

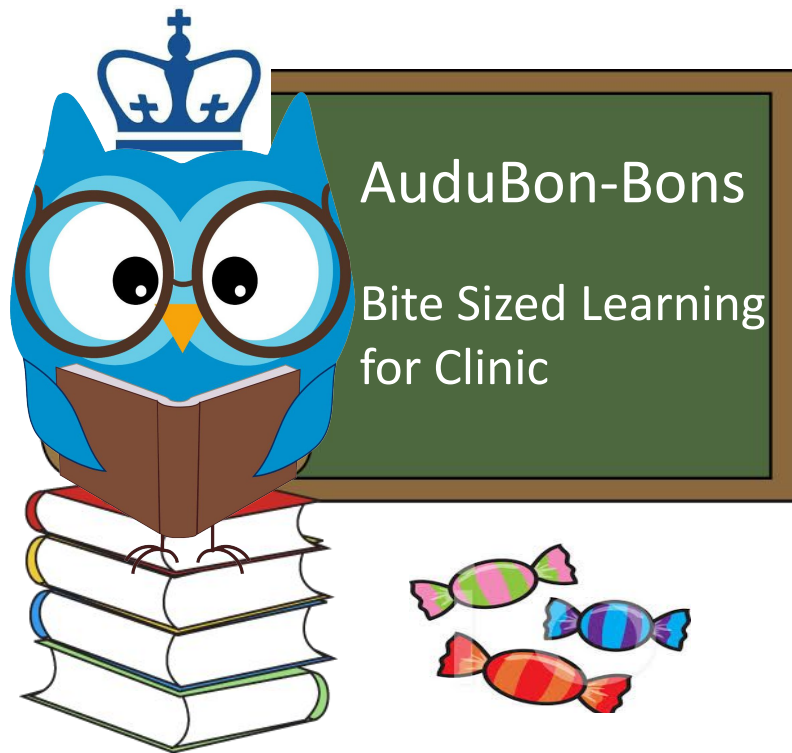
# MANAGEMENT OF MENOPAUSAL SYMPTOMS

Week 9

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Reading Assignment:

ACOG, PB #141, Management of Menopausal Symptoms



# LEARNING OBJECTIVES



- To understand the common symptoms of the menopausal transition
- To review options for treatment of symptoms of menopause
- To be able to counsel patients on risks and benefits of HRT



# CASE VIGNETTE

- Ms. Hot Flash is a 49 yo G3P3 presenting with complaints of severe hot flashes, sleep disturbances and irritability.
- She notes her last menstrual cycle was approximately 14 months ago, with no bleeding since. Denies abnormal discharge, or pelvic pain.



# FOCUSED HISTORY

## What elements of the patient's history are most relevant?

- **PMH:** Seasonal allergies
- **PSH:** Adenoidectomy as a child
- **POBH:** NSVD x 2, CD x 1 for NRFHT
- **PGYNH:** Regular menses prior to menopause. Denies abnormal paps or STIs.  
Denies history of fibroids or cysts.
- **MEDS:** Claritin PRN
- **All:** NKDA
- **FH:** Mother has T2DM
- **SH:** Lives with partner. Adult children nearby. Denies tob, drug, EtOH use. Denies IPV. Works as a middle school English teacher. Accepts blood products.



# PERTINENT PHYSICAL EXAM FINDINGS

**What elements of the patient's physical exam are most relevant?**

- **General:** Well appearing woman, VSS
- **Pulm:** CTAB
- **CV:** RRR
- **Breast:** Examined in 2 positions. No visual or palpable masses, no skin retraction or dimpling, no LAD.
- **Abd:** Soft, non-tender, no masses
- **Pelvic:** Normal external genitalia, **pale mucosa c/w atrophy**, no blood in vault, nl cervix without lesions, no abnl discharge
- **Ext:** WWP



# MENOPAUSE

## Definition

- **Permanent cessation of menstruation that occurs after the loss of ovarian activity. >12 months after last menstrual cycle**
- Median age of 51 in US
- Menopausal transition/ Perimenopause
  - The years preceding cessation of menses
  - Caused by decreasing estradiol and progesterone, and elevations of FSH



# SYMPTOMS OF MENOPAUSE

## **Vasomotor symptoms:**

- 75% of women undergoing menopause
- Hot flush: last 1-5 mins, extreme heat of upper body
- From daily to 10+ times
- Can interrupt sleep
- Median duration of 4 years, but can vary 6 months to 10 years
- Varies by race with Black populations experiencing most, Asian experiencing least

## **Vaginal atrophy:**

- Experienced by 10-40% of menopausal women
- Caused by hypoestrogenic state
  - Loss of superficial epithelial cells --> thinning of epithelium, shortening/ narrowing of vagina
  - Loss of subcutaneous fat of labia majora
  - Increased pH
  - Decreased vaginal secretions
- Can lead to dyspareunia



# HORMONAL THERAPY

What are the options for HRT?

- Systemic estrogen therapy (ET) →
- Systemic estrogen-progesterone therapy (EPT) →
- Topical estrogen →

When do you use each?

- Vasomotor symptoms in patients without a uterus
- Vasomotor symptoms in pts with a uterus
- Vaginal atrophy



Systemic hormone therapy should only be used for vasomotor symptoms!



# HRT FORMULATIONS

**Table 1.** Treatment Options for Menopausal Vasomotor Symptoms ↵

| Treatment  | Dosage/Regimen   | Evidence of Benefit* | FDA Approved |
|--|--|----------------------|--------------|
| <b>Hormonal</b>                                    |  |                      |              |
| Estrogen-alone or combined with progestin          |  |                      |              |
| • Standard Dose                                    | Conjugated estrogen 0.625 mg/d                         | Yes                  | Yes          |
|  | Micronized estradiol-17β 1 mg/d                        | Yes                  | Yes          |
|  | Transdermal estradiol-17β 0.0375–0.05 mg/d             | Yes                  | Yes          |
| • Low Dose   | Conjugated estrogen 0.3–0.45 mg/d                      | Yes                  | Yes          |
|  | Micronized estradiol-17β 0.5 mg/d                      | Yes                  | Yes          |
|  | Transdermal estradiol-17β 0.025 mg/d                   | Yes                  | Yes          |
| • Ultra-Low Dose                                   | Micronized estradiol-17β 0.25 mg/d                     | Mixed                | No           |
|  | Transdermal estradiol-17β 0.014 mg/d                   | Mixed                | No           |
| Estrogen combined with estrogen agonist/antagonist | Conjugated estrogen 0.45 mg/d and bazedoxifene 20 mg/d | Yes                  | Yes          |
| Progestin  | Depot medroxyprogesterone acetate                      | Yes                  | No           |
| Testosterone                                       |  | No                   | No           |
| Tibolone   | 2.5 mg/d   | Yes                  | No           |
| Compounded bioidentical hormones                   |  | No                   | No           |

<https://www.acog.org/clinical/clinical-guidance/practice-bulletin/articles/2014/01/management-of-menopausal-symptoms>



# HRT FORMULATIONS

| Type            | Composition  | Product name                        | Commonly used starting dose             | Commonly used maintenance dose                                  | Typical serum estradiol level (pg/mL) |
|-----------------|--|-------------------------------------|---|---|---------------------------------------|
| Vaginal creams  | 17 $\beta$ -estradiol 0.01% (0.1 mg active ingredient/g) | Estrace vaginal cream <sup>a</sup>  | 0.5-1 g/d for 2 wk                      | 0.5-1 g 1-3 times/wk  | Variable                              |
|                 | Conjugated estrogens (0.625 mg active ingredient/g)      | Premarin vaginal cream              | 0.5-1 g/d for 2 wk                      | 0.5-1 g 1-3 times/wk  | Variable                              |
|                 | Estrone 0.1% (1 mg active ingredient/g)                  | Estragyn vaginal cream <sup>b</sup> |   | 0.5-4 g/d, intended for short-term use; progestogen recommended | Variable                              |
| Vaginal inserts | 17 $\beta$ -estradiol inserts                            | Imvexxy <sup>a</sup>                | 4 or 10 $\mu$ g/d for 2 wk              | 1 insert twice/wk   | 3.6 (4 $\mu$ g)<br>4.6 (10 $\mu$ g)   |
|                 | Estradiol hemihydrate tablets                            | Vagifem Yuvaferm                    | 10 $\mu$ g/d for 2 wk                   | 1 tablet twice/wk   | 5.5                                   |
|                 | Prasterone (DHEA) inserts                                | Intrarosa                           | 6.5 mg/d                                | 1 insert/d  | 5                                     |
| Vaginal ring    | 17 $\beta$ -estradiol                                    | Estring                             | 2 mg ring releases approx 7.5 $\mu$ g/d | Replace ring every 90 days                                      | 8                                     |
| Oral tablet     | Ospemifene   | Osphena <sup>a</sup>                | 60 mg/d                                 | 1 tablet by mouth/d   | N/A                                   |

Products not marked are available in both the United States and Canada.

<sup>a</sup>Available in the United States but not Canada

<sup>b</sup>Available in Canada but not the United States



# RISKS OF HRT

## Risks

- VTE (18 additional cases/10,000 women-years)
- Breast cancer (1 additional case per 1000 women)
- CHD with women starting HRT >10 years after menopause
- Risks minimized with estrogen therapy only\*

## Benefits

- Decreased CRC
- Decreased fracture

In most symptomatic women aged 50-59, benefits outweigh the risks for HRT!



# CONTRAINDICATIONS TO SYSTEMIC HRT

**What are the contraindications to systemic HRT?**

- Breast cancer
- CHD
- Previous VTE or stroke or TIA
- Active liver disease
- Unexplained vaginal bleeding
- Endometrial cancer



# CESSATION OF HRT

**Goal is to use HRT for the shortest amount of time for symptom control**

- Requires frequent re-evaluation

**When should you stop HRT?**

- Individualized
- Can continue beyond age 65

**Do you need to taper therapy?**

- No, no difference seen between taper vs abrupt cessation

**What percentage of women will experience symptom recurrence?**

- 50%



# NON-HORMONAL TREATMENT OPTIONS

## What are non-HRT based treatment options?

| Nonhormonal             |              | Evidence of benefit | FDA Approved |
|-------------------------|--------------|---------------------|--------------|
| SSRIs and SSNRIs        |              | No                  | No           |
| Paroxetine              | 7.5 mg/d     | Yes                 | Yes          |
| Clonidine               | 0.1 mg/d     | Yes                 | No           |
| Gabapentin              | 600–900 mg/d | Yes                 | No           |
| Phytoestrogens          |              | No                  | No           |
| Herbal Remedies         |              | No                  | No           |
| Vitamins                |              | No                  | No           |
| Exercise                |              | No                  | No           |
| Acupuncture             |              | No                  | No           |
| Reflexology             |              | No                  | No           |
| Stellate-ganglion block |              | Yes                 | No           |

Abbreviations: FDA, U.S. Food and Drug Administration; SSRIs, selective serotonin reuptake inhibitors; SSNRIs, selective serotonin norepinephrine reuptake inhibitors.

\*Compared with placebo.

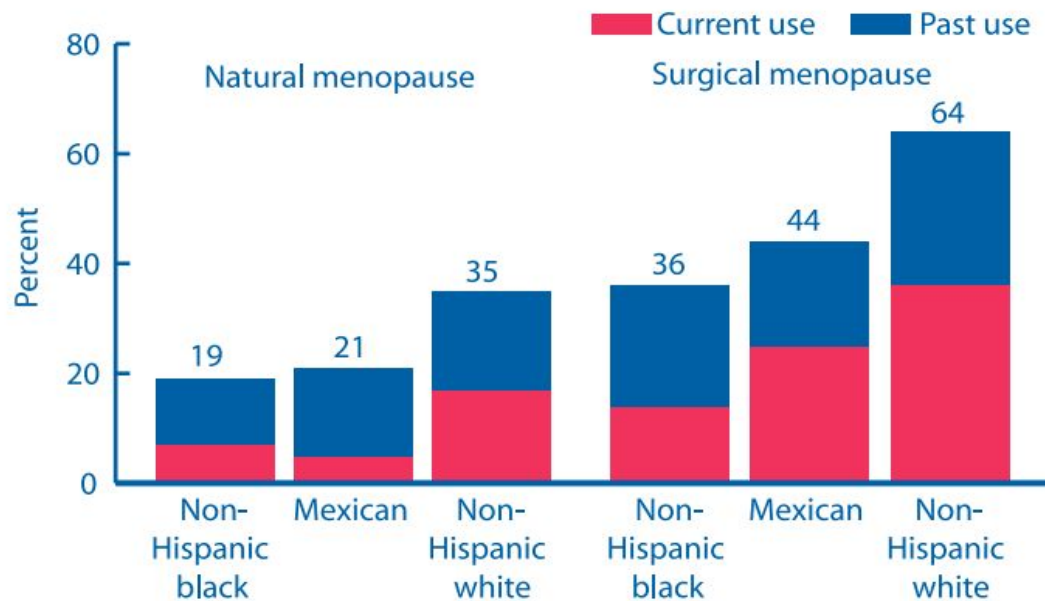
<https://www.acog.org/clinical/clinical-guidance/practice-bulletin/articles/2014/01/management-of-menopausal-symptoms>



# SOCIAL DETERMINANTS OF HEALTH

White patients are more likely than other races to be prescribed or take HRT

**Figure 5. Age-adjusted Hormone Replacement Therapy use by race/ethnicity**



SOURCE: CDC/NCHS: NHANES III.

In order to provide best care, we must screen all patients routinely for menopausal symptoms and make recommendations for treatment!



# EPIC .PHRASE

## **.BBonMenopause**

Description: Counseling on management options for menopausal symptoms

The changes and associated symptoms of the perimenopausal state were discussed with the patient including vasomotor symptoms and vaginal atrophy. It was explained that vasomotor symptoms typically peak around 1 year after LMP, but can extend for variable length of time with median length of 6 years. The goals of treatment were outlined including relief of vasomotor and vaginal symptoms.

Risks and benefits of HRT were discussed including protective benefit against fracture and colon cancer, but slightly increased risk of breast cancer, CVD, and VTE. The patient \*\*\*has/does not have a uterus, \*\*\*requiring/not requiring endometrial protection with progestin therapy in the setting of systemic HRT.

We discussed treatment options and will begin with \*\*\* (lifestyle modifications, systemic ET, systemic EPT, topical ET, nonhormonal therapies including paroxetine and gabapentin).

Recommendations were made to continue HRT for the shortest amount of time which is effective for symptom resolution.





# CODING AND BILLING

- **ICD-10 Code**

- N90.5

- Atrophy of vulva

- N95.1

- Menopausal and female climacteric state

- N95.2

- Postmenopausal atrophic vaginitis

- N95.9

- Unspecified menopausal and perimenopausal disorder



# EVIDENCE

- ACOG Practice Bulletin No. 141: management of menopausal symptoms. *Obstetrics & Gynecology*. 2014 Jan;123(1):202-216.
- Marko KI, Gaba NE, Klatt TE. Medical Management of Menopausal Symptoms. SASGOG. Pearls of Excellence. 2020. Accessed on Feb 2, 2020. <https://www.excellence.org/media/103281/medical-management-of-menopausal-symptoms-posted-2020-11.pdf>
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- Brown AF, et al. Ethnic differences in hormone replacement prescribing patterns. *J Gen Intern Med*. 1999 Nov; 14(11): 663-669.
- National Health and Nutrition Examination Survey. Use of hormone replacement therapy among postmenopausal women in the United States 1988-1994. CDC. 2003. Accessed on Feb 2, 2020, <https://www.cdc.gov/nchs/data/nhanes/databriefs/hrtinwomen.pdf>

