

The Effectiveness of Auriculotherapy on Women's Sexual Function: A Randomized Controlled Trial

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Abstract

Objective: Majority of breastfeeding women experience changes in sexual function. The present study was designed to assess effectiveness of auriculotherapy on improving sexual function in breastfeeding women.

Method: In this randomized sham controlled trial, accomplished from January 2018 to May 2019 in a referral sexual health clinic in city of Qom, Iran, 60 eligible participants were assigned to either intervention and control groups via block randomization. In the intervention group, electrical stimulation was applied for 15 seconds on Shen Men, Zero, Thalamic, Master Cerebral, Libido, Relax, Excitement, Ovary, and Uterus points in 10 auriculotherapy sessions. Then, Vaccaria seeds were stuck on these points. The control group received the same procedure with the device off as a sham method. Data were gathered using the Female Sexual Function Index (FSFI) at three different time points.

Results: At baseline, mean scores of sexual function dimensions were not significantly different between the intervention and control groups except for orgasm. Post-intervention, the results showed significant differences in sexual desire ($P = 0.002$), sexual arousal ($P = 0.008$), lubrication ($P = 0.001$), sexual satisfaction ($P = 0.001$), and orgasm ($P = 0.009$). One month after the intervention, the results showed significant differences in sexual desire, sexual arousal, lubrication, sexual satisfaction ($P = 0.001$), orgasm ($P = 0.006$), and dyspareunia ($P = 0.015$). Differences in mean score of sexual function in post-intervention and one-month follow-up were only significant in the intervention group ($P = 0.001$).

Conclusion: Based on evidence from this study, auriculotherapy is an effective technique for improving sexual function in breastfeeding women.

Key words: Auriculotherapy; Breast Feeding; Sexual Activity; Women

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As the founder of the psychoanalytic theory, Freud regarded sexual desire as a natural and physiological trait and the basis of human needs. According to the humanistic theory of Maslow (1960), failing to meet this need makes the transcendence of humans extremely vulnerable (1). Sexual health facilitates healthy living (2) through the compatibility and harmony that develops among physical, emotional, intellectual, and social aspects of sexuality (3). As a multidimensional phenomenon, sexual function constitutes an essential part of life that plays a key role in marital stability (4).

As a major cause for concern over general health and a prevalent yet treatable emotional stress and marital problem, sexual dysfunction significantly affects self-esteem and quality of life (5, 6). The World Health Organization (WHO) defines sexual dysfunction as different mechanisms that prevent individuals from participating in a sexual relationship in the way they desire (5). Prevalence of female sexual dysfunction differs between different countries, especially eastern communities (2). Some women experience sexual dysfunction during the first months of breast feeding. Loss of libido, dyspareunia, and vaginal stenosis is common in the first few months and has been demonstrated to exist in 41% to 89% of breastfeeding women (7-13). Other studies have also shown lack of sexual desire (51%) and dyspareunia (30%) during the first year of breastfeeding (14, 15). A study on Iranian breastfeeding women showed dyspareunia and loss of libido as the most prevalent sexual dysfunction (16).

A study conducted in Australia showed sexual dysfunction, including loss of libido, orgasm dysfunction, and sexual arousal disorder, in approximately two-thirds of primiparous women in their first breastfeeding year (17). Majority of breastfeeding women experience perineal pain, fatigue, depression, urinary incontinence, changes in sexual function (18), and changes in body image (19). Sexual function is also affected by fatigue, fear of the next pregnancy, concern about dyspareunia, breast tenderness, and sociocultural factors during pregnancy and breastfeeding (20).

Physiological changes in breastfeeding women interfere with the ovulation process, thus, during duration of breast feeding, some strategies must be considered to resume sexual intercourse and also choosing contraception plans (21). Non-medicinal methods like herbal medicines, psychological methods and also use of complementary and alternative medicine (CAM) have been used to improve sexual function. Beside Training and counseling, different CAM interventions including reflexology, acupuncture, and auriculotherapy (AT) have been used to deal with sexual dysfunctions and were utilized with the aim to improve quality of sexual life (22-25).

In traditional Chinese medicine, one's health is ensured through the YIN-YANG balance in the body. AT can regulate flow of Qi and blood in the body, compensate

for deficiencies, reduce their excess anywhere in the body and resolve stagnation and blockage of free flowing Qi (26-30). AT can therefore affect normalization of hormone levels (26). AT is extensively used for treating fertility problems and gynecological diseases, including dysmenorrhea, postpartum pains, postmenopausal musculoskeletal pains, and polycystic ovarian syndrome (28, 30-32), as well as sexual problems such as loss of libido and impotence (32-34). Breastfeeding, breast changes, fatigue associated with the maternal role, and childrearing can change sexual relationships during breastfeeding. Centrality of breastfeeding and childcare appears to cause less attention to sexual affairs in this period (35).

Based on AT principles, every anatomical unit in the body corresponds to a reflection point on the ear surface (27). Some points on the ear used to improve libido, frigidity, and arousal include Shen Men, Zero, Master Cerebral, Thalamic, Endocrine, Ovary, Uterus, sexual desire, relax, and excitement points (26, 27). Libido point reflects the external genital organs (i.e. penis or clitoris) and helps improve impotence and premature ejaculation in men as well as sexual desire. Uterus points can help improve premenstrual problems, endometritis, irregular menstruation, painful menstruation, uterine bleeding, and sexual dysfunction, infertility, and pregnancy problems. Ovary point affects gonads and improves sexual function, ovarian inflammation, and frigidity in women (26).

AT is safe and could be considered as an effective technique with low cost. It has been used to manage pain, treat addictions and also to deal with some other emotional issues and internal disorders (36). Numerous studies have shown a relative high frequency of sexual dysfunction in breastfeeding women compared to the general female population. WHO considers the breastfeeding period as an appropriate time to find "sexual needs in women" by assessing their sexual health and function (36, 37). It seems that taking preventive and therapeutic measures for female sexual dysfunction is crucial (10). Authors' extensive search did not yield any studies regarding effect of AT on sexual function in Iranian breastfeeding women. This study aimed to evaluate effect of AT in improving sexual function in breastfeeding women.

Materials and Methods

Patients

In this randomized sham-controlled trial, conducted from January 2018 to May 2019 in a referral sexual health clinic in the city of Qom, Iran, 60 participants were assigned to two groups (30 in each group). Data were gathered at three different time points: baseline (before intervention), after (post-intervention), and during follow-up after one month in two groups. After a preliminary screening, volunteers were recruited if they met the following criteria: 1. Primiparous breastfeeding women having given full-term birth to a singleton, 2.

Aged 18-45 years, 3. An Edinburgh questionnaire score below 13 and 4. Exclusively breastfeeding. Women who became pregnant during pregnancy, or had a history of hypertension, diabetes, seizure, and psychological problems, and also people who had a hearing aid or a pacemaker were excluded. Psychological problems in a spouse, receiving AT during the previous six months and ear injury or infection were also considered as exclusion criteria.

Methods

Participation in the study was optional. Written consent was obtained from the participants. Ethical approval was obtained from the ethics committee of Alborz University of Medical Sciences, Karaj, Iran (IR.Abzums.REC.1397.181), and the study was registered at the Iranian Registry of Clinical Trials (IRCT ID: 20180110038302N5).

A participant list based on clinic records was prepared. People on the list were called and invited to the clinic based on a timetable. They received brief explanations on study objectives and also a recruitment talks on AT. Individuals willing to participate were asked to complete the informed consent and then assessed for eligibility criteria. Block randomization was used to randomly allocate participants to intervention (30 people) and control (30 people) groups. An investigator with no clinical involvement used online software to generate random blocks.

The following procedures were implemented for two groups to enhance the blinding effect. At first, the participant lay down on the examination bed, and her earlobe was disinfected with cotton and 75% isopropyl alcohol before therapy. In the intervention group (AT with electrical stimulation (ES) and Vaccaria seeds in ten sessions / twice a week for five weeks): A Pointer Excel II stimulator was used for ES of the point's specific for improvement of sexual function. Shen Men, Zero, Thalamic, Master Cerebral, Libido, Relax, Excitement, Ovary and Uterus points (9 points) individually received 5 Hz- ES for 15 seconds (Figure 1). Then, Vaccaria seeds were taped on Excitement and Zero points on the left ear and Relax, Thalamic and Master Cerebral points on the right ear, and Shen Men, Libido, Ovary, and Uterus points in both ears in the intervention group (Figure 2). The intervention group participants were asked to gently press the tapes for 30 seconds every four hours while awake until start of the next session. In each session, Vaccaria seeds were exchanged because half-life of Vaccaria seed is three days.

In the control group (sham-RCT: sham AT with ES and Vaccaria seeds in ten sessions / twice a week for five weeks): The same points were stimulated for 15 seconds with the AT device switched off to achieve the blinding / sham method. Then, Vaccaria seeds were taped on these points and immediately removed so only adhesive tapes remained. The control group was not asked to press these points. In each session, adhesive tapes were changed.

The sample size was determined to include 60 based on G-Power free software (USA) provided by a similar study³⁷ with $\alpha = 5\%$, $\beta = 20\%$, and power $(1-\beta) = 95\%$ and considering 20% loss to follow-up. Loss to follow-up was detected in the CONSORT diagram (Figure 3).

Measurement

Socio-demographic, breastfeeding, obstetric characteristics, and FSFI forms were used in this study. Data gathering was used to record participants' sociodemographic, breastfeeding, and obstetric characteristics, in addition to the Female Sexual Function Index. FSFI is scored from 19 to 95 in six dimensions: 1- Sexual desire (2 items), 2- Sexual arousal (4 items) and 3- Lubrication (4 items), 4- Orgasm (3 items), 5- Sexual satisfaction (3 items), and 6- Dyspareunia (3 items). A higher score indicates better sexual function (38). Rosene *et al.* showed a test-retest reliability coefficient of $r = 0.88$ for the entire scale and $r = 0.79$ for its subscales (39). In Iran, the internal consistency of FSFI was shown as Cronbach's alpha of 0.70. Confirmatory factor analysis confirmed its final model of the construct (40). Measurement times were for both intervention and control groups baseline or before intervention, post-intervention, and 4 weeks after intervention, respectively.

Statistical Analysis

Descriptive statistics were used for participants' sociodemographic, breastfeeding, and obstetric characteristics. The qualitative variables, such as socioeconomic status, education level, occupation, condition to achieve pregnancy, spouse education, and family planning method were calculated using the chi-square test. Data normality was assessed by skewness and kurtosis. Non-parametric variables such as sexual arousal, lubrication, orgasm, dyspareunia, and sexual function were measured using Mann-Whitney U test, and parametric variables such as age, BMI, Spouse's age, duration of breastfeeding, Sexual desire, Sexual satisfaction, were measured using independent t-test in two groups. Sexual function was measured at baseline and post-intervention using paired t-test and Wilcoxon test in intervention and control group respectively. Sexual function was measured at baseline, post-intervention, and follow-up after one month using Friedman tests, the trend of Changes in Mean Scores of Sexual Function, in two groups. The significance level was set at less than 0.05. Missing data management was done with GEE and random assumption. Statistical analyses were done with SPSS version 21.0 (IBM Corporation, USA).



Figure 1. Auriculotherapy Device



Figure 2. Taping Vaccaria Seeds

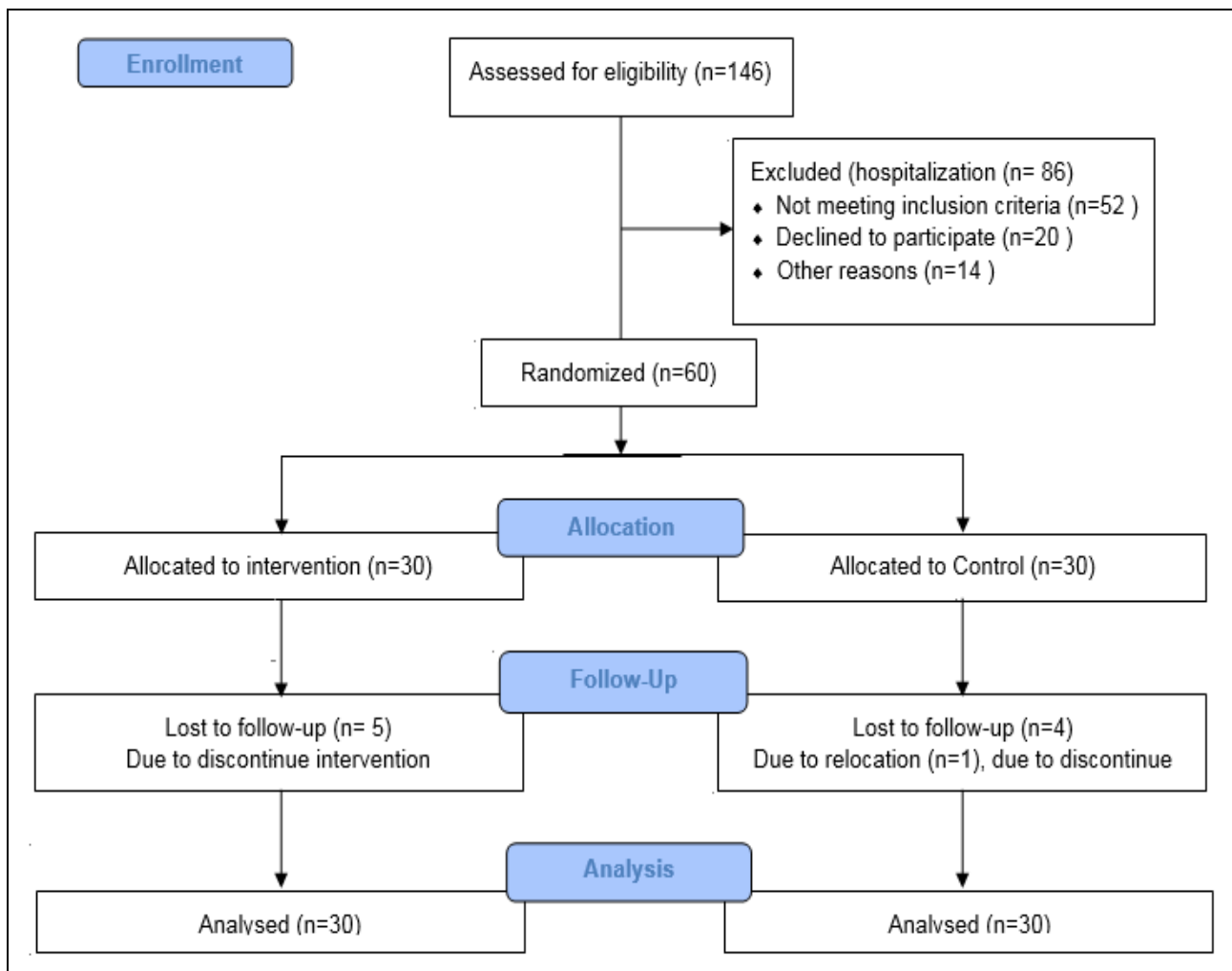


Figure 3. CONSORT Diagram Shows the Flow of the Participants through Each Stage of the Present Randomized Trial

Results

In the present study, sociodemographic and obstetrics characteristics of 60 participants were analyzed. The two groups were balanced in terms of age, BMI, spouse's age, duration of breastfeeding, sexual desire, sexual arousal, lubrication, dyspareunia, sexual satisfaction, and sexual function except for orgasm ($P < 0.002$), (Table 1), socioeconomic status, education level, occupation, condition to achieve pregnancy, spouse education, and family planning method (Table 2).

The baseline characteristics of 60 participants were compared in two groups, which are shown in Table 1 and 2. There were no significant differences in age, BMI, spouse's age, and duration of breastfeeding between the two groups. Sexual function at baseline was not different in the two groups. Except for orgasm, other dimensions of sexual function (sexual desire, sexual arousal, lubrication, dyspareunia, sexual satisfaction) were not significantly different at baseline (Table 1). Socioeconomic status, educational level, occupation, condition to achieve pregnancy, spouse education, and family planning method also were not different in the two groups (Table 2).

The results of the Mann-Whitney U test and the independent t-test showed significant differences

between the intervention and control groups post-intervention in terms of scores of sexual desire $P < 0.002$, sexual arousal $P < 0.008$, lubrication $P < 0.001n$, orgasm $P < 0.009$, and sexual satisfaction $P < 0.001$ except for dyspareunia (Table 3).

The results of the paired t-test and the Wilcoxon test revealed sexual function in the intervention and control groups significantly differed at baseline and post-intervention ($P < 0.001$) (Table 4).

The results of the Mann-Whitney U test and the independent t-test showed significant differences between the intervention and control groups 4 weeks after the intervention in terms of the mean scores of all the dimensions of sexual function, i.e. sexual desire, sexual arousal, lubrication, orgasm, sexual satisfaction and dyspareunia (Table 5).

The results of the Friedman test revealed sexual function only in the intervention group significantly differed Mean \pm SD at baseline (51.6 ± 14.39), post-intervention (66.0 ± 6.97), and 4 weeks after intervention (72.7 ± 8.35) ($P < 0.001$). No significantly differed Mean \pm SD in baseline (43.9 ± 15.85), post-intervention (57.1 ± 6.02), and 4 weeks after intervention (61.0 ± 6.62) ($P < 0.06$) in control group (Figure 4).

Table 1. The Sociodemographic Variables, Duration of Breastfeeding, Baseline Scores of Sexual Function and Sexual Function Dimensions in the Two Groups

Variable	Intervention group n = 30 Mean \pm SD	Control group n = 30 Mean \pm SD	P-value (t / z)
Age (Y)	26 \pm 3.53	26.2 \pm 24.9	0.26 ^a (t = 0.45)
BMI (kg/m ²)	24.8 \pm 3.65	25.2 \pm 3.42	0.673 ^a (t = 0.32)
Spouse's age (Y)	29.6 \pm 3.13	28.8 \pm 3.81	0.378 ^a (t = 1.02)
Duration of breastfeeding (D)	108. 8 \pm 35.68	97.6 \pm 28.09	0.181 ^a (t = 0.58)
Sexual desire	5 \pm 1.33	4.5 \pm 1.48	0.143 ^b (z = 0.56)
Sexual arousal	9.6 \pm 3.47	8.5 \pm 3.76	0.245 ^b (z = 0.89)
Lubrication	11.4 \pm 4.44	10 \pm 4.92	0.204 ^b (z = 0.96)
Orgasm	7.3 \pm 3.59	4.7 \pm 2.68	0.002 ^{* b} (z = 2.36)
Dyspareunia	9.3 \pm 4.04	8.3 \pm 4.49	0.308 ^b (z = 1. 05)
Sexual satisfaction	9 \pm 1.74	7.9 \pm 2.35	0.08 ^a (t = 1.06)
sexual function	51.6 \pm 14.39	43.9 \pm 15.85	0.06 ^b (z = 1.32)

Y = Year

BMI = Body mass index

D = Day

^b Mann-Whitney U test

^a Independent t-test

* Statistical significance at $p < 0.05$.

Table 2. The Sociodemographic and Obstetric Variables in the Two Groups

Variable	Intervention group n = 30		Control group n = 30		Chi-square results	
	Frequency	%	Frequency	%		
Socioeconomic status	Poor	1	3.3	5	16.7	P = 0.221
	Moderate	20	66.7	18	60	
	Good	9	30	7	23.3	
Education level	High school	8	26.7	9	30	P = 0.774
	Higher education	22	73.3	21	70	
Occupation	Housewife	24	80	27	90	P = 0.204
	Employee	5	16.7	1	3.3	
	Manual worker	1	3.3	2	6.7	
Pregnancy condition	Planned	23	76.7	28	93.3	P = 0.071
	Unplanned	7	23.3	2	6.7	
Family planning method	OCP	1	3.3	5	16.7	P = 0.384
	Condom	17	56.7	14	46.7	
	Withdrawal	7	23.3	8	26.7	
	DMPA	1	3.3	0	0	
	IUD	4	13.3	3	10	
Spouse's education	High school	5	16.7	7	23.3	P = 0.519
	Higher education	25	83.3	23	76.7	

OCP = Oral Contraceptive Pill

DMPA = Depot Medroxy Progesterone Acetate

IUD = Intrauterine Device

Table 3. Compare of Post-Intervention Scores of Sexual Function Dimensions in Two Groups

Group	Intervention group n = 30	Control group n = 30	P-value (t / z)
Dimension	Mean ± SD	Mean ± SD	
Sexual desire	6.2 ± 0.83	5.2 ± 1.05	0.002 ^{ab} (t = 2.56)
Sexual arousal	12.8 ± 2.70	11 ± 1.70	0.008 ^{ab} (z = 3.69)
Lubrication	15 ± 2.41	12.5 ± 1.87	0.001 ^{ab} (z = 3.14)
Orgasm	9.2 ± 2.83	7.2 ± 2.42	0.009 ^{ab} (z = 3.65)
Sexual satisfaction	11.2 ± 1.39	9.8 ± 1.25	0.001 ^{ab} (t = 2.13)
Dyspareunia	11.7 ± 3.06	11.3 ± 2.41	0.286 a (z = 1.23)

^a Mann-Whitney U test^b Independent t-test

* Statistical significance at P < 0.05.

Table 4. Compare of Baseline and Post-Intervention Scores of Sexual Function in Intervention and Control Groups

Score of sexual function	Intervention group (n = 30) mean ± SD	P-value (t)	Control group (n = 30) mean ± SD	P-value (z)
Baseline	51.6 ± 14.39	P = 0.001 ^a (t = 2.58)	43.9 ± 15.85	P = 0.001 ^{ab} (z = 3.69)
Post-intervention	66. ± 6.97		57.1 ± 6.02	

^a Paired t-test^b Wilcoxon test

* Statistical significance at p < 0.05.

Table 5. Compare of Sexual Function Dimensions in Follow-Up after One Month in Two Groups

Group	Intervention group (n = 30)	Control group (n = 30)	P-value (t / z)
Dimension	Mean ± SD	Mean ± SD	
Sexual desire	6.3 ± 1.09	5.4 ± 0.87	0.001 ^{ab} (t = 2.56)
Sexual arousal	13.7 ± 2.09	11.8 ± 1.67	0.001 ^a (z = 3.12)
Lubrication	16.5 ± 2.73	13.4 ± 1.71	0.001 ^a (z = 3.21)
Orgasm	10.2 ± 2.45	8.2 ± 1.96	0.006 ^a (z = 3.15)
Sexual satisfaction	12.5 ± 1.45	10.1 ± 1.45	0.001 ^{ab} (t = 2.36)
Dyspareunia	13.5 ± 1.73	12.2 ± 2.93	0.015 ^a (z = 2.65)

^a Mann-Whitney U test

^b Independent t-test

* Statistical significance at p < 0.05.

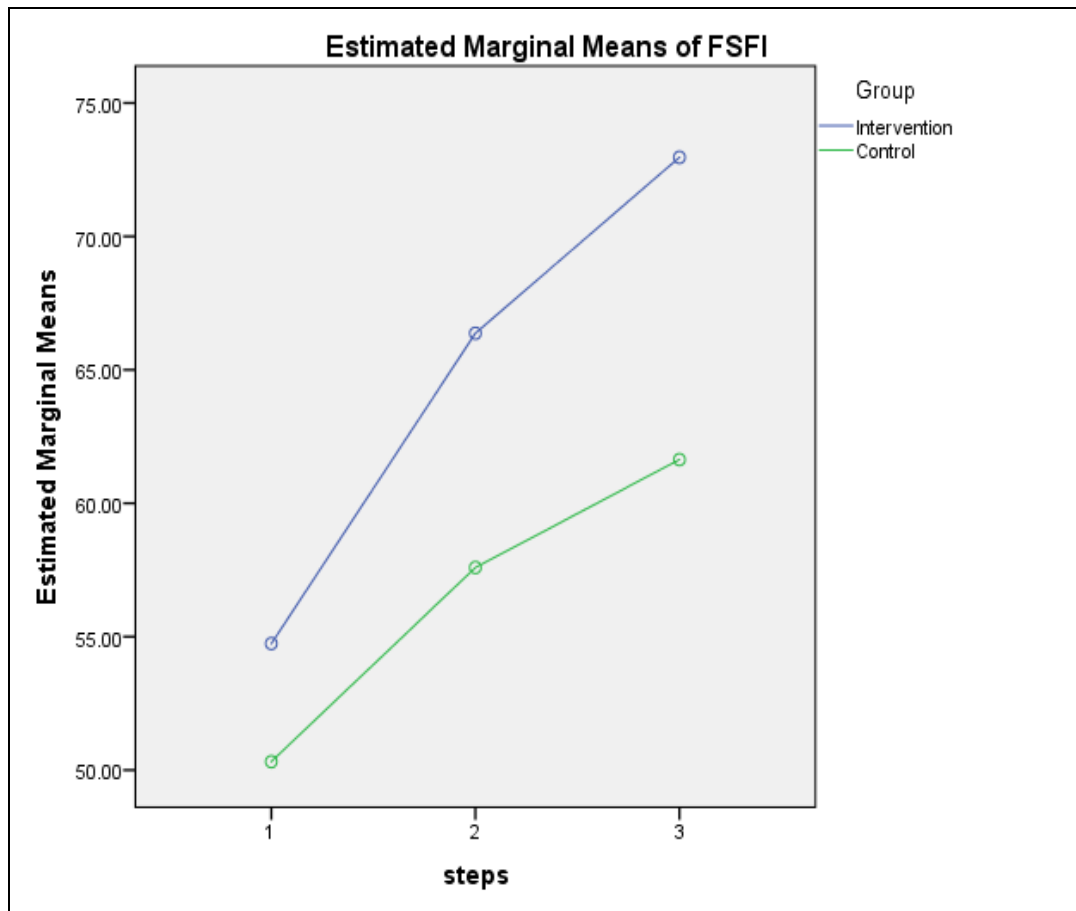


Figure 4. Trend of Changes in Mean Scores of Sexual Function at Baseline, Post-Intervention, and Four Weeks after Intervention in the Two Groups

Discussion

Both groups were balanced at baseline. Breastfeeding, sexual desire, sexual arousal, lubrication, sexual satisfaction, dyspareunia, sexual function, and also socio-demographic and obstetric variables were not significantly different at baseline. Post-intervention, all sexual function dimensions except for dyspareunia, significantly improved in both intervention and control groups. After one month, both groups were significantly different in all dimensions of sexual function but

differences in mean score of sexual function in post-intervention and one-month follow-up were only significant in the intervention group.

Different effects have been shown in the literature for breastfeeding regarding sexual function parameters. Some studies show that breastfeeding leads to early resumption of sexual intercourse after childbirth through increasing sexual activity and libido. Mothers may enjoy and be sexually stimulated when their babies suckle. Breast sensitivity during breastfeeding has also been

shown to increase sexual activity and desire (41, 42). On the other hand, many studies show lower levels of sexual activity, satisfaction and libido in breastfeeding women compared to those who use formula (43-48). Moreover, irrespective of the feeding method, physiological and hormonal changes (i.e. reduced estrogen levels during breastfeeding) significantly reduce sexual function in breastfeeding women compared to non-breastfeeding women of reproductive age⁴⁴. Sexual function in breastfeeding women is affected by anatomical and hormonal changes, the family structure and quality of relationship with the spouse. Breastfeeding women have shown inadequate vaginal lubrication, more painful sexual intercourse, and a longer waiting time for resuming sexual activity (4). Pregnancy, breastfeeding, and childcare create particular conditions that affect sexual relationships, sexual function, and sexual health in women (49). Perineal pain, fatigue, depression, urinary incontinence, and changes in sexual function¹⁸ (especially loss of libido with a prevalence of 22%-88%) as well as reduced lubrication and orgasm disorder have been shown in majority of breastfeeding women (13, 19). A study conducted in the US demonstrated dyspareunia for up to six months after childbirth in 17%-36% of women. Risk factors commonly shown for postpartum dyspareunia include perineal and genital pains or ulcers, episiotomy, and breastfeeding (11). A clinical trial was conducted in Hong Kong to determine the effect of AT on perineal pain in 256 postpartum women with acute or chronic perineal pain, psychiatric problems, special medical and obstetric problems (i.e. hypertension, preeclampsia) and a history of depression. Vaccaria seeds were taped on the participants' ears in the intervention group after delivery. In the control group, the seeds were removed and only adhesive tapes remained on the ear (the sham method). The intervention group participants were asked to gently press the tapes for 30 seconds every four hours while awake. Perineal pain was measured using a pain scale. Assistant researchers performed the first assessment approximately two hours after delivery followed by four assessments a day within the first 48 hours. Two groups demonstrated no significant differences in perineal pain (50). AT did not affect dyspareunia, but insignificantly reduced vaginal and perineal pain, which can be independent from the effect of time (51, 52).

Fifteen women 18-55 years old participated in 25-minute sessions of acupuncture held by a practitioner of Chinese medicine twice a week for five weeks to treat their lack of libido. The results showed advancements in all the dimensions of sexual function, especially libido (37). Similarly, AT was performed in the present study twice a week for five weeks. The present study found statistically significant differences between the intervention and control groups in terms of sexual desire and lubrication post-intervention and one month after intervention due to the stimulation of Libido point,

suggesting positive effects of AT and using Vaccaria seeds on these two dimensions.

Khamba *et al.* investigated the effect of acupuncture on secondary sexual dysfunction, which was highly prevalent in the participating women and men due to using selective serotonin reuptake inhibitors (SSRIs) and serotonin-norepinephrine reuptake Inhibitor (SNRIs). The intervention group participated in 12 weekly sessions of acupuncture held as per traditional Chinese medicine, while the control group received no interventions. The results showed significant effects on all dimensions of sexual function in men and significant improvements in libido and lubrication in women. Acupuncture, therefore, appears effective in treating the side effects of SSRIs and SNRIs, which can be considered a potential benefit of CAM (53). The present study followed up the trend of changes one month later. The scores of libido and lubrication at time points of post-intervention and one month after intervention were significantly different from those at baseline; nevertheless, no statistically significant differences were shown in these two dimensions in the control group.

AT was found to significantly reduce anxiety and increase serum endorphin after abdominal surgeries (54). Using AT for reducing anxiety and stress, and improving the outcomes of assisted reproductive technology (ART) showed that AT reduces stress levels and increases the success rate of ART (55). Qu *et al.* showed that AT plus Vaccaria seeds for five days prior to in vitro fertilization (IVF) significantly reduced anxiety and improved IVF outcomes in the intervention group (56).

AT causes release of neurotransmitters such as serotonin in the body, which can affect psychological-sexual health (57). Fatigue, insufficient sleep, and increased workload have been shown as causes of postpartum sexual problems (58). Research suggests AT on Shen Men and other key points can exert analgesic, tranquilizing and anxiolytic effects (59-61). Ko *et al.* conducted a study in north of Taiwan to determine effect of AT on postpartum insomnia in 32 women by stimulating only the Shen Men point in the intervention group. In fact, AT was performed for 14 days first on the Shen Men point of the right ear and then on the left ear. The participants were asked to massage the magnets mounted on their ears four times a day (i.e. morning, noon, night, and before sleep) 20-30 repetitions each time such that they felt mild warmth at the point. Of the 32 participants, 30 remained until the end of the study and two withdrew due to having itchy ears. Half of the women were primiparous and the rest multiparous and the majority had undergone natural delivery. Twelve of these women exclusively breastfed their child while 18 women breastfed and used other alternatives. The majority of these women breastfed more than twice at night, and 60% had shown dissatisfaction with their sleep quality. The results showed that AT significantly improved sleep quality in the intervention group (62).

Limitation

Breastfeeding was a limitation for the participating women in the present study, which was resolved by allocating physical space with necessary facilities.

Conclusion

Sexual function significantly affects quality of life, physical health, and interpersonal relationships. As a multidimensional phenomenon, sexual function constitutes an essential part of life. The majority of breastfeeding women experience changes in sexual function. Based on this study, AT positively affected different sexual dimensions. As an effective, appropriate, cost-effective, and safe technique, AT is recommended for improving sexual function in breastfeeding women.

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Conflict of Interest

None.

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