

DOI: <http://dx.doi.org/10.18203/2320-1770.ijrcog20160387>

Research Article

Efficacy of LNG IUS

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Received: 15 December 2015

Accepted: 08 January 2016

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ABSTRACT

Background: Objective of the study was to find out improvement in menstrual symptoms with Levonorgestrel Intrauterine System (LNG IUS) among women presenting with heavy menstrual bleeding.

Methods: LNG IUS was inserted in women presenting to Gynaecology outpatients department with complains of heavy menstrual bleeding (HMB), pain or for contraception. The age range was 37-46 years. Endometrial biopsy was done in all patients. Only those women with LNG IUS use were included in the study who continued to visit us for at least 6 months.

Results: There were 35 women who were included in this observational study. 94.28% (33/35) women had LNG IUS inserted in theatre whilst 5.7% (2/35) had in the outpatients department. There was improvement in menstrual symptoms in 80% of the patients. There was no relief in the endometriosis group. Total abdominal hysterectomy was performed in 7 women who had endometriosis (20%).

Conclusions: In my observational study 80% of women are satisfied with the device and had relief in their symptoms. In view of HMB's high prevalence, an optimal treatment for this kind of menstrual symptoms is very important especially in developing world set up where resources aren't easily available.

Keywords: Heavy menstrual bleeding, Levonorgestel Intrauterine System, Endometrial biopsy, Hysterectomy

INTRODUCTION

Heavy menstrual bleeding is the commonest gynecological presentation in Gynecology clinics and great majority of women are willing for surgical treatment. This is mainly due to lack of awareness and ignorance in India.¹⁻⁴

Women aren't much aware that hysterectomy is a major surgical procedure with its complications and costs. On the contrary, there are few women who want only non-surgical treatment (IUS or ablation) due to either financial reasons or social in spite of the fact that they are told that success is not always possible.⁵⁻⁷

Levonorgestrel Intrauterine System (LNG IUS) is now available in Indian Market. LNG IUS contains approximately 52 mg of Levonorgestrel. It releases of

LNG approximately 20 mcg per day. Depending upon the manufacturer/product its life could be either 3 years or 5 years.

Contraindications to its insertion are suspected pregnancy, pelvic inflammatory disease, undiagnosed vaginal bleeding, genital malignancy, liver disease, bacterial endocarditis, and recent trophoblastic disease.

Adverse reactions are change in cycle pattern (51.9%), amenorrhoea (23.9%), intermenstrual bleeding and spotting (23.4%), abdominopelvic pain (12.8%) and ovarian cyst (12%).

Our aim and objective was to find out improvement in menstrual symptoms with LNG IUS among women presenting with heavy menstrual bleeding.

METHODS

LNG IUS was inserted in women presenting to Gynaecology outpatients department with complains of heavy menstrual bleeding (HMB), pain or for contraception. The age range was 37-46 years.

Endometrial biopsy was done in all patients to exclude any endometrial pathology as our patients may not be very certain of their age. There were 35 women in this observational study. Only those women with LNG IUS use were included in the study who continued to visit us for at least 6 months.

Patients were informed regarding efficacy, risks and side effects of the IUS. Physical examination including breast exam, pelvic exam and cervical smear was done before insertion. Pregnancy and sexually transmitted infection was excluded prior to insertion.

Patients were appropriately counseled that with continued use the bleeding will/can become very scanty to oligomenorrhoea/amenorrhoea even if it was heavy during the first few months of insertion.

RESULTS

There were 35 women who were included in this observational study. 94.28% (33/35) women had LNG IUS inserted in theatre whilst 5.7% (2/35) had in the outpatients department.

Table 1: Site of LNG IUS.

Theaters	33 (94.28%)
Outpatients Department	2 (5.7%)

IV sedation was used for LNG IUS insertion in 62.85% of cases, while para cervical block was used in 17.14%, oral analgesia in 14.28% and no analgesia was used 5.71% of cases.

Table 2: Analgesia.

IV Sedation	22 (62.85%)
Para cervical block	6 (17.14%)
Oral	5 (14.28%)
None	2 (5.71%)

LNG IUS was used in 51.42% of cases for heavy menstrual bleeding. HMB+Endometriosis were the indication in 20 % of cases for LNG IUS insertion, HMB + dysmenorrhea in 14.28 %, fibroids + HMB in 8.57%. It was used for HMB and as contraceptive in 5.71% of women. Diagnosis of endometriosis was done based on clinical symptoms, signs and MRI.

There was improvement in menstrual symptoms in 80% of the patients.

There was no relief in the endometriosis group. Total abdominal hysterectomy was performed in 7 women who had endometriosis (20%).

Table 3: Indications for use.

Indicated for menorrhagia (HMB)	18 (51.42%)
Indicated for endometriosis + HMB	7 (20%)
Indicated for dysmenorrhea + HMB	5 (14.28%)
Indicated for fibroids + HMB	3 (8.57%)
Indicated for contraception + HMB	2 (5.71%)

Table 4: Outcome.

Patient feels better than before	28 (80%)
Will continue with LNG IUS	28 (80%)
Hysterectomy performed	7 (20%)

DISCUSSION

In view of HMB's high prevalence, an optimal treatment for this kind of menstrual symptoms is very important especially in developing world set up where resources aren't easily available. LNG IUS appears to be a boon to the women with heavy menstrual bleeding provided they are adequately counselled.

Studies report that effectiveness of LNG IUS in the reduction of menstrual blood loss is approximately 80-96%.⁸⁻¹¹

But, studies also report that 60% of women who use LNG IUS discontinue it within 5 years due to unscheduled bleeding or pain or systemic progestogenic side effect. Here lies the importance of thorough counselling about the adverse effect and menstrual symptoms with LNG IUS in situ.¹²

CONCLUSIONS

In my observational study 80% of women are satisfied with the device and have relief in their symptoms. A bigger study is needed to further support this.

Funding: No funding sources

Conflict of interest: None declared

Ethical approval: The study was approved by the Institutional Ethics Committee

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Cite this article as: Pandey U. Efficacy of LNG IUS. *Int J Reprod Contracept Obstet Gynecol* 2016;5:445-7.