

## DATING OF PREGNANCY

### LAST MENSTRUAL PERIOD (LMP):

- Ask the patient the date of the first day of her LMP
- Ask if her menstrual cycles are “regular”.
- Regular menstrual periods
  - the bleeding of usual duration and flow (e.g., 3 days of moderate flow),
  - preceded by two other regular menses.
  - Recent contraception may effect menstrual cycles so they are not regular
  - If periods are not regular, order a dating OBUS to determine EDC
- To calculate the EDC from the LMP, subtract 3 months, add 1 year and 7 days.

### CLINICAL EXAM: Estimate uterine size using bimanual exam or fundal height.

- Nongravid = 8 cm (plum)
- 4-6 weeks = 10 cm (orange)
- 8-10 wks = 12 cm (grapefruit)
- 12 weeks = at the top of the pubic symphysis
- 16 weeks = half way to umbilicus
- 20 weeks = at the umbilicus (20 cm above symphysis)
- 20-36 wks\* = height in cms above pubic symphysis = date in weeks

\* If greater than 3 cm discrepancy between dates and fundal height, order OBUS ultrasound to assess fetal growth and amniotic fluid volume

### ULTRASOUND:

- First trimester ultrasound accurate +/- 5 days
- 13-20 weeks +/- 7 days
- 20+ weeks, less accurate
- Compare the SURE LMP EDC to US EDC. Use LMP dates to determine the EDC if...
  - The < 12 wks ultrasound and there is < 5 days difference
  - The 13-20 wks ultrasound and there is < 7 days difference
  - The US > 20 wks and there is < 21 days difference
- Otherwise, use the US dates for the EDC
- Enter “dating information” in EPIC. Do not change the EDC determined before 20 wks.

DOPTONE: 5% of FHTs are heard by doptone at 8 weeks and 95% are heard by 12 wks.

FETOSCOPE: Heart tones should be heard by fetoscope at 20 weeks.

QUICKENING: The sensation of movement that is felt on 3 consecutive days. For a multip, this usually happens between 16-18 wks; for a primip, between 18-20 wks.

### HCG (Human Chorionic Gonadatropin):

- If a woman has a normal 28-day cycle, she ovulates on day 14. If she gets pregnant on day 14, then ...
- There is a 5% chance her urine tests will be positive 5 days later (day 19)
- There is a 95% chance her urine test will be positive 2 weeks after ovulation (day 28)
- Clinic urine tests are positive at 25 mIU level; over-the-counter kits are positive at 50 mIU; serum levels are positive at 5 mIU
- BetaHCG doubles every 48 hours - less than doubling suggests ectopic pregnancy, or failing pregnancy
- If the B-HCG is between 1,000 and 1,500 mIU, an intrauterine gestational sac should be visible on US. Between 1,500 and 2,000, cardiac activity should be visible on US.
- B-HCG maxes out at 80,000 to 100,000 about 8-10 weeks of pregnancy
- B-HCG > 100,000 suggests the possibility of a molar pregnancy and should be followed closely
  
- B-HCG may be detectable several weeks after a miscarriage or abortion (i.e. a urine pregnancy test can be positive up to approximately 4 weeks and should not be used to "follow up" a miscarriage)

### Serum progesterone Level:

- > 25 ng/ml suggests a viable pregnancy
- < 5 ng/ml suggests pregnancy is not viable