

# EFFECTS OF BREASTFEEDING ON ENDOMETRIOSIS: A PROSPECTIVE OBSERVATIONAL STUDY



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# INTRODUCTION

Endometriosis is a gynecological estrogen-dependent disease, whose commonest pain symptoms are dysmenorrhea, dyspareunia and acyclic chronic pelvic pain (CPP). Hormonal changes occurring during breastfeeding seem to reduce pain and disease recurrence.

The aim of this observational prospective study was to assess the effect of breastfeeding on pain and endometriotic lesions in patients with endometriosis and to evaluate a possible correlation between the duration of breastfeeding, postpartum amenorrhea and pain.

# MATERIALS AND METHODS

Out of 156 pregnant women with histologically confirmed endometriosis, 123 breastfeeding women referred to the Endometriosis and Pelvic Pain outpatient Service of Policlinico Umberto I University Hospital in Rome were included in the study and monitored for 2 years after delivery. Among them, 96 exclusively breastfed for at least 1 month. Mode of delivery, type and duration of breastfeeding, intensity of pain symptoms and size of lesions before pregnancy and during the 24-months follow-up were analyzed.

# RESULTS

All patients experienced a significant reduction in the intensity of dysmenorrhea (p=0.02), proportional to the duration of breastfeeding and of postpartum amenorrhea (p=0.04). CPP was significantly reduced only in women who exclusively breastfed (p=0.002). No significant improvement in dyspareunia was observed. Ovarian endometriomas were significantly reduced and no recurrence of disease was observed at 24-month follow-up (p=0.041). Although the evaluation of quality of life (QoL) was not an aim of our study, 81 patients (65.8%) reported a significant improvement in their health status in terms of self-perception of painrelated QoL. Among them, 60 patients (74%) exclusively breastfed.

# CONCLUSIONS

Breastfeeding, particularly if exclusive, may cause an improvement in dysmenorrhea and CPP proportional to the duration of breastfeeding. Moreover, a reduction in the size of ovarian endometriomas was observed.

Mean age (±SD)	$33.8 \pm 4.7$
Mean BMI (±SD)	$22.2 \pm 2.7$
Parity	n. (%)
0	84 (68.2)
1	27 (21.9)
2	12 (9.7)
Stage at previous surgery	n. (%)
III stage	66 (53.6)
IV stage	57 (46.3)
Type of lesions at surgery	n. (%)
Peritoneal endometriosis	34 (27.6)
Adhesions	62 (50.4)
DIE	39 (31.7)
Ovarian endometriomas present at the beginning of pregnancy	n. (%)
Monolateral	39 (76.4)
Bilateral	12 (23.6)
Average size of ovarian endometriomas (cm) ±SD	$3.25\pm0.91$
Prevalence of pain symptoms before pregnancy	n. (%)
Dysmenorrhea	101 (82.1)
Dyspareunia	74 (60.1)
СРР	91 (73.9)
Mean VAS score (±SD)	
Dysmenorrhea	$6.1 \pm 3.6$
Dyspareunia	$5.1 \pm 2.8$
Dysparcama	4.0
CPP	$4.8 \pm 2$
CPP Type of delivery	1.8 ± 2 n. (%)
СРР	
CPP Type of delivery	n. (%)
CPP Type of delivery Vaginal Cesarean Section Gestational age at delivery	<b>n.</b> (%) 60 (48.8)
CPP  Type of delivery Vaginal Cesarean Section	n. (%) 60 (48.8) 63 (51.3)
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