

Comparison of the Effectiveness of Acceptance and Commitment Couple Therapy with Emotion-focused Couple Therapy on Sexual Attitude of Infertile Women

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Abstract

Aim: The purpose of this study is to compare the effects of Acceptance and Commitment Couple Therapy and Emotion-Focused Couple Therapy on infertile women's sexual attitudes.

Method: This quasi-experimental investigation included a pre-test, post-test, and follow-up design, with a control group. The statistics population comprised all infertile women aged 25 to 45 with infertility for more than five years, a total of 171 women who visited the Novin Infertility Clinic in Mashhad in 2022. 45 participants who met the inclusion criteria were chosen and matched according to education level and length of infertility. They were divided equally into three groups of fifteen each. Following the pre-test, the experimental groups were assigned to either the Acceptance and Commitment Couple Therapy based on Hayes and Strosahl's (2010) or the Emotion-Focused Couple Therapy based on Johnson's (2008) treatment programs, which consisted of eight weekly 90-minute sessions. Following this, a post-test and a three-month follow-up were conducted. The research tool used was the Dehghani Sexual Attitude Questionnaire (2005). Data were analyzed using SPSS-27 through Repeated Measure ANOVA.

Findings: The results revealed a substantial difference in the efficacy of Acceptance and Commitment Couple Therapy and Emotion-Focused Couple Therapy in altering sexual attitudes among infertile women. Both therapy were successful, however Acceptance and Commitment Couple Therapy produced more consistent outcomes during the follow-up period. Although Emotion-Focused Couple Therapy increased sexual attitude posttest scores compared to the pre-test, the results did not remain constant in the follow-up phase, with a little decrease. Both medications were beneficial, although Acceptance and Commitment Couple Therapy had a longer-lasting influence.

Conclusion: The findings emphasize the importance of considering the long-term efficacy of therapeutic interventions in addressing infertile women's psychological and emotional needs. Further research could explore the mechanisms contributing to Acceptance and Commitment Couple Therapy's sustained impact and explore additional factors influencing their effectiveness.

Keywords: Acceptance and Commitment Couple Therapy, Emotion-Focused Couple Therapy, Sexual Attitude, Infertility.

Introduction

Infertility is defined as the inability to conceive after one year of unprotected sexual intercourse (Vander Borgh & Wyns, 2018). According to the World Health Organization, infertility is defined as the inability to conceive after a 24-month period of trying, and women who can conceive but experience recurrent miscarriages are also considered infertile (Deshpande & Gupta, 2019). This condition affects approximately 10 to 12 percent of couples worldwide (Maroufizadeh et al., 2018). Studies on the factors influenced by infertility, like those by Dourou et al. (2023) and Yoon & Deiss (2022), reveal that infertility affects marital identity, disrupting the dynamics and natural progression of a couple's sexual life. Additionally, Bokaei et al. (2015) noted in their study that infertility poses a significant challenge to the sexual lives of couples, particularly infertile women. When pregnancy does not occur, infertile women may feel that sexual intercourse is unproductive, leading to a gradual decrease in sexual desire. Infertile women gradually forget that their sexual relationship is also a response to their natural needs.

In infertile couples, sexual attitudes towards intercourse and even sexual satisfaction undergo changes. Given that sexual attitudes and knowledge are fundamental psychological components of sexual problems, it can be concluded that one of the key issues in treating sexual problems, and one that requires initial intervention, is the alteration and enhancement of individuals' attitudes towards sexual matters. Research has shown that infertility can significantly affect sexual satisfaction and attitudes, often leading to decreased sexual desire and increased sexual dysfunction (Katuzian et al., 2023). Addressing these psychological components through therapeutic interventions can play a crucial role in improving the sexual well-being of infertile couples. Effective therapies, such as Acceptance and Commitment Therapy and Emotion-Focused Therapy, focus on modifying negative sexual attitudes and enhancing sexual knowledge, which can lead to improved sexual satisfaction and overall relationship quality (Kargar et al., 2024; Koochi Kamali et al., 2020; Rostamkhani et al., 2022).. Sexual attitude refers to an individual's beliefs about sexual activities and roles and represents a positive or negative mindset in interpreting sexual events and relationships, functioning through cognitive, behavioral, and emotional dimensions (Shamsian, 2019; Fisher, 2022). Sexual attitudes can generally be categorized as either liberal or conservative. Individuals with a liberal attitude have an open and flexible perspective on sexual issues such as sexual roles, satisfaction, and various sexual activities. Conversely, conservative individuals are less inclined to accept views related to sexual matters and exhibit less flexibility (Blance, 2021).

Douch et al. (2016) found in their research that sexual satisfaction is related to both explicit and implicit sexual attitudes. Additionally, Rakhshani et al. (2023) demonstrated that The study found that knowledge, sexual attitude, and quality of life are significant predictors of marital satisfaction in aged couples over 60 in southern Iran. Furthermore, research has shown that sexual attitude is directly related to marital satisfaction in infertile individuals, with this direct relationship being more reported among infertile men (Bokaei et al., 2018). It has also been established that infertile women hold dysfunctional beliefs, and 56% of sexual dysfunctions in women result

from these dysfunctional beliefs and negative attitudes, leading to psychological distress and a lower quality of sexual life (Shamsian, 2019).

One of the cognitive-behavioral therapies that can mitigate the negative effects of this psychological characteristic is couple therapy. Couple therapy is a method for resolving the problems and conflicts of couples who are unable to solve their issues on their own. Emotion-Focused Couple Therapy (EFCT) is a short-term, structured approach consisting of 8 to 20 sessions. It was first implemented for couples with marital disorders by Susan Johnson and Les Greenberg in the 1980s (Dalglish et al., 2015). This approach is based on experiential therapy and focuses on positive and negative communication patterns related to the love between partners. EFCT is typically used for couples where one or both partners suffer from psychological issues such as depression, addiction, post-traumatic stress disorder, and chronic illnesses (Hardy & Fisher, 2018). The theoretical basis of EFCT lies in concepts of adult love, attachment styles, and marital distress. The emphasis of EFCT is on fostering adaptive attachment methods through mutual care, support, and attention to the needs of oneself and one's partner (Johnson, 2007, as cited in Fatemi Asl et al., 2019). Wiebe and Johnson (2016) argue that due to its structured nature and step-by-step treatment plan for couples, EFCT is more effective than other approaches and has a significantly lower risk of relapse. The emotion-focused approach highlights the role of emotions and emotional regulation in individual attachments, pointing to the crucial role of emotions and communication in organizing interaction patterns and emotions (Karukiwi et al., 2014). The emotion-focused approach to marital relationships, alongside the behavioral approach, has garnered the most research attention (Denton et al., 2012).

Considering that EFCT identifies and expands on two main areas—emotional experiences and interpersonal interactions—the therapy goals are shaped accordingly. The primary goal is to access and then reprocess specific emotional responses that underlie restrictive and repetitive interaction patterns. This facilitates the transformation of interactional positions, revealing the fundamental structures of secure attachment. The second therapeutic goal is to create new interactional events, redefining the relationship as a soothing haven for the partners (Fatemi Asl et al., 2019).

Another approach that has been examined for its impact on family and couple functioning is Acceptance and Commitment Couple Therapy (ACCT), which derives its name from its core message: "Accept what is out of your personal control, and commit to actions that enrich your life" (Hosseini Nejad & Bayan Fard, 2021). ACCT is a process-oriented approach recognized as one of the third-wave psychotherapies (Powell et al., 2009). ACCT is a form of clinical behavior analysis used in psychotherapy, focusing on mindfulness, specific methods of being present in the moment without judgment, acceptance (openness, willingness to stay connected), and developing skills to respond to uncontrollable experiences. This helps individuals commit to personal values, reducing worries and eliminating unwanted thoughts, emotions, and feelings (Angiola & Bowen, 2013).

ACCT emphasizes controlling the content of thoughts and emotions, encouraging individuals to be more aware of their decisions and committed to them (Van Dillen & Andrade, 2015). According to ACCT, various human behaviors are influenced by life conditions (early childhood, middle and late childhood, and early adolescence). In other words, an individual's background and experiences shape romantic and loving behaviors, and verbal interactions during childhood and late childhood and sexual maturity affect future couple relationships. Therefore, according to the relational frame theory, language and verbal interactions enrich the experience of love and intimacy while also creating problems that can be addressed through ACCT (Hahn et al., 2019). This therapeutic approach helps clients achieve a more valuable and satisfying life by increasing psychological flexibility. The nature of communication between couples can be a key factor in creating flexibility and reducing or increasing the risks associated with adverse events and unfavorable conditions (Hosseini Nejad & Bayan Fard, 2021). A critical review of studies attempting to use psychological therapies to help infertile women overcome their psychological problems reveals that most methods employed have not adequately considered the environmental and cultural compatibility required in the treatment process. This issue has gained significant attention in recent years. Additionally, considering that infertile women need to eliminate psychological weaknesses and harms, while also strengthening positive psychological traits, there is a notable lack of specific approaches in both domestic and international research that assess the therapeutic effects of couple therapy on infertile women. This highlights deficiencies in existing couple therapy approaches that need to be addressed. The couple therapy approaches applied to ordinary couples may not be adequately effective for treating infertile women.

Therefore, EFCT and Acceptance and Commitment Therapy (ACCT) may have positive effects in reducing the problems of infertile couples. However, understanding the differences in their effectiveness can only be determined through practical application. Furthermore, a review of the literature indicates that there is no research comparing the effectiveness of ACCT and EFCT for infertile women in the country. The present study aims to examine the sexual attitudes of infertile women. Consequently, the researcher seeks to answer the following questions:

1. Do EFCT and ACCT influence the sexual attitudes of infertile women?

Is there a significant difference between the effectiveness of these two therapeutic approaches?

Methods

In this study, the ACCT was implemented for the first group, and the EFCT was implemented for the second group as the independent variables, while the control group did not receive any therapy. Following the completion of the study, the more effective intervention was also provided to the control group in accordance with ethical research standards.

The statistical population included all infertile women aged 25 to 45 with infertility for more than five years, totaling 171 individuals who visited the Novin Infertility Clinic in

Mashhad in 2022. These women had regular visits to the clinic to monitor their treatment progress. To select the sample size, a convenience sampling method was used, taking into account the inclusion criteria listed below. Initially, the Dehghani Sexual Attitude Questionnaire (2005) was distributed among volunteers willing to participate in the study. From the respondents, 45 individuals who scored at least the minimum required on the questionnaire were selected. These individuals were matched for educational level and duration of infertility and then equally divided into three groups (15 women in each group).

Procedure

Initially, coordination was established with the officials at the Novin Infertility Clinic, and explanations about the research procedure were provided to both the officials and infertile women in Mashhad. The sample was selected through convenience sampling. During the pre-test, participants completed the Self-Acceptance Questionnaire (Chamberlain & Haaga, 2001), the Sexual Attitude Questionnaire (Dehghani, 2004), and the Forgiveness Questionnaire (Pollard et al., 1998). The participants were then divided into three groups of 15 each (two experimental groups and one control group). In the preliminary session, members of all three groups were asked to complete the research questionnaires. The experimental groups underwent EFCT and ACCT, while the control group remained on the waiting list and only received standard medical treatments. In the post-test phase, all three groups again completed the research questionnaires. During the follow-up phase, three months later, the groups were asked to respond to the questionnaires once more. Finally, the data were analyzed. Summaries of the therapy sessions are reported in the following in Tables 1 and 2.

Table 1. The EFCT program consists of eight structured sessions based on Johnson's treatment program (2007).

Session	Focus	Activities
Session 1	Introduction and Foundation	- Introductions, Explanation of EFT approach, Establish therapeutic relationship, Discuss infertility, self-acceptance, sexual attitudes, and forgiveness, Provide feedback, Assign tasks
Session 2	Identifying Negative Interactions	- Identify negative interactions during conflicts, Summarize previous session, Review tasks, Discuss negative interactions, Provide feedback, Assign tasks
Session 3	Evaluating Underlying Emotions	- Evaluate underlying, unrecognized emotions, Summarize previous session, Review tasks, Discuss underlying emotions, Provide feedback, Assign tasks
Session 4	Reframing the Problem	- Reframe the problem by examining the interaction cycle, underlying emotions, and attachment needs, Summarize previous session, Review tasks, Discuss problem reframing, Provide feedback, Assign tasks

Session 5	Enhancing Closeness	- Enhance feelings of closeness by addressing previously rejected emotional expressions, Summarize previous session, Review tasks, Enhance feelings of closeness, Provide feedback, Assign tasks
Session 6	Increasing Acceptance	- Increase each partner's acceptance of the other's experiences, Summarize previous session, Review tasks, Discuss increasing acceptance, Provide feedback, Assign tasks
Session 7	Facilitating Expression of Needs and Desires	- Facilitate expression of needs and desires to reorganize interactions, Summarize previous session, Review tasks, Discuss reorganizing interactions, Provide feedback, Assign tasks
Session 8	Creating New Solutions	- Create new solutions for old problems, Reinforce new positions and emotional interaction cycles, Summarize previous session, Review tasks, Facilitate new solutions, Conduct commitment renewal ceremony, Provide feedback, Assign tasks

The ACCT sessions, based on Hayes and Strosahl (2010), are structured as follows:

Table 2. The ACCT sessions, based on Hayes and Strosahl (2010)

Session	Focus	Activities
Session 1	Familiarizing and Connecting	- Introductions, Provide introductory explanations, Conceptualize the problem, Prepare clients, Conduct pre-test, Discuss infertility, self-acceptance, sexual attitudes, and forgiveness, Create a list of enjoyable activities for the weekly schedule, Provide feedback, Assign tasks
Session 2	Introduction to ACT Concepts	- Introduce ACT concepts (psychological flexibility, acceptance, mindfulness, cognitive defusion, self as context, personal story, value clarification, committed action), Discuss and evaluate experiences, Summarize previous session, Review tasks, Provide feedback, Assign tasks
Session 3	Teaching Mindfulness and Emotional Awareness	- Teach mindfulness, emotional awareness, and wise awareness, Skills of observation and description without judgment, Maintaining focus, Techniques like time-out to increase responsibility and commitment, Address control as a problem assessment, Summarize previous session, Review tasks, Provide feedback, Assign tasks
Session 4	Increasing Psychological Awareness	- Increase psychological awareness, Appropriate responses to mental experiences, Setting goals, social lifestyle, and behavioral commitment, Review positive and negative points, Weaken the conceptual self, Express the true self without judgment or emotional reaction, Summarize previous session, Review tasks, Provide feedback, Assign tasks
Session 5	Tolerance and Responsibility	- Teach tolerance of uncertainty and reduce rumination, Increase tolerance and responsibility, Crisis endurance skills, Distraction and self-soothing using the five senses, Mindfulness exercises, Review previous sessions, Members provide feedback to each other, Summarize previous session, Review tasks, Provide feedback, Assign tasks
Session 6	Emotion Management	- Understand why emotions are important, Recognize emotions, Increase positive emotions, Alter emotions through actions contrary to recent feelings, Practice learned skills with group and therapist feedback, Summarize previous session, Review tasks, Provide feedback, Assign tasks
Session 7	Enhancing Efficacy and Interpersonal Skills	- Enhance individual and interpersonal efficacy, Teach interpersonal skills (description and expression, assertiveness, open trust, negotiation, self-esteem), Performance assessment, Introduce the concept of value, Demonstrate dangers of focusing on outcomes, Summarize previous session, Review tasks, Provide feedback, Assign tasks
Session 8	Willingness, Commitment, and	- Understand the nature of willingness and commitment, Determine appropriate action patterns aligned with values, Provide summary, Conduct post-test,

Statistical Analysis

To analyze the data, we used repeated measures analysis by SPSS-27. Descriptive statistics, including mean and standard deviation, were utilized to summarize the data at the statistical level. To assess the changes over time within and between groups, repeated measures analysis of variance (ANOVA) was performed.

Dehghani Sexual Attitude Scale (2004): The Sexual Attitude Questionnaire, developed by Dehghani (2004), was used to assess sexual attitudes. This questionnaire measures three dimensions of attitude: emotional, cognitive, and behavioral. It is culturally tailored for Iran and consists of 29 items. Respondents can choose from three options for each question: Yes, Somewhat, and No. Generally, a positive attitude receives a score of 2, the "Somewhat" option scores 1 for all items, and a negative attitude scores 0. The total score ranges from 0 to 58, with higher scores indicating a more positive sexual attitude. The content validity of this test was confirmed by five psychology professors. The test-retest reliability of this scale, measured over a two-week interval in a group of 30 men and women, resulted in a reliability coefficient of 0.96. Additionally, this questionnaire has been shown to distinguish between groups trained and untrained in sexual skills, with the trained group displaying more positive sexual attitudes compared to the untrained group (Dehghani, 2004). In the present study, the reliability of this test was determined using Cronbach's alpha, yielding a coefficient of 0.82.

Results

In this section, data analysis is presented along with the research findings. In this study, data from three measurement points (pretest, posttest, and follow-up) for the variable of sexual attitude were analyzed using repeated measures analysis of variance (ANOVA). Demographic findings showed that the average age of the acceptance and commitment couples therapy group, emotionally-focused couples therapy group, and control group were 29.8, 30.93, and 30.33 years, respectively. Additionally, the results of the one-way ANOVA indicated that there was no significant difference in the average age among the three groups ($F = 0.48$, $p = 0.621$). The average marriage duration for the acceptance and commitment therapy group, emotionally-focused couples therapy group, and control group were 6.27, 7.27, and 6.67 years, respectively. One-way ANOVA results also showed no significant difference in the average marriage duration among the three groups ($F = 0.25$, $p = 0.780$). Lastly, the average number of unsuccessful pregnancy attempts for the acceptance and commitment therapy group, emotionally-focused couples therapy group, and control group were 2.4, 2.47, and 2.33, respectively. One-way ANOVA results indicated no significant difference in the average number of unsuccessful pregnancy attempts among the three groups ($F = 0.26$, $p = 0.776$). Table 3 shows the mean and standard deviation of the sexual attitude variable across three assessment phases for each group.

Table 3. Mean and standard deviation of sexual attitude in each group

Variable	Groups	Mean			Standard deviation		
		Pretest	Posttest	Follow-up	Pretest	Posttest	Follow-up
sexual attitude	ACCT	59.74	87.6	85.2	4.95	7.51	7.56
	EFCT	54	85.79	80.86	5.96	7.2	7.93
	Control	53.69	53.92	54.85	9.65	9.72	9.75

Table 3 shows that couples undergoing therapy had higher mean scores in sexual attitude variables across most measurement points, while the control group showed little change across the three assessment phases. To examine the differences, an appropriate statistical method based on data conditions was used. As shown in Table 2, the Shapiro-Wilk test statistic for all groups and assessment phases indicated that the distribution of all levels of self-blame and rumination variables was not significant ($p > 0.05$), suggesting that the variables were normally distributed. A crucial assumption for any F ratio in repeated measures designs to have a central F distribution is the assumption of compound symmetry of the covariance matrix. The assumption of homogeneity of variances, which implies the equality of the diagonal elements of the variance-covariance matrix, was tested. The assumption of equal covariance of scores across different statistical phases encompasses a broader concept. The Mauchly's test of sphericity was used to examine this assumption in this study's data, and the results indicated that this assumption was not met. To correct the degrees of freedom, the Greenhouse-Geisser correction was applied, with results shown in Table 4.

Table 4. Repeated measure ANOVA for effects of group and time of sexual attitude

Source	MS	df	F	P	Effect size
Group	6327.95	2	40.41	<0.001	0.64
Time	7726.54	1.31	336.98	<0.001	0.86
Group×time	1763.73	2.63	76.92	<0.001	0.76

Table 4 shows the results of the repeated measures ANOVA for the sexual attitude variable. It is evident from the table content that the main effect of time is significant ($p < 0.001$). The time effect shows that there is a significant difference between the pretest, posttest, and follow-up. The effect size of the main effect of the group shows that 64% of the variance in sexual attitude changes among participants is due to group membership. Additionally, the effect size of the time variable indicates that 86% of the variance in sexual attitude is due to time changes. Furthermore, the interaction effect size of time and group indicates that 76% of the variance in sexual attitude is due to time changes in at least one of the three groups. To examine the pairwise differences in sexual attitude mean scores across the three assessment phases, the Bonferroni post hoc test was used, as shown in Table 5.

Table 5. Pairwise comparisons for measures

I	J	I-J	Standard error	p
Pretest	Posttest	-20.05	0.97	<0.001
	Follow-up	-17.91	1	<0.001

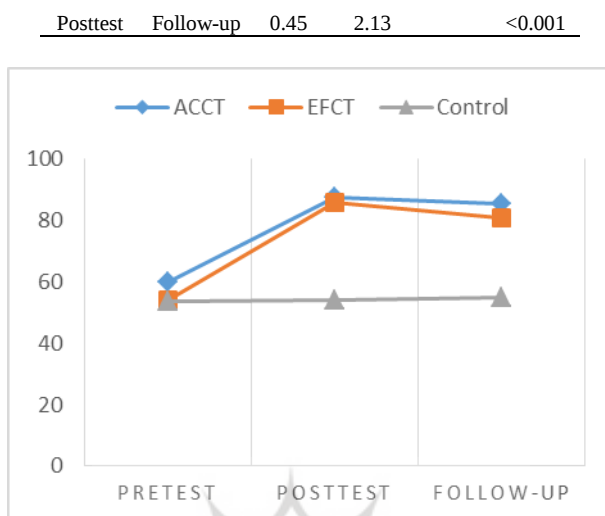


Figure 1. Changes in sexual attitude over time by group

As shown in Table 5, the differences between pretest and posttest, pretest and follow-up, and posttest and follow-up are significant ($p < 0.001$). Considering the mean differences, scores increased from pretest to posttest. There is also a significant difference between the posttest and follow-up means ($p < 0.001$). Based on the mean differences, the mean scores decreased from posttest to follow-up. For greater accuracy and confidence in the results, since the Bonferroni test calculates the sum of means for two groups, the main effects of group and time should be considered. Figure 1 shows the main effects of group and time geometrically.

Table 6. Pairwise comparisons for groups

Groups	I	J	I-J	Standard error	p
Pretest	ACCT	EFCT	5.47	2.61	0.128
		Control	5.77	2.66	0.109
	EFCT	Control	0.31	2.71	1.00
Posttest	ACCT	EFCT	1.81	3.03	1.00
		Control	33.67	3.09	<0.001
	EFCT	Control	33.86	3.14	<0.001
Follow-up	ACCT	EFCT	4.34	3.12	0.518
		Control	30.35	3.18	<0.001
	EFCT	Control	26.01	3.24	<0.001

As it is shown in Table 6, there are no significant differences between the groups during the pretest ($p < 0.05$). Both the ACCT and EFCT groups had significantly higher sexual attitude scores than the Control group at posttest and follow-up ($p < 0.001$). There are no significant differences between ACCT and EFCT during any phase ($p < 0.05$). This

suggests that, while therapy (both ACCT and EFCT) significantly changed sexual attitudes as compared to no therapy (Control), there was no significant difference in efficacy between the two therapies. Based on these results, it can be concluded that the hypothesis is confirmed.

Discussion

The aim of this study was to compare the effectiveness of Acceptance and Commitment Therapy (ACT) and Emotionally Focused Couples Therapy (EFCT) on sexual attitudes in infertile women. The results indicated significant differences in the effectiveness of ACT and EFCT on sexual attitudes among infertile women. This study fills a gap in the literature, as no previous research has directly compared these two therapeutic approaches in this context. However, related studies support the findings. For instance, Karbalaei and Al-Yasin (2018) found that ACT significantly influenced sexual attitudes, which aligns with this study's results. Similarly, studies by Jahangiri and Rezaei (2021) and Girard and Woolley (2017) demonstrated that EFCT significantly improved sexual attitudes, consistent with our findings.

Effectiveness of ACT on Sexual Attitudes

ACT aims to reduce the social reinforcement of behaviors driven by the need to control personal events, allowing individuals to pursue meaningful life goals despite these events. This approach is rooted in acceptance-based techniques, where the therapist creates conditions for clients to experience personal events without engaging in avoidance behaviors. This non-engagement is referred to as "willingness," an active and purposeful process where acceptance is an alternative to experiential avoidance (Hayes et al., 2010). Acceptance in ACT involves a conscious, willing acceptance of uncontrollable events without attempting to change them, especially when such efforts lead to more psychological harm. For example, anxiety patients are taught to accept their anxiety as just a feeling, and pain patients are encouraged to stop fighting their pain. This approach helps individuals see negative feelings and thoughts as experiences rather than realities, leading to improved emotional expression and better relationships. ACT techniques facilitate individuals' acceptance of their emotions and responsibilities, improving their ability to recognize and express emotions correctly. This process enhances relationships by promoting emotional clarity and reducing psychological distress. For infertile women, this means learning to accept their infertility-related emotions without letting them dominate their lives, which can positively impact their sexual attitudes and overall well-being.

Effectiveness of EFCT on Sexual Attitudes

EFCT focuses on the role of emotions in persistent maladaptive patterns among distressed couples. The goal is to uncover vulnerable emotions in each partner and facilitate their safe expression. This emotional processing in a safe context leads to healthier interaction patterns, reducing distress and increasing marital intimacy and satisfaction (Greenman & Johnson, 2022). When individuals perceive their partners as

unavailable, unresponsive, or critical, they often use emotional regulation strategies that maintain or exacerbate relationship distress, weakening their bond (Greenman & Johnson, 2013). EFCT addresses this by de-escalating negative interaction patterns and reactive emotions, then helping couples form positive interaction cycles where positive emotions are evoked, and negative emotions are moderated through alternative means (Kashavarz Afshar et al., 2013).

In the first phase of EFCT, de-escalation, the therapist helps partners observe and exit their negative cycles, viewing the rejection created by these cycles as their mutual enemy. In the restructuring phase, partners explore and share their attachment fears and desires, learning to express these in ways that foster closeness and emotional responsiveness, thus facilitating a secure bond. The third phase, consolidating gains, involves reinforcing the progress made in therapy (Greenman & Johnson, 2013). By creating new emotional experiences, EFCT generates different types of conversations that lead to new interactional events, affecting the couple's internal emotional lives (Behrang et al., 2022).

EFCT's focus on emotional bonds helps couples express and disclose their unmet needs, enhancing their understanding, expression, and management of emotions. This improved emotional communication positively impacts sexual attitudes and interpersonal relationships. For infertile women, EFCT can help address the emotional distress associated with infertility, improving their sexual attitudes and strengthening their relationships.

Conclusion

The study's findings highlight the distinct mechanisms through which ACT and EFCT influence sexual attitudes in infertile women. ACT's emphasis on acceptance and willingness helps individuals manage their emotional experiences without avoidance, leading to healthier relationships and improved sexual attitudes. EFCT's focus on emotional bonds and secure attachments facilitates better emotional communication and intimacy, also improving sexual attitudes. Both approaches offer valuable strategies for addressing the complex emotional and relational challenges faced by infertile women, contributing to their overall well-being and relationship satisfaction.

The limitations of this study include: it was conducted on infertile couples, limiting generalizability to other populations; participants were at least high school graduates, so caution is needed when generalizing to illiterate populations; the study was conducted in Mashhad, so generalizability to other populations should be cautious; the large number of questions and lengthy questionnaires may have caused participant fatigue.

Disclosure Statements

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Conflict of Interest

The authors state that there are no conflicts of interest related to the publication of this paper.

Ethical Approval

All procedures used in human-participant studies adhered to the institutional and/or national research committee's ethical requirements, as well as the 1964 Helsinki Declaration and its subsequent revisions or comparable ethical standards. All of the study's subjects provided informed consent.

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Author contribution

All authors made important contributions to the research and writing of the publication. Each author reviewed and approved the final version of the paper.

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