

Male and Female Reproductive System
Chapter 27 & 28
Hot List Questions (2019-11-24)

Reproductive Physiology

1. What determines the sex of the individual? What is the 23rd pair called?
2. What type of cells are produced by meiosis? Called what by male and female?
3. What is the first diploid cell called?
4. When is a pregnancy most likely to occur?

Male Reproductive System:

1. What hormone initiates puberty?
2. What is the danger to spermatogenesis if the temperature reaches or exceeds 37 degrees C? How does this explain the location of the testes?
3. What is the significance of the blood-testis barrier?
4. How much semen is ejaculated? What gland contributes the greatest volume to the semen? Percentage?
5. How is male defined in the sex chromosomes?
6. What must happen before sperm become mobile in the female reproductive system?
7. What cells provide nutrients to spermatids via gap junctions?
8. Where are sperm stored prior to ejaculation? Maximum time? Then what?
9. What is spermatogenesis? Where does it occur?
10. What hormones are needed for spermatogenesis? Where do these hormones come from?
11. What is the significance of androgen binding protein in spermatogenesis? What hormone is responsible for ABP?
7. What cells produce inhibin? Role in male physiology?
8. What cells in the testes produce testosterone? What hormone has its receptor on this cell?
9. Can we have testosterone production without spermatogenesis? How?
10. What cells in the testes provide nutrients and protection to the developing sperm?
11. What stage of the male sexual response moves sperm into the urethra?
12. What is the function of sperminogelin? Significance?
13. How many days may sperm be stored in the epididymis?

Female Reproductive System:

1. On what day of the ovarian cycle is the ovum released?
2. What hormone spikes just prior to ovulation?
3. What organ provides both nutrition for the fetus and secretes hormones to maintain the pregnancy?
4. What is the difference between the reproductive cycle and sexual cycle? What are the two divisions of the sexual cycle called?

5. What is the hierarchy of hormonal control in the female reproductive system?
6. What hormone is produced by the follicular cells?
7. What is the difference between the corpus luteum and the corpus albicans?
8. What hormones are produced by the corpus luteum? Functions?
9. What are the layers of the uterus called?
10. What are the two stratum of the endometrium? Significance?
11. How does the endometrium change throughout the sexual cycle? Why?
12. What role does the spiral arteries play in the menstrual cycle? What is lost when spiral arteries contract?
13. What hormone is associated with the proliferation of the endometrium?
14. What hormone is associated with the secretory phase of the endometrium?
15. What hormone is produced by the "blastocyste"? Significance? First detected when? What home test detects this hormone?
16. What hormone produces the ducts of the mammary gland?
17. What hormone produces the acini (milk producing cells) of the mammary gland?
18. When does oogenesis begin?
19. Why is the female reproductive system considered more complicated?
20. Where is the corpus luteum located? When is it created? Significance?
21. What hormone produced by corpus luteum stops the release of FSH?
22. What hormone produced by the blastocyste keeps the secretion of progesterone by the corpus luteum?
23. What chromosome pair determines if embryo is female or male?
24. What is the name of the cycle which repeats itself if there is not a pregnancy?
25. What hormone is responsible for the growth phase of the menstrual cycle?
26. What hormone is responsible for the secretory phase of the menstrual cycle?
27. How are the sexual cycle and uterine cycle related?
28. On what day does ovulation occur?
29. Where is the zygote formed?
30. How long does it take for the zygote to reach the lumen of the uterus?
31. What hormone spike is associated with ovulation?
32. What is the function of the placenta?
33. What is the difference between the proliferation phase and secretory phase of the endometrium?