Evaluation of the Effect of Mode of Delivery on Female Sexual Function

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A B S T R A C T

Introduction. Exploring the hypothesis that "sexual function" is associated with mode of delivery is important, because sexual health is an integral part of general health.

Aim. The aim of this study was to evaluate the relationship between mode of delivery and subsequent incidence of sexual dysfunction and impairment of sexual quality of life (SQoL) in women.

Main Outcome Measures. Sexual function as well as sexual quality of life of females were assessed using Female Sexual Function Index (FSFI) and sexual quality of life – female (SQoL-F).

Methods. A total of 100 women (mean age 29.1 ± 3.11 years, range 25–35 years) were recruited in this cross sectional study. Females were divided into two groups according to their mode of delivery, including: group A, normal labour (NL) (group NVD, N = 45); group B, cesarean section (C/S) (group C/S, N = 55).

Results. The mean period for resumption of sexual intercourse 1st intercourse after the 1st labour was 6.1±1.92 weeks. There was significant difference in mean score of FSFI before and after C/S (P = 0.04), while no

difference was observed in NL (P = 0.07). Desire domain score showed significant difference between pre and post 1st labour for both NL (P = 0.001)and C/S(P = 0.01) while orgasm, satisfaction and pain domains showed no significant difference. Arousal and lubrication domains scores showed significant difference between between pre and post 1st labour in NL where P equals 0.01 and 0.03 respectivily, while they showed no significant difference in C/S. The research showed no significant difference in standardized score of SQoL-F between NL and C/S groups. The most important significant factor for prediction of SQoL-F score was assistance in house work.

Conclusions. NL is associated with the higher rate sexual dysfunction in comparison with C/S in contrast to SQoL-F which is not similarly affected.

Key Words. Post-partum; Sexual Dysfunction; Mode of Delivery; NL; C/S; FSFI; SQoL-F.

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Abbreviations

AFUD	American Foundation of Urological Diseases
C/S	Cesarean Section
COPD	Chronic Obstructive Pulmonary Disease
DEOR	Desire, Excitement, Orgasm and Resolution
DHS	Demographic and Health Survey
DM	Diabetes Mellitus
DSM-IV TR	Diagnostic and Statistical Manual of Mental Disorders
ED	Erectile Dysfunction
EPOR	Excitement, Plateau, Orgasm and Resolution
FGM	Female Genital Mutilation
FGM/C	Female Genital mutilation /Cutting
FOD	Female Orgasmic Disorder
	Fourth Edition, Text Revision
FSAD	Female Sexual Arousal disorder
FSD	Female Sexual Dysfunction
FSFI	Female Sexual Function Index
GAD	Generalized Anxiety Disorder
HbA1c	Glycated Hemoglobin
HSDD	Hypoactive Sexual Desire Disorder
ICD-10	International Classification of Diseases, Tenth Revision
IUD	Intrauterine Device
MPOA	Medial Preoptic Area

ND	Normal Delivery
NL	Normal Labour
NO	Nitric Oxide
NPT	Nocturnal Penile Tumescence
NRC	National Research Center
NVD	Normal Vaginal Delivery
OCD	Obsessive Compulsive Disorder
OCPs	Oral Contraceptive Pills
PAHO	Pan American Health Organization
PDE	Phosphodiesterase Enzyme
PFE	Pelvic Floor Exercise
PND	Postnatal Depression
PPFSD	Postpartum Female Sexual Dysfunction
PVN	Paraventricular Nucleus
QoL	Quality of Life
SD	Sexual Dysfunction
SQoL	Sexual Quality of Life
SQoL- F	Sexual Quality of Life-Female
SSRIs	Selective Serotonin Reuptake Inhibitors
STAH	Subtotal Abdominal Hysterectomy
SUI	Stress Urinary Incontience
SWAN	Study of Women's Health across the Nation
TAH	Total Abdominal Hysterectomy
VD	Vaginal Delivery

VIP Vasoactive Intestinal Polypeptide

WHO World Health Organization

Introduction

Sexual health is an important and crucial part of general health as it affects quality of life (QoL). Sexual dysfunction (SD) is a fairly common problem in both women & men ***(Safarinejad, 2006).*** Female sexual dysfunction (FSD) is a prevalent problem affecting approximately 40% of women with higher prevalence among less educated women ***(Singh et al., 2009).***

A study was carried in Upper Egypt found that the prevalence FSD was 76.9%. Low sexual desire was the most common sexual problem with a prevalence of 66.4% ***(Hassanin et al., 2010)***. In anoyher study the prevalence of FSD in Lower Egypt was 68.9***% (Elnashar et al., 2007).***

Sexual dysfunction is a possible complication of child birth to the extent that it attracts significant attention nowadays. Sexual function has to be considered during planning mode of delivery. Both pregnancy & delivery may cause anatomical & functional changes in pelvic floor muscles & intrapelvic organs. We may assume that, most probably, the mode of delivery is responsible for any change in sexual function ***(Safarinejad et al., 2009).***

Vaginal delivery (VD) may cause injury of the pudendal nerve which is responsible of transmission of sensory & motor impulses to & from female external genitalia through dorsal nerve of the clitoris & perineal nerve ***(Pollack et al., 2004).*** Vaginal delivery may also cause anal sphincter injury & dysparunia ***(Nicholas et al., 2004).*** Primiparae who delivered vaginally reported decreased sexual sensations & worsened sexual satisfaction in the 1st 6 weeks to 6 months after delivery ***(Klien et al., 2009)***

Despite that obstetric practice guidelines aim at reducing number of cesarean sections, There has been increasing number of women demanding cesarean sections in addition of change of attitudes of obstetricians & midwifes toward cesarean section ***(Impey & Boylan, 1999).***

Sexual dysfunction is a potential risk for child birth. Female sexual dysfunction is an annoying problem as it has great impact on patient self-esteem, quality of life & interpersonal relationships ***(Singh et al., 2009).***

Aim of work

❖Goal:

This study aims at detecting the prevalence of female sexual dysfunction in both normal labour and cesarean section

❖Objectives:

1) To assess females' sociodemographic background, medical history, obstetric and gynecological history and life style.

2) To assess the female sexual quality of life.

3) To assess the female sexual function.

4) To evaluate the female sexual quality of life and function according to mode of delivery.