Objectives

• Enhance knowledge of office based Ob/Gyn practice through a simulated patient case
• Practice skills you will use early on during office based encounters
• Discuss self-directed learning and critical appraisal of medical literature
• Understand the importance of communication with patients, family and other members of the healthcare team

Milestones in Office Practice

• Demonstrates basic knowledge about what constitutes normal and abnormal uterine bleeding
• Verbalizes the phases of the normal menstrual cycle
• Verbalizes basic knowledge about common contraceptive options
• Demonstrates basic knowledge about common ambulatory gynecologic problems
Milestones in Office Practice

- Demonstrates an understanding of common non-reproductive medical disorders
- Demonstrates knowledge of the characteristics of a good screening test
- Demonstrates knowledge of indications and limitations of commonly used screening tests
- Demonstrates an understanding of critical appraisal of the literature

Milestones in Office Practice

- Demonstrates adequate listening skills
- Communicates effectively in routine clinical situations
- Understands the importance of relationship development, information gathering and sharing
- Understands the importance of informed consent

Office Practice Case Simulation

A 46 year old G4P3013 presents to your office with a complaint of heavy vaginal bleeding for the past 3 weeks.
What are key elements in the history?

• Full gyn history including STIs and pap history
• Details about menstrual history and current bleeding pattern/ associated pain
• PMH/ PSH
• Current medications
• Current contraception or fertility desires
• Targeted family history
• Smoking history
• Review of Systems

Office Practice Case Simulation

• Gyn history
  – Menarche age 11/ menses monthly/7-10 days
  – No STIs, in monogamous relationship for 15 years
  – Last pap 5 years ago and was normal
  – Mammogram 6 months ago - normal
• Bleeding history
  – Heavy x 6 months
  – Increased dysmenorrhea
• PMH
  – none
• PSH
  – D&C at age 30 for a missed abortion
Office Practice Case Simulation

- Medications
  - Multivitamin
- Contraception
  - Condoms but would like to discuss other options
- Family history
  - Colon cancer: m. grandmother
  - HTN: father
- Social history
  - No tobacco use, 1 drink / week ETOH, no drug use
- ROS
  - 10 lb weight gain in 1 yr
  - Increased fatigue for 2 mo

Review of menstrual cycle
Hormonal effects on endometrium

• Estrogen is the fertilizer
  – Allows endometrial proliferation

• Progesterone is the lawn mower
  – Keeps lining thin

What are key elements in the physical?

• Vital signs
• Thyroid exam
• Abdominal exam
• Pelvic exam
  – Pap smear
  – Endometrial biopsy
  – Consider gonorrhea/ chlamydia testing
Office Practice Case Simulation

- Hands on Exercise:
  Perform a pelvic exam (external exam, speculum exam, bimanual exam and collection of pap)
  Faculty will review key point and Pearls related to the pelvic exam

Review of cervical cancer screening

- Begin screening at age 21
- Screen every 3 years ages 21-29
- Screen every 5 years for ages 30 and over if pap and HPV testing combined, if pap alone then every 3 years
- Women with history of CIN 2 or 3 should receive screening for at least 20 years
- May stop screening at age 65 if last 3 paps normal and no abnormal paps in past 10 years
- May stop screening if hysterectomy has been done for benign indications and no prior history of high grade cervical dysplasia

Human Papilloma Virus

- DNA viruses
  - Low oncogenic
  - High oncogenic (16 and 18 responsible for 70% cervical cancer in US)
- Most Transient
  - 50% cleared 8 mo
  - 90% cleared 2 yr
- Infects immature basal cells at squamocolumnar junction
Abnormal Cervical Cytology (Age 25 and over)

- Atypical Squamous Cells of Undetermined Significance (ASC-US)
  - HPV neg
  - HPV pos
  - Repeat pap 3 yr
  - COLPOSCOPY

- Low Grade Squamous Intraepithelial Lesion (LSIL)
  - COLPOSCOPY

- High Grade Squamous Intraepithelial Lesion (HSIL)
  - COLPOSCOPY

Abnormal Cervical Cytology (Age 21-24)

- Atypical Squamous Cells of Undetermined Significance (ASC-US)
  - HPV neg
  - HPV pos or unknown (preferred)
  - Repeat pap 3 yr
  - Repeat pap 1 yr

- Low Grade Squamous Intraepithelial Lesion (LSIL)
  - repeat pap 1 yr

- High Grade Squamous Intraepithelial Lesion (HSIL)
  - COLPOSCOPY

Principles of a Screening Test

- Identifies a clinically significant disease that has a preclinical state
  - Results in significant morbidity or mortality if left untreated
  - A treatment must exist
- Test is reasonably priced
- Test is non invasive
Principles of a Screening Test

• Test is sensitive
  – Correctly identifies patients with the disease
• Test is specific
  – Correctly identifies patients without the disease

Review of the endometrial biopsy

Abnormal Uterine Bleeding (AUB)

Indication for endometrial biopsy

>45 yo

<45 yo

* unopposed estrogen
  (obesity/ PCOS)
* failed medical mgmt
* persistent AUB

Diagnosis of AUB in Reproductive-Aged Women, ACOG Practice Bulletin 128

Office Practice Case Simulation

• Your faculty facilitator will review key point and Pearls related to performing an endometrial biopsy

• Perform endometrial biopsy simulation
Office Practice Case Simulation

• Vitals
  – Temp 37.4, BP 122/74, BMI 28 kg/m², pulse 72
  – Urine pregnancy test is negative

• Neck
  – No thyromegaly

• Abdomen
  – Soft, non-tender, non-distended, no hernias or masses, normal bowel sounds

Office Practice Case Simulation

• Pelvic
  – Normal external genitalia
  – Urethral meatus appears normal
  – Vaginal mucosa without lesion, moderate blood in vault
  – Cervix without gross lesions
  – Uterus normal size, shape and contour, no masses
  – No adnexal masses or tenderness

What is your Differential Diagnosis?
What is your Differential Diagnosis?

* Always r/o pregnancy

Abnormal Uterine Bleeding (AUB)
Heavy menstrual bleeding (AUB/HMB)
Intermenstrual bleeding (AUB/IMB)

PALM: Structural Causes
- Polyp (AUB-P)
- Adenomyosis (AUB-A)
- Leiomyoma (AUB-L)
- Submucosal myoma (AUB-LSM)
- Other myoma (AUB-L)
- Malignancy & hyperplasia (AUB-M)

COEIN: Non-structural Causes
- Coagulopathy (AUB-C)
- Ovulatory dysfunction (AUB-O)
- Endometrial (AUB-E)
- Iatrogenic (AUB-I)
- Not yet classified (AUB-N)

What additional work-up do you want?

- TSH
- CBC
- Pelvic ultrasound

You schedule a follow up appointment to discuss all results and further management in 2 weeks.
Follow-up Visit

• Your patient reports that her bleeding finally stopped about 5 days ago. She has no new complaints.

• Labs
  – TSH: 3.5 mIU/ml (normal: 0.4-5mIU/ml)
  – Hemoglobin: 10 g/dL
  – Endometrial biopsy: benign secretory endometrium
  – Pap: ASCUS, HPV neg
  – Gonorrhea: neg  Chlamydia: neg

Ultrasound

The uterus is antverted and measures 8 x 6 x 5 cm. The endometrial stripe measures 8 mm. The ovaries appear normal.

Management

• Given the evaluation results, what management options would you discuss with this patient who has AUB and also desires contraception?
Management

- Mirena IUD
- Combination OCP
- Oral progesterone (continuous vs cyclic)
- DMPA
- BTL and endometrial ablation

Communication/ Relationship Development

- Introduce yourself
- Sit down
- Make eye contact
- Allow the patient to talk
- Summarize what you are hearing from them
- Summarize your plan
- Ask them if they understand the management care plan

Review of Contraception

- Mechanism of Action
  - Progestin
    - Negative feedback on LH
    - Increase cervical mucus
    - Prevents capacitation of sperm
  - Estrogen
    - Suppresses release of FSH
    - Accelerates ovum transport
Review of Contraception

- Review as a group the benefits, disadvantages and contraindications for each of the following:
  - Combination OCP
  - Progesterone only OCP
  - Ortho-Evra patch
  - Nuvaring
  - DMPA
  - Nexplanon
  - Mirena/ Skyla IUD
  - Paragard IUD

Office Practice Case Simulation

- Your patient elects for a Mirena IUD:

Discuss how you would consent your patient for this procedure

Review of Informed Consent

- **Elements of informed consent**
  - The nature of the decision/procedure
  - Reasonable alternatives to the proposed intervention
  - The relevant risks, benefits, and uncertainties related to each alternative
  - Assessment of patient understanding
  - The acceptance of the intervention by the patient

- **Reasonable patient standard**
  - What would the average patient need to know in order to be an informed participant in the decision?
Office Practice Case Simulation

- Your faculty facilitator will review key points and Pearls related to Mirena IUD insertion
- Perform IUD insertion simulation

Self-Directed Learning
Critical Appraisal of Literature

- As a good resident, you like to read each night about something you saw that day. You are wondering if a Mirena IUD is really that effective at controlling AUB.

Critical Appraisal of the Literature

- Reporting
  - Purpose and hypothesis clearly stated?
  - Is the study relevant?
- Study design
  - Prospective vs. retrospective?
  - Randomized?
  - Appropriate controls?
  - Reproducible?
  - Applicable to your patient population?
Critical Appraisal of the Literature

• Execution of study
  – Adequate sample size?
  – Confounding variables?
  – Attrition rate/ appropriate f/u time?
  – Appropriate statistics?

• Assessment of conclusion
  – Do findings support conclusions?
  – Clinical vs. statistical significance?

• Application
  – Is this helpful to your practice?
  – Ideas for future research?

Thank you for your participation!

Please remember to fill out your post-course evaluation prior to leaving.