



Examination of the Newly Developed Labioplasty Technique

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Abstract

Introduction: Labioplasty refers to the surgical reduction of the labia minora. Labioplasty has become increasingly popular in recent years. There is no widely accepted guideline for labioplasty and it is done for a variety of reasons.

Material and Methods: This is a prospective study. A technique different from the current techniques used in labioplasty has been developed in our clinic. The new technique has been completely developed in our clinic. The participants were followed up. Processes cover a period of approximately three years. 112 participants, to whom the technique we developed was applied, were included in the study.

Results: Considering the reasons leading the participants to the operation, the most common reason was "Aesthetic concern due to deformity. In the first week controls of the participants, it was determined that the wound area of 60 (53.6%) was clean and edematous. When the operation status of the patients after one week is examined, it is seen that 96 (85.7%) of the participants did not need to perform any procedure.

Conclusions: It is evaluated that the technique we have developed can be used in a wider area with the studies to be planned.

Keywords: Labioplasty; Aesthetic Concern; Surgical Reduction; Labia Minora

Introduction

Labioplasty refers to the surgical reduction of the labia minora. The secondary goals of the procedure include minimal invasiveness, optimal color/tissue matching, preservation of the vaginal entrance, and neurovascular structure. Labioplasty has become increasingly popular in recent years. There is no widely accepted guideline for labioplasty and it is done for a variety of reasons. The most common causes are labia minor hypertrophy, dyspareunia, and chronic urinary tract infections [1].

Labioplasty is receiving increasing attention. There is debate among experts about how to manage a request for this surgery. The indications and outcomes of labioplasty have not yet been systematically evaluated, and long-term outcomes have not been reported. Perception of the appearance of the labia minora is in-

fluenced by culture, the media, the views of health professionals, and the environment. The request for labioplasty is generally not based on functional complaints but mainly on dissatisfaction with the genital appearance [2].

More research is needed to examine the value of this therapy and the appropriate indications for it. A systematic analysis of the surgical and patient-reported results of labioplasty is required to evaluate why women need this treatment and whether it is safe and effective [3,4].

Labial hypertrophy has an important place among the reasons for applying to labioplasty. There is no consensus on the cause of labial hypertrophy. Experts consider different measurements to be abnormal. These dimensions vary from the midline of the labia minora to the lateral free edge. Although there is no agreed-upon

anatomical standard, studies have noted that women prefer a labia minora compressed within the borders of the labia majora [5].

There are many labioplasty techniques defined today. De-epithelization, linear resection, wedge resection, and composite reduction are the most commonly used techniques [1].

- De-Epithelization preserves the labial contour, removes a small amount of tissue. It is best suited for patients with minimal hypertrophy.
- Linear resection is a simple approach to volume reduction. Aesthetic results can be bad. Natural color, contour, and texture may be lost, scarring may appear.
- Wedge resection preserves the natural labial contour. It provides significant volume reduction.
- Composite reduction labioplasty aims to correct clitoral protrusion and occlusion in addition to labial reduction. Composite reduction is associated with a higher rate of complications compared to other techniques [6,7].

Techniques such as W-shaped resection, Z-plasty, and laser labioplasty have been identified in a small number of patients. Data on its results are scarce. Technique selection varies according to patient anatomy, goals, and surgeon's experience [6,7].

Materials and Methods

Our study is a prospective study. A technique different from the current techniques used in labioplasty has been developed in our clinic. This technique is the subject of our study. Although the technique has similar aspects to the techniques currently in use, it is a new technique in many respects.

The technique we developed has the features of wedge, linear, and flap techniques. In our technique, the labia minora are cut in a way that is between the techniques used in wedge and linear methods. In addition, the fold on the clitoris is removed and the surgical line created is combined with the surgical line created in the labia minora. In our technique, the natural labial contour is preserved and a significant volume reduction is achieved. Negative aspects such as poor aesthetic appearance, loss of natural color and contour, and scarring seen in linear resection are not seen in our technique.

The new technique has been completely developed in our clinic. The participants were followed up. Complications that developed

based on the complaints of the patients followed were determined, and the practices that caused them were avoided. Based on the positive feedback and increasing patient satisfaction, the new technique routine was put into practice. All these processes cover a period of approximately three years. 112 participants, to whom the technique we developed was applied, were included in the study.

All the review, analysis, and development periods mentioned above were carried out within the framework of ethical rules. All patients were informed about the procedures to be performed. No patient was treated without their consent. Patients were also informed about the collection and classification of information about the procedure, and their consent was obtained. Our study did not include any data that would reveal the identities of the participants.

In our study, the sociodemographic variables of the participants were included in the analysis. Sociodemographic information was collected by using the records of the participants and the information they provided. These are age, gravida (number of pregnancies), coitus (having sexual intercourse), and marital status. Among them, the age variable was analyzed by dividing it into different periods. Since the labioplasty procedure is most frequently requested in the 25-36 age group, this age group has been examined as a period. In addition, participants under the age of 25 and over the age of 36 were included in the analysis as a separate group. The number of pregnancies was divided into two groups as those who did not conceive and those who did. Coitus and marital status were recorded based on the statements of the participants.

The variables of the participants regarding the procedure are the reason for the labioplasty procedure, the first control results at the end of the operation, the first-week control results, the first-week procedure, the 40th-day control results, and the 40th-day procedure. Information about the procedure was recorded and collected by the researcher. The proportional and numerical distributions of these variables were analyzed and the results were shared.

In the study, IBM SPSS Statistics 23 program was used for data analysis. Descriptive statistical methods and Chi-Square test were used in the analysis of the data. The confidence interval of the data is 95% ($p = 0.05$).

Results

The socio-demographic characteristics of the participants and the general findings of the study are presented below. The distri-

bution of the participants’ socio-demographic characteristics and characteristics of the labioplasty procedure are shown in tables 1 and 2.

When the age distribution of the participants and their pregnancy status were examined, it was determined that the majority of them were between the ages of 25-36, and 74 participants (66.1%) had not had a pregnancy before. It was determined that 73 (65.2%) of the participants had previously had intercourse. More than half of the respondents (65%) were not married. Considering the reasons leading the participants to the operation, the most common reason was "Aesthetic concern due to deformity, sagging, etc. In the first week controls of the participants, it was determined that the wound area of 60 (53.6%) was clean and edematous. 22 participants did not come to the first control.

		Frequency	Percentage
Age	Aged under 25	23	21.6
	Aged 25-36	56	50.0
	Aged over 36	33	29.4
Gravida	Have had a pregnancy	74	66.1
	Haven't had a pregnancy	38	34.9
Coitus	Negative	39	34.8
	Positive	73	65.2
Marital Status	Married	47	42
	Unmarried	65	58

Table 1: Socio-Demographical Characteristics of the Participants.

When the operation status of the patients after one week is examined, it is seen that 96 (85.7%) of the participants did not need to perform any procedure. When the patients’ follow-up status at the end of the operation was examined, it was determined that 109 (97.3%) of the patients came for the first week control. It was determined that six of the participants had a clean but edematous wound, five participants had an open wound, and four participants were not satisfied with the procedure.

When the procedures performed on the 40th day of the participants were examined, it was determined that no procedure was required for 94'(83.9%) patients, revision procedure was required only in 12 participants, and suture procedure was applied to three participants.

The reasons for the labioplasty of the participants were analyzed with the Chi-square Test in terms of age, gravida, coitus, and marital status, and the analysis results are presented in Table 2. A statistically significant difference was found according to age, gravida, and coitus status in terms of the reason for labioplasty operation ($p < 0.05$), however, no statistically significant difference was found according to marital status ($p > 0.05$).

		Frequency	Percentage
Reason for Labioplasty Procedure	Malformation	30	26.7
	Flix	23	20.5
	Large Labia	27	24.3
	Deformity, aesthetic concerns due to sag etc.	32	28.5
First Control Time	1 week later	109	97.3
	2 months later	2	1.8
	6 months later	1	0.9
First Week Control	Clean wound spot	12	10.7
	Clean wound spot, edematous	60	53.6
	Orifice at the wound spot	18	16.1
	Didn't turn up	22	19.6
First Week Procedure	No Procedure	96	85.7
	Suture procedure	14	12.5
	Left for next process	2	1.8
40 th Day Control	Clean - Edema-free	67	59.8
	Clean - Edematous	6	5.4
	Didn't turn up	30	26.8
	Didn't approve	5	4.5
	Orifice at the wound spot	4	3.6
40 th Day Procedure	No procedure	94	83.9
	Control after 1 year	1	0.9
	Revision	12	10.7
	Suture procedure	3	2.7
	Left for next process	2	1.8

Table 2: Characteristics of the participants regarding the labioplasty procedure.

According to the pairwise comparison tests performed to determine which groups caused the difference, it was determined that the participants between the ages of 26-35 who underwent labiaplasty differed from the other groups, and the participants aged 36 and over differed from the other groups. It was concluded that this difference was due to the fact that the participants aged 26-35 (35.7%) were operated due to the size of the labia, and the participants aged 36 and over (39.4%) preferred labiaplasty operation due to the discharge.

According to the pairwise comparison tests performed to determine from which groups the difference for gravida was caused,

it was determined that the participants who had undergone labiaplasty differed from those who did not experience pregnancy. It was determined that the difference was due to the fact that the participants who were pregnant (39.5%) were operated due to deformity.

According to the pairwise comparison tests performed to determine which groups caused the difference for coitus, it was determined that the coitus positive participants who underwent labiaplasty differed from the coitus negative participants. It was determined that this difference was caused by the coitus positive (84.4%) participants being operated for deformity.

Variables	Reason for Labiaplasty				x ²	p*
	Malformation	Flix	Large Labia	Deformity		
Age						
Aged 25 and Under	8 (%34.8)	5 (%21.7)	4 (%17.4)	6 (%26.1)	17.4	0.01
Aged 25-36	13(%23.2)	5 (%8.9)	20 (%35.7)	18 (%32.1)		
Aged 36 and Over	9(%27.3)	13 (%39.4)	3 (%9.1)	8 (%24.2)		
Gravida						
Have had a pregnancy	25 (%33.8)	12 (%16.2)	20 (%27)	17 (%23)	9.13	0.03
Haven't had a pregnancy	5 (%10.2)	11 (%7.8)	7 (%18.4)	15 (%39.5)		
Coitus						
Negative	14 (%35.9)	9 (%23.1)	11 (%28.2)	5 (%12.8)	8.3	0.04
Positive	16 (%21.9)	14 (%19.2)	16 (%21.9)	27 (%84.4)		
Marital Status						
Married	9 (%19.1)	11(%23.4)	9 (%19.1)	18 (%38.3)	5.6	0.13
Unmarried	21 (%32.3)	12 (%18.5)	18 (%27.7)	14 (%21.5)		

Table 3: Analysis of the Reason for Labiaplasty by Age, Gravida, Coitus and Marital Status of the Participants.

* Chi-square Test, (Row Percentages are used).

Discussion and Conclusion

More than half of the participants are between the ages of 25-36. The reason for this is considered to be that women’s aesthetic concerns are higher in this age group. When the studies on the subject in the literature are examined, it is seen that similar results have been reached throughout the world. According to the inference above, younger women can be expected to have higher aesthetic concerns and to have more frequent aesthetic operations. However, in our country and in many other countries, it is an important condition that women have gained their economic freedom in order

to decide on such operations. Because these operations are still considered taboo for some reasons. It is around the age of 25 for women to reach an economically sufficient level. It is thought that these situations will explain the concentration of operations in the 25-36 age group [8-11].

It was determined that more than half of the participants were single, and a significant part of them had been in a relationship before. It is expected that single women will be more in demand for aesthetic operations than married women. Studies have shown

that cosmetic surgery is associated with high marital satisfaction. It is natural for single women who make marriage plans to turn to operations that promise high marital satisfaction, such as labioplasty. The benefits of labioplasty in terms of sexual satisfaction are undisputed. In this respect, it is inevitable that single women, who have higher sexual expectations compared to married women, will have more orientation to labioplasty. Women who have had intercourse have a higher expectation of sexual satisfaction. This situation triggers the tendency to labioplasty, which is one of the most preferred operations in the world due to sexual satisfaction. In our study, data supporting this were also obtained [12,13].

The most common reason leading the participants to labioplasty is “aesthetic concern due to deformity, sagging, etc”. When similar studies are examined, it is noteworthy that the desire for labioplasty is based on dissatisfaction with the genital appearance rather than functional complaints, labioplasty is a procedure that provides a significant improvement in quality of life, and patients who request labioplasty often have both physical and appearance-related disorders. The results of our study also confirm this situation. According to the data we obtained, one of the most common reasons for admission is deformity. This is followed by large labia. These two reasons are among the reasons determined by other studies examined [3,4,14].

It was determined that 97.3% of the participants came to the control examination, which should be done at the end of one week after the operation, and their condition was examined. No action was required for 85.7% of those who came for examination. Considering the control examination findings on the 40th day of those examined within the scope of the research, it was determined that the wound area was clean and edema-free in 59.8%. In this examination, it was determined that the wound site of six participants was clean but edematous, the wound was open in five participants, and four participants were not satisfied with the procedure. In the control examination carried out on the fortieth day, 83.9% of the participants did not need to take any action. It is possible to say that the results of the labioplasty technique developed based on these data are extremely satisfactory.

The most common complications after labioplasty are separation, hematoma, insufficient scarring, and superficial infections. In addition, flap necrosis with wedge resection has been reported. These complications were not observed in the applications of our technique.

A retrospective review of seven years of labioplasty operations performed in a clinic was conducted. According to the data obtained, 113 patients underwent labioplasty with linear excision method during the study period. Transient symptoms such as swelling, bruising and pain were reported in 13.3% of the participants. The frequency of participants experiencing bleeding is 0.8%. 3.5% of the four participants required revision surgery. All revisions were made to remove permanent excess or asymmetry and no major complications were reported. This level of complication was not observed in the participants in whom the technique developed in our clinic was applied. Revision surgery was not required in any of the participants [15].

A retrospective and multicenter study was conducted to analyze the seven-year data of labioplasty operations. Participants filled out a questionnaire about their satisfaction level. Participants who agreed to respond were divided into two groups: the functional indication group and the aesthetic indication group. It has been observed that the participants who constitute the functional and aesthetic groups are approximately equal in number. The frequency of participants encountering postoperative complications is 35%. Complications are higher in the functional indication group. Revision surgery was performed on 19% of the participants. Regardless of the indication, 86% of the participants were satisfied with the result. The results of this research also show the advantages of the technique we have developed. In the applications of our technique, a very low level of complications developed and no revision was required [16].

In another similar study on the subject, 58 labioplasty procedures were performed during the one-year study period. The mean age was 32.16 years, 50% of the participants were single, 65.52% were sexually active and 62.07% were nulliparous. In this study, wedge resection technique was applied. Complications occurred in 12.06% of the participants due to inadequate resection. The procedure was rated very good or excellent by 96.55% of the participants. The results of this study also enabled the technique we developed to be compared with the wedge technique, which is one of the most frequently used techniques. Accordingly, the advantages of our technique have been confirmed once [17].

The extent and limitations of the research

The study includes 112 patients who applied to a gynecology and obstetrics clinic operating in Ankara/Turkey. The fact that it is

a single-centered study can be considered as a limitation in terms of the extent.

While some of the socio-demographic information of the participants, who are the sample of the research, was taken from the records, some of the statements of the participants were taken as a basis. Since there was no possibility to verify these answers, it was assumed that the participants answered the questionnaire objectively and realistically. This can be considered as another constraint.

Bibliography

1. Gowda AU., *et al.* "Indications, Techniques and Complications of Labioplasty". *Eplasty* 15 (2015): ic46-ic46.
2. Al-Jumah MM., *et al.* "Satisfaction Survey of Women After Cosmetic Genital Procedures: A Cross-Sectional Study From Saudi Arabia". *Aesthetic Surgery Journal Open Forum* 3.1 (2020): ojaa048-ojaa048.
3. Özer M., *et al.* "Labioplasty: motivation, techniques, and ethics". *Nature Reviews Urology* 15.3 (2018): 175-189.
4. Sorice SC., *et al.* "Why Women Request Labioplasty". *Plastic and Reconstructive Surgery* 139.4 (2017): 856-863.
5. Motakef S., *et al.* "Vaginal labioplasty: current practices and a simplified classification system for labial protrusion". *Plastic and Reconstructive Surgery* 135.3 (2015): 774-788.
6. Gress S. "Composite reduction labioplasty". *Aesthetic Plastic Surgery* 37.4 (2013): 674-683.
7. Ellsworth WA., *et al.* "Techniques for labia minora reduction: an algorithmic approach". *Aesthetic Plastic Surgery* 34.1 (2010): 105-110.
8. Alotaibi AS. "Demographic and Cultural Differences in the Acceptance and Pursuit of Cosmetic Surgery: A Systematic Literature Review". *Plastic and Reconstructive Surgery – Global Open* 9.3 (2021): e3501-e3501.
9. Matera C., *et al.* "Why are men interested in cosmetic surgery procedures? Examining the role of different forms of peer influence, social comparison, internalization, and body dissatisfaction". *Body Image* 26 (2018): 74-77.
10. Nerini A., *et al.* "Exploring the Links Between Self-Compassion, Body Dissatisfaction, and Acceptance of Cosmetic Surgery in Young Italian Women". *Frontiers in Psychology* 10 (2019): 2698.
11. Swami V., *et al.* "Acceptance of cosmetic surgery: personality and individual difference predictors". *Body Image* 6.1 (2009): 7-13.
12. Liew S., *et al.* "Understanding and treating different patient archetypes in aesthetic medicine". *Journal of Cosmetic Dermatology* 19.2 (2020): 296-302.
13. Turini T., *et al.* "The Impact of Labioplasty on Sexuality". *Plastic and Reconstructive Surgery* 141.1 (2018): 87-92.
14. Sorice-Virk S., *et al.* "Comparison of Patient Symptomatology before and after Labioplasty". *Plastic and Reconstructive Surgery* 146.3 (2020): 526-536.
15. Lista F., *et al.* "The Safety of Aesthetic Labioplasty: A Plastic Surgery Experience". *Aesthetic Surgery Journal* (2015): 35.
16. Lallemand M., *et al.* "[Functional or aesthetic labia minora reduction: Complications, revision surgeries and results - a comparative study]". *Gynécologie Obstétrique Fertilité and Sénologie* 47.4 (2019): 330-336.
17. Surroca MM., *et al.* "Labioplasty: A 24-Month Experience in 58 Patients: Outcomes and Statistical Analysis". *Annals of Plastic Surgery* 80.4 (2018): 316-322.

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