

## Treatment of Vaginismus with EMDR: A Report of 2 Cases

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### Abstract

*Vaginismus is a type of sexual dysfunction in which spasm of the vaginal musculature prevents penetrative intercourse. The main diagnostic criterion is the presence of recurrent or persistent involuntary spasm of the musculature of the outer third of the vagina that interferes with sexual intercourse. In many cases associated pain or the fear of pain may contribute to its persistence. Herein we report 2 patients that presented with vaginismus that developed secondary to childhood sexual trauma, which was treated with the Eye Movement Desensitization and Reprocessing (EMDR) technique.*

*EMDR is a non-pharmacologic treatment for psychological trauma. Randomized controlled trials with post-traumatic stress disorder patients and with victims of sexual abuse have shown that EMDR is effective. The standard 8-phase EMDR protocol was used in both of the presented cases. Following 3 sessions of EMDR, the patients exhibited a substantial reduction in self-reported and clinician-rated anxiety, and a reduction in the credibility of dysfunctional beliefs concerning sexual intercourse. These findings support the notion that EMDR could be an effective treatment alternative for patients with vaginismus of traumatic etiology.*

**Key Words:** Vaginismus, EMDR, sexual dysfunction

### INTRODUCTION

Vaginismus is defined as a type of sexual dysfunction in DSM-IV-TR<sup>1</sup> and is classified under the category "Sexual Pain Disorders". The basic diagnostic criterion for vaginismus is recurrent or persistent involuntary spasm of the musculature of the outer third of the vagina that interferes with sexual intercourse. Spasms can range from mild (inducing some tightness and discomfort) to severe (preventing penetration) (American Psychiatric Association, 2000). Although pain is not defined as a primary characteristic of vaginismus in the DSM-IV-TR diagnostic criteria, it is frequently encountered in clinical practice (de Kruiff et al., 2000; Reissing et al., 2004). In vaginismus sexual intercourse is impossible due to involuntary spasm of the musculature of the vagina, referred to by some researchers as "unconsummated marriage" (Ellison, 1968). In an epidemiological study conducted

in Turkey the prevalence of vaginismus was reported to be 15.3% (Yılmaz, 2007). The prevalence of vaginismus was reported to be 66%-75.9% in patients admitted to outpatient clinics for sexual function disorders (Simşek et al., 2003; Doğan, 2009).

It is not possible to treat vaginismus with medications or surgical procedures; however, this problem can be managed with sexual therapy within approximately 2-4 months (6-10 sessions), with a success rate >90%. Indeed, vaginismus is the most easily treated type of sexual dysfunction (İncesu, 2004).

Cognitive behavioral therapy (CBT) is the most common method used in the treatment of vaginismus. CBT allows patients to replace inappropriate reactions with those that are appropriate. Following physical recognition of the body, the therapy continues with gradual exercises for sexual intercourse. Although traditional

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methods, such as vaginal dilatation, psycho-education, and desensitization, have been reported to be effective in the treatment of vaginismus, there is limited evidence-based data concerning their efficacy (Doğan and Özko-rumak, 2008).

The Eye Movement Desensitization and Reprocessing (EMDR) technique is an established therapeutic approach for the treatment of posttraumatic stress disorder (PTSD) based on an information-processing model (Shapiro and Maxfield, 2002).

In EMDR bilateral stimulation is provided by the therapist moving a hand from side to side in order to induce eye movement. The patient follows the therapist's moving hand with his or her eyes, simultaneously focusing on an inner representation of the traumatic event. In this manner, sets of dual-attention stimuli are repeated until distress is reduced. The efficacy of EMDR in the treatment of trauma has been clinically demonstrated in several controlled studies. (Bradley et al., 2005; Servan-Schreiber et al., 2006; van der Kolk et al., 2007) and EMDR has been reported to be effective in the treatment of PTSD (Foa et al., 2000; CREST, 2003; American Psychiatry Association, 2004). EMDR has also been suggested as an effective therapy method for specific phobias (Shapiro, 1995). EMDR is reported to produce significant improvements after a limited number of sessions (De Jongh et al., 1990; Kleinknecht, 1993). In studies that included adult females with a history of childhood sexual trauma it was reported that EMDR alleviated or reduced the symptoms associated with trauma (Edmond et al., 1999; Edmond & Rubin, 2004).

The present case report aimed to demonstrate the applicability of EMDR in the treatment of vaginismus of sexual traumatic etiology. EMDR was used due to the presence of a history of underlying sexual trauma in both of the presented cases. In latter sessions EMDR was also used for the treatment of vaginismus based on the hypothesis that improvement would be more rapid with EMDR.

### **Case 1**

A married couple presented to the Umraniye Research and Training Hospital, Psychiatry Outpatient Clinic with the complaint of the inability to have sexual intercourse for 5 years. The woman was a 21-year-old primary school graduate and housewife. The man was a 32-year-old high school graduate and a tradesman. Their marriage was arranged and both were born in Diyarbakır, Turkey. A detailed history of the couple revealed that the

main sexual problem was vaginismus. Beginning with the wedding night the woman was afraid of experiencing pain during sexual intercourse. The couple reported that they had tried to have sexual intercourse almost every day during the first month of their marriage; however, they could not achieve vaginal penetration due to the fear and spasms the woman experienced. This condition was attributed to the fear and young age of the woman, and they had not sought treatment, hoping that her fear would abate with time. Due to family pressure to produce a child and to the fact that arguments between the couple led them to consider divorce they decided to consult a physician.

Although they reported that they had recently considered divorce, they described themselves as a well-adjusted couple and considered their relationship to be free of any problems, except for sexual matters. The gynecologic examination could not be completed due to the woman's reflex spasms and fear. The gynecologist told them that this might be a problem of psychological origin and suggested that the couple consult a psychiatrist. The partners were interviewed individually. The husband had no psychopathological findings requiring treatment. During the interview with the woman, it was observed that the main problem was underlying sexual trauma. When the history of trauma was thoroughly investigated she admitted that her uncle had abused her while she was sleeping when she was 14 years of age: he covered her mouth with his hands so people inside the house would not hear her and he attempted to have sexual intercourse with her; however, he was unsuccessful, as she managed to keep legs together.

She reported that she had not told anyone of this experience due to the fear that no one would have believed her and that there would have been negative consequences. She did not subsequently experience any similar traumatic events. She reported that she occasionally thought about the attempted rape and that she experienced the same pain with each attempt at sexual intercourse with her spouse. She did not want her spouse to know about the attempted rape by her uncle. Consensus was reached with the woman that therapy for sexual trauma should be the first priority, followed by CBT for vaginismus. Her spouse was informed that the therapy would be performed with his spouse first, and he would be involved when a predetermined level of improvement was achieved. We decided to use EMDR based on the fact that it is a rapid technique for treating trauma and would be beneficial for vaginismus; thusly, the structured 8-phase EMDR approach was used (Shapiro, 1995 (Table).

TABLE. The EMDR protocol: Structured 8-phase approach.

Taking of client history	Full biopsychosocial assessment Assesses the client's readiness for EMDR Identify suitable targets for EMDR
Preparation	Explain EMDR Test bidirectional movements
Assessment	Obtain the snapshot image that best represents the event Identify negative cognitions Identify positive cognitions Obtain validity of positive cognitions (0-7) Identify emotions elicited by the traumatic event Obtain a rating of emotional distress (0-10) Identify the physical location of distress
Desensitization	Bilateral stimulation takes place, focusing on the distress experienced by the client
Installation	Test the validity of positive cognitions
Body scan	Scann the entire body to locate the emotional distress when the positive cognition becomes 6 or 7
Closure	Note the end of the session and review the session with the client
Re-evaluation	Review the previous session before the current session begins

A 3-pronged approach involving the past, present, and future is utilized in the phobia protocol. The first step includes alleviating the distress related to single or multiple past events. The second step includes deconditioning the effects of present stimuli that trigger the fear response. The third step includes preparing the client for future confrontations with the conditioned stimuli. In the preparation phase of EMDR the client learns self-control methods, such as relaxation, distraction, and overcoming fear when necessary. Furthermore, safe place exercises are performed between the sessions or after the therapy to alleviate the client's distress. Then, the client is asked to identify the events or situations (the time of initial appearance, the experience best representing the situation or the most terrifying experience, and the time of the last experience) that might cause fear, as well as the ancillary events that may have caused the conditioning and the physical symptoms caused by the fear.

With EMDR the client is asked to identify a snapshot image that best represents the traumatic event and to identify a negative cognition (NC) of the self while focusing on the image. Thereafter, the client is asked what he/she would like to believe about the self while focusing on the image (positive cognition [PC]). Then, the client is asked to assess the validity of the PC using a 7 point Likert-type scale (validity of cognition [VoC]), in which

1 is completely false and 7 is completely true. Next, the client is asked to identify his/her emotions that are elicited by the traumatic event. The client's level of emotional distress is evaluated using the Subjective Units of Disturbance (SUD) Scale, ranging from 0-10 where 10 is the worst. After the SUD score is established the client is asked to identify where in the body the emotional distress is located. If any emotional distress is reported, processing with bilateral stimulation continues until the emotional distress completely disappears. The desensitization phase of EMDR follows the previously discussed assessment of the traumatic event.

The patient's primary NC was, "I cannot protect myself". The PC she expressed was, "I can protect myself and I can take care of myself". The initial VoC score was 2. The client appeared to be experiencing rage, anger, and unhappiness. The SUD score was 8. She reported experiencing the distresses in her chest and groin. Desensitization was performed using bilateral hand movements; after two 90-min desensitization sessions, her VoC score increased to 7, her SUD score decreased to 0, and her physical experience of distress disappeared. The third session was focused entirely on sexual intercourse, and relaxation exercises were performed at the end of the session. After this session the client reported that she had had pain-free sexual intercourse with her husband. Thereafter, an interview was conducted with the client and her spouse to briefly educate her spouse about sexual anatomy and physiology, and to remind him that his wife should take control during sexual intercourse. The couple was scheduled for an interview 1 week later; however, the couple called the next day and reported that they had sexual intercourse without any problems; the interview was cancelled and 2 follow-up sessions at monthly intervals were conducted.

## Case 2

A married couple (the woman was 24 years of age and the man was 28 years of age) presented with the complaint of the inability to have sexual intercourse for 1 year. The woman was an accountant and the man was a teacher. They were both born in Istanbul. Their sexual knowledge was quite limited and was obtained from written and visual media. Despite many attempts during a 1-year period the couple could not have sexual intercourse due to spasms in the woman's legs. They had not sought any treatment until consulting a psychiatrist, hoping that the problem would resolve spontaneously. They decided to consult a psychiatrist after watching one on television explain that their problem was treatable.

Both partners were interviewed individually. During the interview the woman admitted that her father frequently drank alcohol during her childhood. He had sometimes harassed her by intense staring and sometimes physically, so she expressed that she was alienated from sex and feared sex. She reported that she had had boyfriends before getting married, but that she had kept herself isolated from her boyfriends thinking that they might use her; thus, her relationships were short lived. She reported that she had been afraid of sex at the time of her marriage, but married because she loved her husband very much. She feared having sex on her wedding night and reported that each attempt at sexual intercourse reminded her of her father's abuse and frightened her. She was offered EMDR therapy, as we thought she would improve rapidly with this technique. Her spouse was also informed about the EMDR technique. He was informed that the sessions would continue with his wife for a while. After a single preparation session EMDR therapy began.

The patient's primary NC was, "I am in danger". The PC she expressed was, "it is over, now I am safe". Her initial VoC score was 1. The client appeared to be experiencing hate, anger, and guilt. Her SUD score was 7. The patient experienced her distress in her chest and abdomen. Desensitization was performed using bilateral hand movements and her VoC score increased to 7 and SUD score decreased to 0. The patient's physical experience of distress disappeared after a single 90-min desensitization session. The second and third sessions focused entirely on sexual intercourse, and relaxation exercises were performed at the end of the sessions. The client reported that she was able to have problem-free sexual intercourse after these sessions. Thereafter, an interview was conducted with the patient and her spouse to briefly educate him about sexual anatomy and physiology, and to remind him that his wife should take control during sexual intercourse. The couple was scheduled for an interview 1 week later and reported that they no longer had a problem with sexual intercourse. The couple did not report any complaints during the 2 follow-up interviews 1 and 2 months later.

## Discussion

Although vaginismus is classified as a sexual pain disorder, the experience of pain is not necessary for a diagnosis. Despite the fact that pain or the fear of pain has been suggested to be a symptom of vaginismus rather than a cause, some researchers have stressed that pain or the fear of pain may have a causal and maintenance role in vaginismus (Ward et al., 1994). Women diagnosed

with vaginismus can be conceptualized as having either vaginal penetration aversion/phobia or genital pain disorder (Reissing et al., 1999, 2004). Masters and Johnson (1970) reported an unusual physical response pattern in women afflicted with vaginismus; 'the patient usually attempts to escape the examiner's approach by withdrawing toward the head of the table, even by raising legs from the stirrup, and/or constricting thighs in the midline to avoid the implied threat of the impending vaginal examination. Similar reactions were observed in case 1 of the present cases, during a gynecologic examination and the examination could not be performed. The case 2 had not consulted a gynecologist due to fear.

It has been suggested that women with vaginismus have inadequate information about sexuality (Silverstein, 1989; Yetkin, 2001). Sexual knowledge is quite limited in the Turkish population. Unofficial sources misdirected the patients with false information and beliefs about sexuality (Kayır, 2001; Incesu, 2004; CETAD, 2006). The present cases had limited sexual knowledge, which was addressed in the course of the interview.

A number of methods, such as pharmacologic agents and hypnosis, are used in the treatment of vaginismus; however, the most common and successful method is CBT (Yetkin, 2001). CBT includes a cognitive approach to progressive muscle relaxation to overcome vaginal spasms, to enhance control of vaginal muscles, and to eliminate phobias, negative cognitions, and guilt.

The 2 presented cases had traumatic experiences that were the likely cause of vaginismus, necessitating therapy aimed primarily at resolving the effects of those traumatic experiences. EMDR is one of the most rapid and effective techniques in the treatment of trauma (Shapiro, 1995). The EMDR technique helps clients develop positive cognitions of self, while at the same time confronting the traumatic event and re-processing it. The traumatic experiences of both the present cases were processed during 3 sessions, the stress-inducing effect of trauma was eliminated, and vaginismus resolved. Considering that the treatment of simple vaginismus not related to trauma requires 6-10 sessions (Incesu, 2004), treatment of vaginismus with 3 EMDR sessions can be considered a therapeutic option that can be used in clinical practice.

The SUD scores in both of the presented cases decreased dramatically following EMDR therapy and their VoC scores increased. In both cases vaginismus completely resolved after therapy, and at the follow-up sessions both couples reported they no longer had any sexual problems.

These findings are consistent with those of previous case reports, suggesting that phobias induced by trauma (e.g., vomiting phobia, choking phobia, dental phobia, and claustrophobia) can be successfully treated with only a few sessions of EMDR (De Jongh et al., 1990, 1999; Lohr et al., 1996). According to the literature, EMDR is an effective technique for phobias induced by trauma. There are no studies in the literature concerning the treatment of vaginismus with EMDR. Studies investigating the use of EMDR for the treatment of sexual trauma reported that EMDR alleviated or improved the symptoms related to trauma in adult women that experienced childhood sexual trauma (Edmond et al., 1999; Edmond & Rubin, 2004).

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