

UNIT 5: NEOPLASIA

Educational Topic 53: Uterine Leiomyoma

Rationale: Uterine leiomyomas represent the most common gynecologic neoplasm and often lead to medical and surgical intervention.

Intended Learning Outcomes:

A student should be able to:

- Cite the prevalence of uterine leiomyoma
- Identify symptoms and physical findings in patients with uterine leiomyoma
- Describe the diagnostic methods to confirm uterine leiomyomas
- Describe the management options for the treatment of uterine leiomyomas

TEACHING CASE

CASE: A 42-year-old G3P3 woman presents with a history of abnormal bleeding and pelvic pain. She was well until approximately age 35, when she began developing dysmenorrhea and progressive menorrhagia. The dysmenorrhea was not fully relieved by NSAIDs. Over the next several years, the dysmenorrhea and menorrhagia became more severe. She then developed intermenstrual bleeding and spotting, as well as pelvic pain, which she describes as a constant feeling of pressure. She also complains of urinary frequency. Past gynecological history is otherwise non-contributory. She delivered three children by Caesarean delivery, the last with a tubal ligation at age 30. Her past medical history is unremarkable.

Physical examination reveals a well-developed, well-nourished woman in no distress. Vital signs and general physical exam are unremarkable. Abdominal examination reveals an irregular-sized mass extending halfway between the pubic symphysis and umbilicus and to the right of the midline. Pelvic exam reveals a normal appearing vagina and cervix. The uterus is markedly enlarged and irregular, especially on the right side where it appears to reach the lateral pelvic side-walls. The adnexae are not palpable given the size of the mass.

Beta HCG is negative. CBC reveals hemoglobin of 10.3 and hematocrit of 31.2%. Indices are hypochromic, microcytic. Serum ferritin confirms mild iron deficiency anemia. Pap test is reported negative for malignancy, adequate for evaluation. Ultrasound shows multiple large intramural fibroids, filling the pelvis and extending into the lower abdomen. The

mass does extend into the right side of the pelvis. There is mild hydronephrosis on that side. The ovaries are not visualized. Endometrial biopsy reveals proliferative endometrium.

COMPETENCY-BASED DISCUSSION & KEY TEACHING POINTS:

Competencies addressed:

- Patient Care
- Medical Knowledge
- Practice-Based Learning
- Systems-Based Practice

1. What are the likely causes of the mass prior to imaging?

2. What is the prevalence of leiomyoma in different populations of women?

3. Describe the pathological changes of leiomyomata.

4. Discuss the appropriate management of women with fibroids.

5. What are the indications for hysterectomy in women with fibroids?

REFERENCES

Beckman CRB, et al. Obstetrics and Gynecology. 7th ed. Philadelphia: Lippincott, Williams & Wilkins, 2013.

Hacker NF, Moore JG, et al. Essentials of Obstetrics and Gynecology. 5th ed. Philadelphia: Saunders, 2010.

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