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Perfectionistic traits and importance given to parenthood are associated with infertility-related quality of life in a sample of infertile women with and without endometriosis

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ABSTRACT

Objective: To assess quality of life and psychological differences between infertile women with endometriosis and without endometriosis. To investigate predictive role of perfectionism, mindful awareness and beliefs about parenthood to quality of life in a sample of women with fertility problems.

Methods: 43 infertile women (22 with endometriosis; 21 without endometriosis) who recurred to Assisted Reproductive Treatments (ARTs) in the last 12 months took part to this cross-sectional study. Sociodemographic and clinical data were collected by means of a structured ad hoc questionnaire. Fertility Quality of Life, Fertility Problem Inventory – Need of parenthood subscale, Obsessive Beliefs Questionnaire – Perfectionism subscale, and Cognitive and Affective Mindfulness Scale – Revised were used to assess target outcomes.

Results: Any difference in quality of life and psychological condition was found between infertile women with and without endometriosis. Importance given to parenthood ($beta = -.60$, $p < .001$) and perfectionism ($beta = -.30$, $p < .05$) predicted quality of life related to fertility issues, independently of group.

Conclusions: Infertility might elicit self-discrepancy between real-self (i.e. being infertile) and ideal-self (being fertile), which in turn has a negative impact on quality of life. Conclusions about the role of psychologist in ART's team are discussed.

Introduction

Worldwide, the belief that motherhood is the highest social roles that a woman can reach is fixed in identities, and maternity is still considered the main milestone of female adult development [1]. Infertility refers to the inability or failure to conceive after regular unprotected sexual intercourses for at least 12 months [2].

Among women with fertility issues, about 50% of them have received a diagnosis of endometriosis [3], a gynaecological disabling condition characterized by endometrial-like tissue outside the uterus. Endometriosis is a chronic condition known to lead to pain symptomatology, like chronic pelvic pain, dyspareunia, dyschesia, low back pain, dysmenorrhea [4], low quality of life and high psychological disturbances [5–7]. In particular, several studies have found high levels of anxiety, depression, somatization, and other psychiatric disorders as well as sexual dysfunctions in this population [8–10]. Moreover, a range of studies have suggested that the chronic pain itself could be one of the major causes of psychological disturbance of women with endometriosis [8,11], and that the experience of pain could be negatively influenced by the presence of anxiety/depression [8] and dysfunctional coping strategies [12].

Experiencing infertility and undergoing Assisted Reproductive Treatments (ARTs) have been related to several psychological disturbances, such as depression, anxiety, sexual distress, couple's relational problems, and loss of control [13–16]. However, even if psychological burden related to infertility was widely investigated in years, very few studies focused on the role of beliefs and personality traits. Previous studies have found that beliefs of parenthood are central in men's life when the couple undertakes infertility treatments [17] and that ART path is harder for those couples who attribute higher

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importance to become parents [18]. Moreover, perfectionism, a personality trait characterized by striving for flawlessness, setting high performance standards, critical self-evaluations and concerns regarding others' evaluations, was found to lead to more stress in samples of infertile women [19].

Furthermore, despite the well-known association between endometriosis and infertility, few studies have specifically focused on the investigation of the psychological burden due to the combination of the two conditions. Indeed, a recent systematic review concluded that there is inadequate investigation of women's experiences of endometriosis-associated infertility [20]. Limited literature on this topic suggested that: (a) infertile women with endometriosis (especially those in advanced stages) have higher depression, stress and anxiety, as well as decreased quality of life than infertile ones without endometriosis [21]; (b) women with severe endometriosis who searched for a child and failed seem to have worse quality of life, less vitality and higher limitations due to emotional problems when compared to women with endometriosis who gave birth to a child [22]. According to limited literature, infertile women with endometriosis require specific medical and psychological attention than those without endometriosis. From the medical point of view, the integrated approach should be the gold standard treatment for patients affected by endometriosis-associated infertility [23]. Moreover, due to the difficulty of management, it is important to provide a multidisciplinary approach that allows to reduce the impact on psychological and emotive well-being [24].

Concluding, in order to overcome existing limitations of literature, the main aims of this research study were: (a) to assess psychological and quality of life differences between infertile women with endometriosis and infertile women without endometriosis; (b) to investigate the role of endometriosis, beliefs and attitudes about own identity as mother (i.e. importance given to parenthood), psychological traits (i.e. perfectionism) and cognitive abilities (i.e. mindful awareness) in explaining quality of life related to infertility.

Methods

Participants and procedure

From July 2017 to February 2018, infertile women who underwent ARTs in the last 12 months were recruited from an hospital of north Italy and from virtual support groups to take part to this pilot study. We included women with and without a diagnosis of endometriosis who recurred to ART in the last 12 months, without past or concurrent neurological and psychiatric disorders or severe medical conditions, and able to write and read in Italian language.

Women affiliated to the hospital were contacted by a researcher by telephone and invited to participate to the study. Only 30% of them accepted to participate to the study. The presence of past or concurrent psychiatric disorders was assessed by a clinical psychologist by means of open-ended questions. Basing on information reported by each participant, the psychologist established his eligibility to the study.

A total of 56 infertile women was firstly enrolled. Then, 13 of them were excluded because were pregnant or just had a child. Finally, 43 women (22 infertile women with endometriosis; 21 infertile women without endometriosis) were included in the study.

Sociodemographic and clinical information of the two groups are shown in Table 1. The study was conducted in accordance with APA [25] ethical standards for the treatment of human experimental volunteers; each participant provided consent in compliance with the Declaration of Helsinki [26].

Instruments

Sociodemographic and clinical information (about endometriosis or other medical conditions, and infertility history) were collected by means of a structured ad hoc questionnaires. Quality of life related to

Table 1
Sociodemographic and clinical characteristics of the two samples.

	Infertile women with Endometriosis (N = 22)	Infertile women without Endometriosis (N = 21)	*p*
Sociodemographic information			
Age: mean (*SD*)	35.73 (4.53)	36.14 (3.45)	.738
Education:*n*			.394
Middle Schools	2	2	
High Schools	9	9	
Bachelor's Degree	5	4	
Master's Degree	3	6	
Postgraduate/PhD Degree	3	0	
Marital Status:*n*			.348
Single	2	0	
Common Law	6	6	
Married Divorced	11	15	
	1	0	
Engaged	1	0	
Separated	1	0	
Occupation:*n*			.510
Employed part-time	1	4	
Employed full-time	17	13	
Self-employed	2	2	
Unemployed	2	2	
Smoking:*n*			.523
No	16	17	
Physical Activity: mean (*SD*)	2.68 (2.05)	2.29 (3.02)	.615
Endometriosis information			
Endometriosis localization:*n*			/
Ovary	20	/	
Intestine	10	/	
Urinary tract	4	/	
Rectovaginal septum	14	/	
Uterus	3	/	
Bladder	2	/	
Diaphragm	1	/	
Other sides	3	/	
Stage:*n*			/
Stage II	1	/	
Stage III	3	/	
Stage IV	15	/	
Not known	3	/	
Pelvic pain*:*n*			/
No	3	/	
Dysmenorrhea*:*n*			/
No	4	/	
Not having menstruation	3	/	
Dyspareunia*:*n*			/
No	8	/	
Not had sexual intercourse	2	/	
Dyschesia*:*n*			/
No	11	/	
Dysuria*:*n*			/
No	16	/	
Backache*:*n*			/
No	4	/	
Time spent since diagnosis^: mean (*SD*)	6.23 (4.11)	/	/
Time spent since symptoms onset^: mean (*SD*)	11.67 (8.53)	/	/
Past Treatment for Endometriosis:*n*			/
Medical Treatments	1	/	
Surgical Treatments	4	/	
Both Medical and Surgical Treatments	15	/	
None	1	/	

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