

# Avoidance of Circumcision during the Phallic Stage: Myth or Reality?

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**Objective:** Circumcision is a practice that is commonly implemented across the globe for reasons pertaining to medical necessity, social attitudes, and religious beliefs. This procedure, when performed on young boys, results in the infliction of harm upon the penis, thereby giving rise to the development of castration anxiety. Castration anxiety can be defined as an overwhelming fear of damaging or losing the penis during the phallic period, which, according to Sigmund Freud's theory of psychosexual development, occurs between the ages of 3 and 6 years. The present study aims to compare social and sexual measures in later life between individuals who underwent circumcision during and beyond the phallic period.

**Patients and Methods:** Men who had previously undergone circumcision were included in the study. The participants completed a series of questionnaires designed to assess various aspects of their health and well-being. These included the International Index of Erectile Function, the male genital self-image scale, and the gender role attitudes scale.

**Results:** A total of 216 male participants who had previously undergone circumcision were included in the study. A notable absence of substantial variance was evident in the domains of sexual functionality, perception of the genital region, and gender roles, among subjects who underwent circumcision during and following the phallic period.

**Conclusions:** The results of the study refute the hypothesis that circumcision should not be performed during the phallic period, and thus contradict the position of psychiatrists that this procedure should not be carried out during this stage due to the anxiety it would cause.

**Keywords:** body image; circumcision; erectile dysfunction; gender role; sexual satisfaction

## Introduction

Approximately one-third of the male global population has undergone circumcision, with Muslims constituting 70% of this demographic [1]. In the United States, 1.2 million people are circumcised annually in public hospitals and at home [2].

Circumcision, a common surgical procedure in paediatric patients, often triggers anxiety, fear and pain [3]. If appropriate management is not provided, its psychological effects can be significant and potentially lead to adverse long-term outcomes [4]. In psychoanalytic terms, the phallic period (PP) dominates between the ages of 3 and 6 years. The interest is focused on the genital region, and the sexual organ gains narcissistic importance. During this period, a boy develops a strong sexual interest in his mother and a desire to possess her. He wants to eliminate his greatest rival, his father. The boy expects severe punishment from his father for his aggressive desires towards him, and this expectation leads to castration anxiety [5,6]. Hence, penile

interventions in the PP are widely believed to increase a boy's castration anxiety and may have negative effects on his self-image [7].

Some psychiatrists believe that circumcision in the 3–6 year age group, which coincides with the PP, triggers castration anxiety, based on Freud's theory of psychosexual development [8]. However, limited studies showed no significant difference in sexual function in adulthood between PP and non-PP (nPP) circumcision [9,10]. Understanding this relationship may provide deep insights into the practice of circumcision, a common issue between psychiatry and urology. The findings can serve as a guide to one of the first questions parents ask experts: "Should we avoid phallic circumcision?"

Generally contradictory results have been found regarding the effects of circumcision on sexual function. A meta-analysis on the influences of circumcision on male sexual functions suggested that circumcision is unlikely to adversely affect male sexual functions [11]. An extensive review of randomised clinical trials, systematic reviews

and meta-analyses, physiological studies, large longitudinal studies and cohort studies in a variety of populations found general consistency in high- and moderate-quality questionnaire data stating that circumcision had no or minimal adverse effects on sexual function, sensation or pleasure, even with improvements in some aspects [12–15].

Another frequently discussed issue regarding circumcision is the relationship between circumcision and body image. A study showed controversial results in general body image perceptions in circumcised and uncircumcised men [16]. However, research evaluating male genital self-image revealed that visual satisfaction levels were significantly increased after circumcision [17]. Despite the available information, most of the studies on genital body image primarily focused on the external appearance and size of the penis. Research evaluating satisfaction using a scale developed specifically to evaluate men's feelings and cognitions about their genitals remains limited.

Circumcision may be performed for religious, cultural, hygienic, or surgical reasons; Cultural differences; Social prestige; As a first step towards puberty or for being male. Another important factor associated with “being a man” is gender roles, the beliefs and attitudes associated with the roles that are considered appropriate for men and women in society [18]. On one side of these beliefs and attitudes is the traditional view of the man as the head of the family. On the other side is the egalitarian perspective, which sees men and women as equal. The traditional perspective exhibits general dominance in Turkey, albeit with a notable decline in recent years. The concept of masculinity includes culturally derived behaviours about how men should behave [19]. The role of men is clearer in Turkey than in European countries, and circumcision is often equated with being a man. Here, the relationship between circumcision practice and gender roles may be of interest. However, apart for a few studies, this subject is rarely explored.

To our knowledge, no study has examined the relationship between circumcision age and sexual function, genital image and gender roles. Thus, this work aims to analyse this relationship in a predominantly Muslim country. Our main hypothesis is that people circumcised during the PP exhibit differences in sexual function, genital image satisfaction and perceptions of gender roles compared with those circumcised beyond this stage. Our secondary aim is to reveal the difference in the thoughts of individuals in this age group about circumcision and the reasons for circumcising their children.

## Methods

### *Participants and Procedure*

This quantitative, cross-sectional study was designed to evaluate the relationship of circumcision period with sexual function, genital region image perception and gender

roles. Circumcised, volunteer men were invited to participate. Sociodemographic data form, International Index of Erectile Function-5 (IIEF-5), male genital self-image scale (MGSIS) and gender role attitudes scale (GRAS) were administered to the participants.

### *Population and Sample*

Male volunteers who had previously undergone circumcision were included in the study. Uncircumcised, penile anomaly, penile curvature and history of penile surgery were defined as exclusion criteria. Circumcised, sexually active men who completed the questionnaires appropriately were included in this study.

### *Periods*

According to Freud's developmental theory, the 3–6 year age group was the PP. Any age outside this range was referred to as the nPP.

### *Scales*

The sociodemographic data form was used to evaluate the participants' age, gender, years of education, time of circumcision and details about the circumcision ceremony. It was prepared by the research team for this study.

IIEF-5 is a questionnaire used to evaluate erectile function. It consists of 15 questions. The IIEF is a reliable, multidimensional and self-administered scale for the clinical assessment, diagnosis and treatment of erectile dysfunction [20]. A brief version of the scale consisting of five questions was subjected to a Turkish validity and reliability study [21].

MGSIS is a scale developed by Herbenick in 2013 to assess the feelings and cognitions of men about their genitals [22]. It is a 4-point Likert-type scale consisting of seven items [23]. This scale was also subjected to a Turkish validity and reliability study.

GRAS was developed by García-Cueto *et al.* [24] to assess gender role attitudes. It has five sub-dimensions: Social function transcendent (SFT), family function transcendent (FFT), social function sexism (SFS), family function sexism (FFS) and employment function sexism (EFS). This scale was also subjected to a Turkish validity and reliability study [18].

### *Data Analysis*

The data were analysed using IBM SPSS 15.0 for Windows Assessment Version (Chicago, IL, USA). Numerical variables were presented as mean and standard deviation, and categorical variables were presented as numbers and percentages. Chi-square test was used to compare categorical variables between groups, and the conditions required for the chi-square test (expected frequencies in each cell being  $\geq 5$ ) were verified. Kolmogorov–Smirnov tests were applied to analysed normal distribution conditions. An independent two-sample *t*-test was used to examine differ-

**Table 1. Comparison of demographic data between groups.**

Variables & queries	nPP (n = 159)	PP (n = 57)	<i>p</i>
Age (year) mean (± SD)	33.89 (± 6.75)	33.58 (± 6.40)	0.771
Educational status, n (%)			
High school	8 (5.0)	3 (5.3)	0.541
University	69 (43.4)	20 (35.1)	
Master's degree–PhD	82 (51.6)	34 (59.6)	
Circumcision with whom? n (%)			
Only myself	76 (47.8)	25 (43.8)	0.673
With my older brother	28 (17.6)	9 (15.8)	
With my little brother	27 (17.0)	15 (26.3)	
With my relative—with my friend	18 (11.3)	5 (8.8)	
I don't remember	10 (6.3)	3 (5.3)	
If not alone, what was your order? n (%)			
Before	35 (47.9)	13 (44.8)	0.959
Later	25 (34.2)	8 (27.6)	
I don't remember	13 (17.8)	8 (27.6)	
Would you circumcise your male child if you had one? n (%)			
Yes	119 (74.8)	50 (87.7)	0.138
No	19 (12.0)	3 (5.3)	
Undecided	21 (13.2)	4 (7.0)	
The mean of the mother's religious attitudes (± SD)	7.35 (± 2.42)	7.44 (± 2.24)	0.803
Mean of father's religious attitudes (± SD)	6.44 (± 2.72)	6.33 (± 2.81)	0.798
Mean of the child's religious attitudes (± SD)	4.41 (± 3.21)	5.09 (± 2.91)	0.165

PP, phallic period; nPP, non-phallic period; SD, standard deviation. Independent two-sample *t*-test and pearson chi-square test.

**Table 2. Total scores of the participants from the scales.**

Scale	nPP (n = 159)	PP (n = 57)	<i>p</i>
IIEF-5	20.42 (± 3.10)	19.96 (± 3.39)	0.358
MGSIS	22.15 (± 3.68)	22.37 (± 3.98)	0.704
GRAS—overall	72.24 (± 11.55)	71.44 (± 9.66)	0.646
SFT	16.66 (± 3.16)	17.07 (± 2.13)	0.285
FFT	8.03 (± 2.04)	7.95 (± 1.62)	0.779
SFS	14.09 (± 3.47)	13.35 (± 3.83)	0.168
FFS	14.21 (± 2.47)	13.78 (± 2.59)	0.278
EFS	19.27 (± 4.45)	19.30 (± 3.83)	0.965

PP, phallic period; nPP, non-phallic period; IIEF, International Index of Erectile Function; MGSIS, male genital self-image scale; GRAS, gender role attitudes scale; SFT, social function transcendent; FFT, family function transcendent; SFS, social function sexism; FFS, family function sexism; EFS, employment function sexism. Independent two-sample *t*-test.

ences between groups. The confidence interval was 95%, and the level of significance was  $p < 0.05$ .

## Results

A total of 228 circumcised male volunteers were recruited between December 2022 and February 2023. Prior to data analysis, the data of 12 people were excluded due to the multiple-choice marking. The analysis was completed with the data of 216 people. Power analysis at 99% confidence level and 95% confidence interval found that a minimum of 78 people were required to participate in this study. Among the 216 participants, 57 were circumcised between the ages of 3 and 6 years and 159 were circumcised before

the age of 3 years (37 participants) and after the age of 6 years (122 participants). The demographic data of the participants and some information about circumcision are presented in Table 1.

No significant difference in sexual function, genital image satisfaction and gender roles was found between the two groups (Table 2). Moreover, no significant difference in the subscales of the GRAS (SFT, FFT, SFS, and EFS) was found between the groups (Table 2).

Opinions about circumcision and the reasons for having their children circumcised were compared between the two groups. Although no significant difference in opinions about circumcision was observed between the two groups, only religious reasons were significantly higher in PP group

**Table 3. Participants' opinions regarding circumcision before undergoing the procedure.**

Pre-circumcision cognitions, n (%)	nPP (n = 153*)	PP (n = 56*)	p
There will be permanent damage to my body	6 (3.8%)	4 (7.0%)	0.260
I'll be a man	49 (31.2%)	22 (38.6%)	0.197
I'll be all grown up	50 (31.8%)	21 (36.8%)	0.299
I'll lose my penis completely	2 (1.3%)	2 (3.5%)	0.289
I will receive gifts/money	29 (18.5%)	17 (29.8%)	0.057
I'm going to suffer a lot	57 (36.3%)	18 (31.6%)	0.318
A requirement will be fulfilled	2 (1.3%)	0 (0.0%)	0.537
I don't remember	31 (19.7%)	8 (14.0%)	0.228

PP, phallic period; nPP, non-phallic period. Independent two-sample *t*-test. \*Six participants chose not to answer the questions.

\*One participant chose not to answer the questions.

**Table 4. Reasons why the participants circumcised their children.**

Reasons for circumcision of the child, n (%)	nPP (n = 153*)	PP (n = 56*)	p
Sexual health	78 (49.7%)	32 (56.1%)	0.248
Prevention of infection	65 (41.4%)	23 (40.4%)	0.509
Cultural reasons	53 (33.8%)	21 (36.8%)	0.396
Religious reasons	69 (43.9%)	39 (68.4%)	0.001*
Social reasons	50 (31.8%)	19 (33.3%)	0.480

PP, phallic period; nPP, non-phallic period. \* $p < 0.05$ , Independent two-sample *t*-test. \*Six participants chose not to answer the questions. \*One participant chose not to answer the questions.

among the reasons for circumcision if they had/would have their children ( $p = 0.001$ ) (Tables 3 and 4).

## Discussion

Our study confirmed that the circumcision period does not affect sexual function, genital self-image or gender roles. No significant difference in GRAS, MGSIS and IEFF-5 scores was found between the groups. We discuss the possible implications of our findings below.

Sigmund Freud placed castration anxiety at the centre of psychoanalysis in his work. This term refers to the fear of losing the penis, which also serves as the root of all neurosis and anxiety. Freud viewed this type of anxiety as a sexual indicator and an important stage in culture development. Faced with the threat of castration, the boy fears his father and begins to abandon his mother as an object of love. In the Oedipus complex, all the aggressive impulses at the centre are distanced. The moral instructions of society are forced to be adopted, constituting the birth of the superego. Therefore, castration anxiety is considered the most important stage of the development process [8]. For many analytically oriented therapists, circumcision is the equivalent of castration, evoking fear and revulsion [25].

Many studies reported the ideal age range for circumcision as infancy. In infancy, mobility is low, local anaesthesia is easy to administer, healing is rapid, cosmetic outcomes are therefore improved and complications are low [26]. Complication risk is an important consideration from a surgical perspective. Circumcision performed in infancy is safe in terms of the risk of complications. The median

complication rate in neonatal or infancy circumcision is 1.5%, which reaches 6% after 1 year of age [27].

Our other remarkable finding is the lack of significant difference in sexual function between the two groups, which is also confirmed by other meta-analysis results. A recent meta-analysis revealed no significant difference in circumcision status, premature ejaculation and orgasm [28]. The satisfaction of the circumcised group in terms of intravaginal ejaculation latency time and pain during intercourse was higher compared with the uncircumcised group. Furthermore, a recent systematic review of high-quality studies reported that circumcision at any age did not adversely affect sexual function and pleasure [29].

The discussion regarding circumcision timing remains controversial, with arguments favouring early circumcision over delayed procedures. A prospective study using the Golombok-Rust Inventory of Sexual Satisfaction to analyse sexual dysfunction among circumcised men across different infancy and childhood age groups found no significant difference in the prevalence of sexual dysfunction between groups, although the 3- to 5-year-old group showed worse results in certain areas [30]. Significant difference was observed only in the avoidance domain, with less avoidance in the infant circumcision group than in those circumcised at 3–5 years of age [30]. Another work evaluated the effect of circumcision during the PP (between the ages of 3 and 6 years) on psychosexual functions in adult males by utilising the Index of Erectile Function, Premature Ejaculation Diagnostic Tool and Beck Depression Inventory scores and found no significant difference between those who were circumcised during and beyond this period [9]. Cüceloğlu *et*

*al.* [31] reported that circumcision after 7 years of age might negatively affect premature ejaculation, and Yavuz *et al.* [32] suggested performing circumcision when the individual can make their own decisions, considering its cultural significance and potential impact on body image and sexuality. However, these studies were conducted within populations where circumcision has essential socio-cultural significance, potentially influencing perceptions of body image and sexuality.

Some people are dissatisfied with circumcision, regardless of timing [33]. In terms of appearance, men and their partners prefer the circumcised appearance of the penis according to adult circumcision studies [34]. Generally, body images are not related to circumcision during or beyond the PP. Our findings reveal no significant difference in sexual function and genital image between the two groups. Given that no uncircumcised participants were recruited in our study, these findings are limited to the timing of circumcision rather than its effect.

Our study further encourages current findings, especially because it assesses the circumcision period. We observed no significant difference in sexual and perception parameters between those who were circumcised during and beyond the PP. This finding indicates that surgical interventions performed on the penis during periods of heightened fear of castration do not result in long-term consequences.

Previous research suggested examining the link among male sexuality, masculinity and motivations for circumcision [35]. Masculinity is culturally internalised behaviour that specifies men's roles and attitudes [19]. We found no significant difference in gender perception based on circumcision age. In Turkey, the gender roles still have a room for improvement. Our research indicates that a reference to the oedipal period about this issue may be unlikely.

Concrete bodily "thinking" dominates Freud's perspective of castration anxiety, which focuses on the PP. Anxious thoughts such as punishment or losing the penis completely can be experienced intensely during this period. Elucidating whether these considerations have the same impact on the patient as Freudian psychiatrists believe is crucial. Our study displays no significant difference in the cognitions the participants have recalled regarding circumcision. Despite periodic differences, they have no idea that the process can affect them in the long run.

The parents' justifications for circumcision are noteworthy. According to a nationwide study, 91.3% of parents believe that circumcision is necessary, although it has no medical or religious basis in Korea. The main reasons were "better penile hygiene" (82.4%) and "improvement of future sexual function" (7.5%) [36]. The same study also found that among the 2.1% who believed circumcision was unnecessary, 55.1% believed that the foreskin would retract with age. A USA study showed that 88% of parents are willing to have their sons circumcised [37]. In an Indian study on Hindu women, 78% of whom do not traditionally

participate in circumcision, 81% reported that they would circumcise their sons after being informed about circumcision [38]. This situation points to the problem of insufficient information even among adults. Although waiting for the child to make up his mind is an alternative idea, getting the right information remains crucial. According to our findings, 78.2% of participants reported that they would have their children circumcised. Sexual health reasons were most frequently cited as the reason. The only difference between the two groups was citing religious reasons for circumcision. We foresee that this situation will be similar in large-series studies.

Overall, our study supports previous research suggesting that circumcision does not have a negative psychological impact [39]. The limitations of our study are its cross-sectional design and self-report scales. Some other psychological factors that may be associated with the age of circumcision, such as self-esteem and personality profiles, were not considered. Given that no uncircumcised participants were recruited, we could not make a comparison in this regard. Owing to the nature of our analyses, our findings only demonstrate the existence of relationships, highlighting the need for further casual investigations to explain the underlying mechanisms of these relationships. Lastly, assessing people's past cognitions may appear to be a limitation. How much they remember their past evaluations may be problematic. However, in psychology, current problems are evaluated through current cognitions. For example, therapy attempts to change a trauma patient's current cognitions of the past. In this sense, we believe that current cognitions about circumcision must be evaluated. We consider that prospectively designed studies could contribute to the field.

## Conclusions

Our study indicated no significant difference in sexual and perception parameters between those who were circumcised during and beyond the PP, suggesting the lack of psychological evidence that circumcision should only be performed for children beyond this stage. We suggest that this proposal, presented from the perspective of traditional dynamically oriented therapies, should be reconsidered in light of scientific knowledge.

## Availability of Data and Materials

The datasets supporting the current study's findings are openly available at <https://doi.org/10.5281/zenodo.14918842>.

## Author Contributions

MY—designed the study; FY and HG—collected and analyzed the data; IÜ—participated in drafting and revising the manuscript. All authors conducted the study and con-

tributed to critical revision of the manuscript for important intellectual content. All authors gave final approval of the version to be published. All authors participated fully in the work, took public responsibility for appropriate portions of the content, and agreed to be accountable for all aspects of the work in ensuring that questions related to the accuracy or completeness of any part of the work were appropriately investigated and resolved.

### Ethics Approval and Consent to Participate

The Non-Interventional Clinical Research Evaluation Ethics Committee of Ufuk University approved this study. The approval was registered under decision number 22.11.24.10/07 at the meeting held on 24 November 2022, and we were notified on 30 November 2022 with document number 12024861-81. The study was performed per the principles of the Declaration of Helsinki. All eligible participants signed an informed consent form.

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### Conflict of Interest

The authors declare no conflict of interest.

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