement (SEM) were utilized: Attachment Anxiety (α = .93, SEM = 5.33), Attachment Avoidance (α = .95, SEM = 4.79), and Self-Differentiation (α = .87, SEM = 6.61); PMPI = Percentage of Maximum Possible Improvement.

Conclusion

The results of the present study suggest that Mentalization-focused DIT may show promising clinical potential in reducing insecure attachment and increasing self-differentiation among a demographically restricted sample of young, educated adults with pathological narcissism. Given the small sample size and short follow-up period, additional research is required to further evaluate the efficacy of this intervention and determine whether its therapeutic benefits are maintained over time. If future studies confirm the present findings, Mentalization-focused DIT could become a valuable treatment approach for this clinical population.

Conflict of Interest

The authors declare no conflict of interest.

Ethical Approval

All study procedures were registered and approved by the Research Ethics Committee, Faculty of Educational Sciences and Psychology, Shiraz University (Approval ID: IR.US.PSYEDU.REC.1404.054) on July 9, 2025.

Declaration of Generative AI and AI-Assisted Technologies

During the preparation of this work no AI tools were used.

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