Lippes Loop intrauterine device left in the uterus for 50 years

Case report

Background. The first Lippes Loop intrauterine device was distributed in 1962. It was a plastic double “S” loop – a trapezoidal–shaped IUD that closely fit the contours of the uterine cavity, thereby reducing the incidence of expulsion. This IUD was commonly used from 1960s to 1980s. Some authors state that this IUD can be left in uterine cavity indefinitely. Prolonged use of this device was common; however it was associated with some complications – uterine bleeding during post-menopausal period and inflammatory pelvic disease. Results: The patient was 74-years-old woman who was admitted to LUHS hospital due to stress urinary incontinence. Patient’s history included 2 deliveries and 20 years of menopause. During ultrasonography normally sized and shaped uterus was found. The uterine cavity was expanded for 14 mm with some fluid. Also “Lippes” loop was seen in the uterine cavity. Both ovaries were atrophic without any abnormalities. The patient had this IUD inserted 50 years ago. Patient underwent TOT surgery for urinary incontinence, also evacuation of IUD and uterine curettage was done. Conclusions: Fifty years prolonged usage of LIPPES IUD in our case didn’t influence on woman’s health.

Key words: intrauterine device (IUD), contraception, LIPPES device.

Background

The intrauterine devices (IUD) are the most commonly used contraceptive method in the world (1,4,5). It is effective, long-acting and rapidly reversible. Also it is one of the most cost-effective methods, and can be used for most women, including those who have to avoid estrogens (4,5). The use IUD is associated with some complications including risk of uterine perforation, malposition and expulsion of the device, abnormal bleeding, and infections (2,5-7). There have been reported some cases of women with expired IUD’s (2,3,7).

Case report

We present a case of intrauterine device inserted 50 years ago. The patient was 74-years-old woman who was admitted to university hospital due to stress urinary incontinence. Patient’s history included 2 deliveries and 20 years of menopause. During ultrasonography normally sized and shaped uterus was found. The uterine cavity was expanded for 14 mm with some fluid. Also “Lippes” loop was seen in the uterine cavity. Both ovaries were atrophic without any abnormalities. The patient had this IUD inserted 50 years ago. It was attempted to extract it after few years of insertion, but it was not successful and woman forgot about it. Patient underwent TOT surgery for urinary incontinence, also evacuation of IUD and uterine curettage was done (Pictures Nr.1 and Nr.2). Histological exam revealed no abnormalities. Postoperative period was without complications and two days after surgery patient was discharged.

Discussion

The first Lippes Loop intrauterine device was distributed in 1962. It was a plastic double “S” loop – a trapezoidal–shaped IUD that closely fit the contours of the uterine cavity, thereby reducing the incidence of expulsion (1,3). This IUD was commonly used from 1960s to 1980s (1). Some authors state that this IUD can be left in uterine cavity indefinitely [3]. Prolonged use of this device was common; however it was
associated with some complications – uterine bleeding during post-menopausal period and inflammatory pelvic disease (1-3,6,7,8).

There have been reported cases about prolonged usage of the IUD. The time period of retained uterine devices varies from 22 to 44 years long. Those women presents to the specialist most commonly complaining of bleeding in post-menopausal period (1,2). The cause of the bleeding can be device’s migration into the uterine wall; also – chronic inflammatory response of the endometrium [2]. However, women with IUD presented with bleeding after menopause should be closely examined, as it can represent significant endometrial pathology. Investigation should include visualization of endometrial cavity by hysteroscopy, as measurement of endometrial thickness during ultrasound exam may be unreliable in the presence of an IUD (1).

Perforation of the uterus by an IUD has been reported on numerous occasions, and depending upon the degree of penetration through the myometrium can be partial or complete (2). A case was reported of a woman with Lippes loop who had perforation of the uterus after having the device inserted for 35 years. She presented with acute abdominal pain and underwent laparotomy and postoperative pathological report demonstrated characteristics of actinomycosis associated with perforation (7). It is noted that infection is most common during first year after insertion of the device but may occur at any time. This is caused by microorganisms’ migration from vagina and cervical canal along the threads of the uterine device (3).

In our case, woman had no complains about the intrauterine device. She had never experienced bleeding episodes after menopause, and pathological exam was clear of abnormal cells or infectious components in the curettage material.

Nowadays intrauterine devices are the most frequently used reversible family planning method in the world. The earlier IUD made of plastic materials have been replaced by new devices releasing copper or levonogestrel. These modifications increase the already high efficacy [5,6]. The prospective cohort study was done in the USA to analyze satisfaction and continuation of using different contraceptive methods. 12-month data from 5078 participants was analyzed. Continuation rates for long-acting reversible contraceptive method ranged from 83 to 88% (women who were using IUD or the implant). The rates for other contraception forms (contraceptive pills and rings) ranged from 54 to 57%. It was concluded that long-acting reversible contraceptive methods are most effective, forgettable and not user-dependent [4]. Many experts believe that IUD has highest continuation rates and high level of satisfaction among all methods of contraception (4-6).

Conclusion

Fifty years prolonged usage of LIPPES IUD in our case didn’t influence on woman’s health.

Consent

Written informed consent for the publication of this case report and the accompanying images was obtained from the patient.

List of abbreviations

IUD-intrauterine device.
TOT-tension obturator tape.

**Authors contributions’**

RA - surgeon of this case and general inspirator of main idea of the case report.

MG- participated as English language assessor.

PA-participated in the design and coordination of the manuscript (case report).

VD-helped to draft the manuscript (case report).

All authors read and approved the final manuscript.

**Conflict of interest statement**

None of the authors has a financial disclosure or conflict of interest.

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**References**


