

Epidemiology of the endometrial polyp at Hospital Las Higueras de Talcahuano between 2015 and 2018

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Abstract:

Introduction: Endometrial polyps are benign nodular protrusions of the endometrium. Its prevalence varies from 7.8 to 34.9% according to various studies, being more frequent in women aged 45-50 years. As a therapeutic option, hysteroscopy and hysterectomy are available.

Purpose: Epidemiologically characterize patients diagnosed with endometrial polyp.

Material and Method: Observational, descriptive, retrospective study. The information was obtained from the book of income and leavings of the Gynecology Service of Hospital Las Higueras. From 4,130 patients hospitalized between May 2015 and April 2018, as a selection criterion, endometrial polyp diagnosis was used, discarding those without intervention information, obtaining a population of 322 patients. The data was tabulated and processed in Microsoft Excel. Patients were organized in age groups of 10 years, including diagnosis of admission and discharge, intervention, operative time and days of hospital stay.

Results: 6.56% of the patients admitted with the diagnosis of endometrial polyp, 67% of them had the diagnosis at the moment of leaving. The largest age range was that of 40-49 years old, constituting 43.90% of the patients admitted by polyp. The most frequent interventions were 291 hysteroscopies and 16 hysterectomies, 91.79% and 5% respectively. The surgery time and the days of average stay were 28.33 minutes and 2.86 days, respectively.

Conclusions: Endometrial polyps were more frequent in 40-49 years old women, performing more hysteroscopies, a procedure that includes shorter surgery time and days of hospital stay.

Keywords: Endometrial polyp, epidemiology, hysteroscopy, hysterectomy.

I. INTRODUCTION

Endometrial polyps are defined as mostly benign nodular protrusions on the endometrial surface consisting of glands, stroma, and blood vessels. Histologically, its basic abnormality is hyperplasia, however, there are data indicating that they can also

coexist with endometrial cancer in up to 8%, depending on the age of the patient. [1] [2]

Its prevalence is high in the gynecological consultation, being a habitual cause of abnormal bleeding and more rarely of infertility. Although its etiopathogenesis is currently not fully elucidated, it has been observed that the presence of a hormonal stimulus associated with inflammatory phenomena promotes the proliferative process of the endometrium in a previously susceptible terrain. Therefore, it is associated with risk factors that are widely present in our population, such as high blood pressure, type II diabetes mellitus and obesity, among others that are more specific, such as the use of tamoxifen and other controversial ones, such as the use of hormonal therapy. and the menopausal state. [1] [3]

For the management of this pathology, the patient's age, future fertility wishes, general clinical condition (symptoms), risk factors for malignancy, and surgeons' skills must be considered. In addition, it is important to consider the various differential diagnoses of endometrial polyp to offer the best available treatment for the patient. [1]

Given these antecedents, we consider it interesting to analyze the epidemiology of the endometrial polyp in our hospital, characterizing the population with a diagnosis of endometrial polyp, the histological findings of these endometrial overgrowths and the surgical treatment indicated in the different cases admitted to the Hospital Gynecology Service. Las Higueras de Talcahuano during the years 2015 and 2018.

II. OBJECTIVES

A. General objective:

Characterize epidemiology of patients with endometrial polyp hospitalized in the Gynecology Service of the Higueras de Talcahuano Hospital between May 2015 and April 2018.

B. Specific objectives:

1. To analyze the prevalence of endometrial polyp according to age group in patients hospitalized in the gynecology service of Hospital Las Higueras de Talcahuano between May 2015 and April 2018.

2. Identify the most frequently performed interventions for the treatment of endometrial polyp at Hospital Las Higueras de Talcahuano between May 2015 and April 2018.

3. Analyze the operative times and days of hospital stay in relation to the different interventions for the treatment of endometrial polyp.

III. THEORETICAL FRAMEWORK

In epidemiological studies on abnormal uterine bleeding, the finding of endometrial polyp has been reported as rare among adolescent women [4]. The frequency of endometrial polyps has been difficult to establish because their presence does not necessarily cause patients to present symptoms, in addition to the different diagnostic methods used to find endometrial polyp between published series. However, a prevalence of 10 to 24% has been established among women undergoing endometrial biopsy or hysterectomy. [5] [6] The prevalence in general, according to various studies, varies from 7.8 to 34.9%, being more frequent in women between 45-50 years.

The prevalence according to age in a Danish study that included 619 patients, 0.9% in the range 20-29; 9.3% in those over 30 years of age, increased with age, being 11.8% in postmenopause, 2.1% in patients using oral contraceptives and 25% in patients with hormone replacement therapy. [7]

Regarding the presence of intrapolyp atypia, this determines its premalignant potential. Which will have up to 28% malignant transformation in its natural evolution and 42.6% associated endometrial carcinoma in hysterectomy specimens. The information available regarding the malignant potential, in frequency, varies from 0.8-8% [8]. In 5,683 hysterectomies analyzed for the period 1991-2005, the incidence of endometrial polyp reached 7.4% and only 2.4% of them demonstrated the presence of cancer [9]

Regarding the diagnosis and surgical management, whether conservative or radical, currently, within conservative surgical management, surgical hysteroscopy is considered the diagnostic and therapeutic gold standard in benign diseases of the endometrial cavity, including endometrial polyp. The usefulness of hysterosonography as the most useful non-invasive method in relation to transvaginal ultrasound for the evaluation of endometrial polyps in symptomatic patients is discussed, reaching a sensitivity and specificity of 92-93% and 94-100% respectively, in addition to providing additional information on its morphology and location, which would eventually make it possible to choose the most suitable element for its resection [3]. However, the advantages of hysteroscopy over hysterosonography as a diagnostic and therapeutic method are widely recognized in the literature, such as complete resection of the polyp under direct vision, observation and biopsy of any other suspicious lesion in the endometrial cavity, low rate of complications, shorter stay hospital and an expeditious return to normal activity, so the routine use of hysterosonography is not recommended [1]

In the case of radical surgical management, total hysterectomy is the radical and definitive surgical option. Although it guarantees the absence of recurrences and future malignancy, it is a treatment with potentially greater morbidity, cost, invasiveness and that ends fertility, in such way that its indication must be justified and in accordance with the patient. Studies have indicated that there are no significant differences in symptomatic relief at two years in relation to hysteroscopy versus hysterectomy, however, the degree of satisfaction was slightly higher in hysterectomized patients two years after surgery, reaching similar values four years after surgery. Regarding postoperative complications, they were significantly lower in patients who underwent resectoscopy, dramatically reducing the percentages of transfusions (0.7 versus 4.5%) and infection (5.2 versus 32%). Hospital stay and return to activity were reduced by approximately 11.3 days and costs were significantly lower in patients who underwent resectoscopy versus hysterectomy [4] [11] [12] [13]

Regarding the decision to treat, there is consensus that all endometrial polyps are treated when they are symptomatic [14] and expectant management would not be indicated since the vast majority of polyps would not return in size after follow-up (with an average regression rate of 27%) [15] In the case of asymptomatic endometrial polyps, there is consensus that these are treated when patients have risk factors for endometrial hyperplasia or cancer. These risk factors are determined according to: age (higher risk in postmenopausal patients), presence of obesity, use of tamoxifen, early menarche, late menopause, nulliparity, polycystic ovary syndrome, diabetes mellitus, hypertension, among others. [16]

It is also suggested to treat asymptomatic patients with: multiple polyps, polyps larger than 15 mm, associated polyps infertility and prolapsed polyps to the cervix. [1]

IV. MATERIAL AND METHOD

a) Methodology: Quantitative

b) Study design: Descriptive, retrospective observational study

c) Variables: To classify the patients included in the study, we will define the population in age ranges in groups of 10 years. The interventions will be ordered as: Hysteroscopy, hysterectomy, polypectomy, curettage, resectoscopy and others, understanding others as gynecological surgical procedures unrelated to the treatment of endometrial polyp, for example, TOT, vaginal plasties, laparoscopic sterilization.

d) Population and sample:

Population: Women, regardless of age, with admission or discharge diagnosis "Endometrial Polyp", without discriminating by histology, with or without concomitant pathologies, treated surgically by the Gynecology Service of Las Higueras de Talcahuano Hospital between May 2015 and April 2018.

Selection criteria: Being a woman, having a diagnosis of "Endometrial Polyp" at the time of admission or discharge, having her pathology resolved surgically between May 2015 and April 2018. For the development of this work, we did not use any type of sampling, since we will have the entire population previously defined for the determined period of time to determine the data.

e) Information collection instrument: Systematic review of the literature on endometrial polyps based on a search in the databases of the journal SciELO and PubMed, review of the Book of Admissions and Discharges to Gynecological Surgery of the Gynecology Service of Las Higueras de Talcahuano Hospital.

f) Data analysis proposal: The data will be organized, tabulated and analyzed using Excel software.

From a total of 4,130 patients hospitalized in the Gynecology service of Las Higueras Hospital in Talcahuano, between May 2015 and April 2018, the diagnosis of endometrial polyp was used as a selection criterion, obtaining a study population of 330 patients. Subsequently, those without information about the intervention were discarded, reducing the sample to 317 patients. The names of the patients or other information was not used in order to establish their identity, maintaining confidentiality and privacy at all times. The collected data were stored, tabulated and analyzed in the Microsoft Excel program. The patients were organized into age groups of 10 years, and variables such as age, admission and discharge diagnosis, intervention performed, operative time, and days of hospital stay were included.

V. RESULTS

Of the total number of hospitalized patients in the established period, 7.67% were diagnosed with an endometrial polyp. The mean age of the patients hospitalized for an endometrial polyp was 47.5 years. The median age was 47 years. When dividing the patients into age ranges of 10 years, the one with the largest number of patients was 40-49 years, corresponding to 39.11% of hospitalized patients, followed by the age group 50-59 years (23.65%). The group with the lowest number of hospitalized patients corresponds to patients between 80-89 years. (Fig. 1)

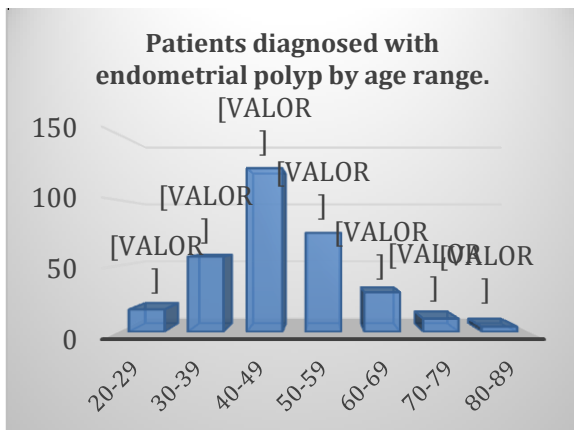


Fig. 1. Patients diagnosed with endometrial polyp by age range.

For the treatment, 291 hysteroscopies were performed, which is equivalent to 91.79% of all the interventions and 16 hysterectomies were performed, corresponding to 5% of the procedures. (Fig 2)

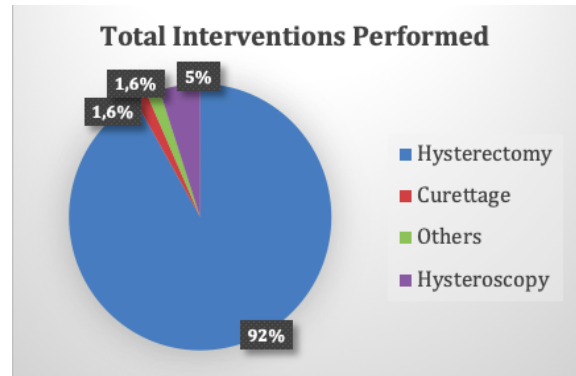


Fig.2. Total Interventions Performed expressed in percentages. The others interventions was aspiration biopsy, an endocervical polyp extraction by torsion and a laparotomy plus vaginal plasty

The mean operative time was 28.33 minutes and the mean days of stay were 2.19 days. The hysterectomized patients had an operative time of 63.3 min and average days of stay of 2.86 vs. the patients subjected to hysteroscopy with operative times of 26.8 min and average days of stay of 2.16, increasing the time by 81% surgery and 30.6% the days of stay in case of hysterectomy. (Table 1)

TABLE I. INTERVENTIONS, SURGERY TIME AND DAYS OF STAY.

| Procedure | Nº | % | Average surgery time (min) | Average days of stay |
|--------------|-----|--------|----------------------------|----------------------|
| Hysterectomy | 16 | 5% | 63,3 | 2,86 |
| Hysteroscopy | 291 | 91,80% | 26,8 | 2,16 |
| Curettage | 5 | 1,60% | 14,2 | 2 |
| Others | 5 | 1,60% | 17,5 | 2 |
| Total | 317 | 100% | 28,33 | 2,19 |

The others interventions was aspiration biopsy, an endocervical polyp extraction by torsion and a laparotomy plus vaginal plasty

Regarding interventions by age ranges, hysteroscopy was predominant in all of them, being the only procedure described for the extreme groups (ages 20-29 and 70-79, 80-89). Hysterectomies were 75% more frequent in the range of 40 to 49 years, constituting a total of 12 in this category.

Since the literature positions hysteroscopy as the gold standard for diagnosis and treatment [1][2], hysterectomy was performed in patients with diagnoses of endometrial polyp recurrence, or concomitant pathologies such as adenomyosis, uterine fibroids, endometrial hyperplasia and profuse symptoms causing anemia secondary.

VI. CONCLUSIONS

Endometrial polyps were more frequent in women aged 40-49 years, with more hysteroscopies being performed, a procedure that encompassed less operative time and days of hospital stay.

The first-line intervention performed at Hospital Las Higueras for the treatment of endometrial polyp is Hysteroscopy (91.79%), meaning less operative time and days of hospital stay for patients.

Hysterectomy is a procedure that is reserved for the treatment of endometrial polyp in selected patients, in those who present concomitant pathologies and cases of recurrence, taking into account the greater morbidity associated with a more invasive procedure and that ends fertility forever.

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