

Chapter 3: Genetics, Conception, Fetal Development, and Reproductive Technology

Multiple Choice

1. The color of a person's hair is an example of which of the following?
 a. Genome
 b. Sex-link inheritance
 c. Genotyped
 d. Phenotype

ANS: d

	Feedback
a.	Genome is an organism's complete set of DNA.
b.	Sex-link inheritance refers to genes or traits that are located only on the X chromosome.
c.	Genotype refers to a person's genetic makeup.
d.	Correct. Phenotype refers to how genes are outwardly expressed, such as eye color, hair color, and height.

KEY: Integrated Process: Teaching and Learning | Cognitive Level: Analysis | Content Area: Maternity | Client Need: Health Promotion and Maintenance | Difficulty Level: Easy

2. Which of the following statements by a pregnant woman indicates she needs additional teaching on ways to reduce risks to her unborn child from the potential effects of exposure to toxoplasmosis?
 a. "I will avoid rare lamb."
 b. "I will wear a mask when cleaning my cat's litter box."
 c. "I understand that exposure to toxoplasmosis can cause blindness in the baby."
 d. "I will avoid rare beef."

ANS: b

	Feedback
a.	Exposure occurs when the protozoan parasite found in cat feces and uncooked or rare beef and lamb is ingested.
b.	Correct. Pregnant women and women who are attempting pregnancy should avoid contact with cat feces. Exposure occurs when the protozoan parasite found in cat feces and uncooked or rare beef and lamb is ingested. Wearing a mask will not decrease the risk through ingestion of the parasite.
c.	Exposure to toxoplasmosis can cause fetal death, mental retardation, and blindness.

d.	Exposure occurs when the protozoan parasite found in cat feces and uncooked or rare beef and lamb is ingested.
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KEY: Integrated Process: Teaching and Learning | Cognitive Level: Application | Content Area: Maternity | Client Need: Health Promotion and Maintenance | Difficulty Level: Moderate

3. The fetal circulatory structure that connects the pulmonary artery with the descending aorta is known as which of the following?
 a. Ductus venosus
 b. Foramen ovale
 c. Ductus arteriosus
 d. Internal iliac artery

ANS: c

	Feedback
a.	The ductus venosus connects the umbilical vein to the inferior vena cava.
b.	The foramen ovale is the opening between the right and left atria.
c.	Correct.
d.	The internal iliac artery connects the external iliac artery to the umbilical artery.

KEY: Integrated Process: Teaching and Learning | Cognitive Level: Knowledge | Content Area: Maternity | Client Need: Physiological Adaptation | Difficulty Level: Easy

4. A woman at 40 weeks' gestation has a diagnosis of oligohydramnios. Which of the following statements related to oligohydramnios is correct?
 a. It indicates that there is a 25% increase in amniotic fluid.
 b. It indicates that there is a 25% reduction of amniotic fluid.
 c. It indicates that there is a 50% increase in amniotic fluid.
 d. It indicates that there is a 50% reduction of amniotic fluid.

ANS: d

	Feedback
a.	Oligohydramnios is a decrease, not an increase in amniotic fluid.
b.	Oligohydramnios is a 50% reduction in amniotic fluid.
c.	Oligohydramnios is a decrease, not an increase in amniotic fluid.
d.	Correct. Oligohydramnios refers to a decreased amount of amniotic fluid of less than 500 mL at term or 50% reduction of normal amounts.

KEY: Integrated Process: Clinical Problem Solving | Cognitive Level: Application | Content Area: Maternity | Client Need: Reduction of Risk Potential | Difficulty Level: Moderate

5. A diagnostic test commonly used to assess problems of the fallopian tubes is: a. Endometrial biopsy b. Ovarian reserve testing c. Hysterosalpingogram d. Screening for sexually transmitted infections

ANS: c

	Feedback
a.	Endometrial biopsy provides information on the response of the uterus to hormonal signals.
b.	Ovarian reserve testing is used to assess ovulatory functioning.
c.	Correct. Hysterosalpingogram provides information on the endocervical canal, uterine cavity, and fallopian tubes.
d.	STIs can cause adhesions within the fallopian tubes, but screening cannot confirm that adhesions are present.

KEY: Integrated Process: Teaching and Learning | Cognitive Level: Knowledge | Content Area: Maternity | Client Need: Safe and Effective Care Environment | Difficulty Level: Moderate

6. The nurse is interviewing a gravid woman during the first prenatal visit. The woman confides to the nurse that she lives with a number of pets. The nurse should advise the woman to be especially careful to refrain from coming in contact with the stool of which of the pets?

- a. Cat
- b. Dog
- c. Hamster
- d. Bird

ANS: a

	Feedback
a.	The patient should refrain from coming in direct contact with cat feces. Cats often harbor toxoplasmosis, a teratogenic illness.
b.	No pathology has been associated with the feces of pet dogs.
c.	No pathology has been associated with the feces of pet hamsters.
d.	No pathology has been associated with the feces of pet birds.

KEY: Integrated Process: Nursing Process: Implementation; Teaching and Learning | Cognitive Level: Application | Content Area: Antepartum Care; Disease Prevention | Client Need: Health Promotion and Maintenance | Difficulty Level: Easy

7. A client is to take Clomiphene Citrate for infertility. Which of the following is the expected action of this medication?

- a. Decrease the symptoms of endometriosis
- b. Increase serum progesterone levels
- c. Stimulate release of FSH and LH
- d. Reduce the acidity of vaginal secretions

ANS: c

	Feedback
a.	Clomiphene Citrate will not reduce a client's symptoms of endometriosis.
b.	Clomiphene Citrate will not increase a client's progesterone levels.
c.	Clomiphene Citrate stimulates release of FSH and LH.
d.	Clomiphene Citrate will not reduce the acidity of vaginal secretions.

KEY: Integrated Process: Nursing Process: Evaluation | Cognitive Level: Comprehension | Content Area: Pharmacological and Parenteral Therapies: Expected Effects/Outcomes | Client Need: Physiological Integrity: Pharmacological and Parenteral Therapies | Difficulty Level: Moderate

8. The nurse takes the history of a client, G2 P1, at her first prenatal visit. The client is referred to a genetic counselor, due to her previous child having a diagnosis of _____.

- a. Unilateral amblyopia
- b. Subdural hematoma
- c. Sickle cell anemia
- d. Glomerular nephritis

ANS: c

	Feedback
a.	Amblyopia rarely results from a genetic predisposition.
b.	A subdural hematoma does not result from a genetic defect.
c.	Sickle cell anemia is an autosomal recessive illness. This client needs to be seen by a genetic counselor.
d.	Glomerular nephritis does not result from a genetic defect.

KEY: Integrated Process: Communication and Documentation; Nursing Process: Assessment |

Cognitive Level: Application | Content Area: Antepartum Care; Collaboration with Interdisciplinary Team; Health History; Referrals | Client Need: Health Promotion and Maintenance; Safe and Effective Care Environment: Referrals | Difficulty Level: Moderate

9. A nurse is teaching a woman about her menstrual cycle. The nurse states that _____ is the most important change that happens during the secretory phase of the menstrual cycle.

- a. Maturation of the graafian follicle
- b. Multiplication of the fimbriae
- c. Secretion of human chorionic gonadotropin
- d. Proliferation of the endometrium

ANS: d

	Feedback
a.	The maturation of the graafian follicle occurs during the follicular phase.
b.	There is no such thing as the multiplication of the fimbriae.
c.	Human chorionic gonadotropin is secreted by the fertilized ovum during the early weeks of a pregnancy.
d.	The proliferation of the endometrium occurs during the secretory phase of the menstrual cycle.

KEY: Integrated Processes: Nursing Process: Implementation; Teaching and Learning | Cognitive Level: Knowledge | Content Area: Health and Wellness | Client Need: Health Promotion and Maintenance | Difficulty Level: Difficult

10. An ultrasound of a fetus' heart shows that "normal fetal circulation is occurring." Which of the following statements is consistent with the finding?

- a. A right to left shunt is seen between the atria.
- b. Blood is returning to the placenta via the umbilical vein.
- c. Blood is returning to the right atrium from the pulmonary system.
- d. A right to left shunt is seen between the umbilical arteries.

ANS: a

	Feedback
a.	This is correct. The foramen ovale is a duct between the atria. In fetal circulation, there is a right to left shunt through the duct.
b.	Blood returns to the placenta via the umbilical arteries.

c.	Most of the blood bypasses the pulmonary system. The blood that does enter the pulmonary system returns to the left atrium.
d.	There is no duct between the umbilical arteries.

KEY: Integrated Process: Nursing Process: Analysis | Cognitive Level: Comprehension | Content Area: Antepartum Care | Client Need: Health Promotion and Maintenance | Difficulty Level: Difficult

11. The clinic nurse knows that the part of the endometrial cycle occurring from ovulation to just prior to menses is known as the:

- a. Menstrual phase
- b. Proliferative phase
- c. Secretory phase
- d. Ischemic phase

ANS: c

	Feedback
a.	The menstrual phase is the time of vaginal bleeding, approximately days 1 to 6.
b.	The proliferative phase ends the menses through ovulation, approximately days 7 to 14.
c.	The secretory phases occurs from the time of ovulation to the period just prior to menses, or approximately days 15 to 26.
d.	The ischemic phase occurs from the end of the secretory phase to the onset of menstruation, approximately days 27 to 28.

KEY: Integrated Process: Nursing Process: Clinical Problem Solving | Cognitive Level: Knowledge | Content Area: Maternity | Client Need: Health Promotion and Maintenance | Difficulty Level: Easy

12. A clinic nurse explains to the pregnant woman that the amount of amniotic fluid present at 24 weeks' gestation is approximately:

- a. 500 mL
- b. 750 mL
- c. 800 mL
- d. 1000 mL

ANS: c

Amniotic fluid first appears at about 3 weeks. There are approximately 30 mL of amniotic fluid

present at 10 weeks' gestation, and this amount increases to approximately 800 mL at 24 weeks' gestation. After that time, the total fluid volume remains fairly stable until it begins to decrease slightly as the pregnancy reaches term.

KEY: Integrated Process: Teaching and Learning | Cognitive Level: Knowledge | Content Area: Maternity | Client Need: Safe and Effective Care Environment | Difficulty Level: Easy

13. Information provided by the nurse that addresses the function of the amniotic fluid is that the amniotic fluid helps the fetus to maintain a normal body temperature and also:

- a. Facilitates asymmetrical growth of the fetal limbs
- b. Cushions the fetus from mechanical injury
- c. Promotes development of muscle tone
- d. Promotes adherence of fetal lung tissue

ANS: b

	Feedback
a.	Amniotic fluid allows for symmetrical fetal growth.
b.	Amniotic fluid cushions the fetus from mechanical injury.
c.	Amniotic fluid does not promote muscle tone.
d.	Amniotic fluid prevents adherence of the amnion to the fetus.

KEY: Integrated Process: Teaching and Learning | Cognitive Level: Comprehension | Content Area: Maternity | Client Need: Safe and Effective Care Environment | Difficulty Level: Moderate

14. During preconception counseling, the clinic nurse explains that the time period when the fetus is most vulnerable to the effects of teratogens occurs from:

- a. 2 to 8 weeks
- b. 4 to 12 weeks
- c. 5 to 10 weeks
- d. 6 to 15 weeks

ANS: a

The period of organogenesis lasts from approximately the second until the eighth week of gestation during which time the embryo undergoes rapid growth and differentiation. During organogenesis, the embryo is extremely vulnerable to teratogens such as medications, alcohol, tobacco, caffeine, illegal drugs, radiation, heavy metals, and maternal (TORCH) infections. Structural fetal defects are most likely to occur during this period because exposure to teratogens either before or during a critical period of development of an organ can cause a malformation.

KEY: Integrated Process: Teaching and Learning | Cognitive Level: Knowledge | Content Area: Maternity | Client Need: Physiological Integrity | Difficulty Level: Easy

15. A major fetal development characteristic at 16 weeks' gestation is:

- a. The average fetal weight is 450 grams
- b. Lanugo covers entire body
- c. Brown fat begins to develop
- d. Teeth begin to form

ANS: d

	Feedback
a.	The average fetal weight at 16 weeks is 200 grams.
b.	Lanugo is present on the head.
c.	Brown fat begins to develop at 20 weeks.
d.	This is the correct answer.

KEY: Integrated Process: Teaching and Learning | Cognitive Level: Knowledge | Content Area: Maternity | Client Need: Physiological Integrity | Difficulty Level: Moderate

16. Karen, a 26-year-old woman, has come for preconception counseling and asks about caring for her cat as she has heard that she “should not touch the cat during pregnancy.” The clinic nurse’s best response is:

- a. It is best if someone other than you changes the cat’s litter pan during pregnancy so that you have no risk of toxoplasmosis during pregnancy.
- b. It is important to have someone else change the litter pan during pregnancy and also avoid consuming raw vegetables.
- c. Have you had any “flu-like” symptoms since you got your cat? If so, you may have already had toxoplasmosis and there is nothing to worry about.
- d. Toxoplasmosis is a concern during pregnancy, so it is important to have someone else change the cat’s litter pan and also to avoid consuming uncooked meat.

ANS: d

	Feedback
a.	The nurse should also explain that the patient should not eat uncooked meat as it is a potential source for toxoplasmosis.
b.	Raw vegetables are not a source for toxoplasmosis.
c.	This is not an accurate way to diagnose if the woman has had toxoplasmosis.
d.	Women need to be aware that <i>Toxoplasma</i>

	<p><i>gondii</i>, a single-celled parasite, is responsible for the infection toxoplasmosis. The majority of individuals who become infected with toxoplasmosis are asymptomatic, although when present, symptoms are described as “flu like” and include glandular pain and enlargement and myalgia. Severe toxoplasmosis infection may cause damage to the fetal brain, eyes, or other organs. Toxoplasmosis is usually acquired by consuming raw or poorly cooked meat that has been contaminated with <i>T. gondii</i>. Toxoplasmosis may also be acquired through close contact with feces from an infected animal (usually cats) or soil that has been contaminated with <i>T. gondii</i>.</p>
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KEY: Integrated Processes: Caring | Cognitive Level: Application | Content Area: Maternity | Client Need: Safe and Effective Care Environment | Difficulty Level: Moderate

17. A couple who has sought infertility counseling has been told that the man’s sperm count is very low. The nurse advises the couple that spermatogenesis is impaired when which of the following occur?

- a. The testes are overheated.
- b. The vas deferens is ligated.
- c. The prostate gland is enlarged.
- d. The flagella are segmented.

ANS: a

	Feedback
a.	Spermatogenesis occurs in the testes. High temperatures harm the development of the sperm.
b.	When the vas deferens is ligated, a man has had a vasectomy and is sterile. The sterility is not due to impaired spermatogenesis, but rather to the inability of the sperm to migrate to the woman’s reproductive track.
c.	The enlarged prostate has no effect on spermatogenesis.
d.	The flagella are the “tails” of the sperm. They are normally divided into the middle segment and an end segment.

KEY: Integrated Process: Teaching and Learning | Cognitive Level: Knowledge | Content Area: Maternity | Client Need: Health Promotion and Maintenance | Difficulty Level: Easy

18. A nurse working with an infertile couple has made the following nursing diagnosis: Sexual dysfunction related to decreased libido. Which of the following assessments is the likely reason for this diagnosis?

- a. The couple has established a set schedule for their sexual encounters.
- b. The couple has been married for more than 8 years.
- c. The couple lives with one set of parents.
- d. The couple has close friends who gave birth within the last year.

ANS: a

	Feedback
a.	Couples who “schedule” intercourse often complain that their sexual relationship is unsatisfying.
b.	Years of marriage are not directly related to a couple’s sexual relationship.
c.	The fact that the couple lives with one set of parents is unlikely related to their sexual relationship.
d.	Although it can be very difficult to be around couples who have become pregnant or have healthy babies, this factor is not usually related to a couple’s sexual relationship.

KEY: Integrated Process: Critical Thinking | Cognitive Level: Knowledge | Content Area: Maternity | Client Need: Health Promotion and Maintenance | Difficulty Level: Moderate

True/False

19. The perinatal nurse explains to the student nurse that in the fetal circulation, the lowest level of oxygen concentration is found in the umbilical arteries.

ANS: True

The highest oxygen concentration ($PO_2 = 30\text{--}35$ mm Hg) is found in the blood returning from the placenta via the umbilical vein; the lowest oxygen concentration occurs in blood shunted to the placenta where reoxygenation takes place. The blood with the highest oxygen content is delivered to the fetal heart, head, neck, and upper limbs, and the blood with the lowest oxygen content is shunted toward the placenta.

KEY: Integrated Process: Teaching and Learning | Cognitive Level: Knowledge | Content Area: Maternity | Client Need: Health Promotion and Maintenance | Difficulty Level: Easy

Fill-in-the-Blank

20. After birth, the perinatal nurse explains to the new mother that _____ is the hormone responsible for stimulating milk production.

ANS: prolactin

Following birth and delivery of the placenta, there is an abrupt decrease in estrogen. This event triggers an increased secretion of prolactin (the hormone that stimulates milk production) by the anterior pituitary gland. The posterior pituitary and hypothalamus play a role in the production and secretion of oxytocin, a hormone that causes release of milk from the alveoli.

KEY: Integrated Process: Teaching and Learning | Cognitive Level: Knowledge | Content Area: Maternity | Client Need: Health Promotion and Maintenance | Difficulty Level: Easy

21. During prenatal class, the childbirth educator describes the two membranes that envelop the fetus. The _____ contains the amniotic fluid, and the _____ is the thick, outer membrane.

ANS: amnion; chorion

The embryonic membranes (chorion and amnion) are early protective structures that begin to form at the time of implantation. The thick chorion, or outer membrane, forms first. It develops from the trophoblast and encloses the amnion, embryo, and yolk sac. The amnion arises from the ectoderm during early embryonic development. The amnion is a thin, protective structure that contains the amniotic fluid. With embryonic growth, the amnion expands and comes into contact with the chorion. The two fetal membranes are slightly adherent and form the amniotic sac.

KEY: Integrated Process: Teaching and Learning | Cognitive Level: Knowledge | Content Area: Maternity | Client Need: Safe and Effective Care Environment | Difficulty Level: Easy

22. The perinatal nurse is teaching nursing students about fetal circulation and explains that fetal blood flows through the superior vena cava into the right _____ via the _____.

ANS: atrium; foramen ovale

Blood flows through the vein from the placenta to the fetus. Most of the blood bypasses the liver

and then enters the inferior vena cava by way of the ductus venosus, a vascular channel that connects the umbilical vein to the inferior vena cava. The blood then empties into the right atrium, passes through the foramen ovale (an opening in the septum between the right and left atrium) into the left atrium, and then moves into the right ventricle and on into the aorta. From the aorta, blood travels to the head, upper extremities, and lower extremities.

KEY: Integrated Process: Teaching and Learning | Cognitive Level: Knowledge | Content Area: Maternity | Client Need: Safe and Effective Care Environment | Difficulty Level: Moderate

23. The perinatal nurse explains to the student nurse that the growing embryo is called a _____ beginning at 8 weeks of gestational age.

ANS: fetus

Major organs are being formed (organogenesis) during the first weeks following fertilization. During this time, the developing organism is called an embryo. By the end of 8 weeks, the embryo has sufficiently developed to be called a fetus.

KEY: Integrated Process: Teaching and Learning | Cognitive Level: Knowledge | Content Area: Maternity | Client Need: Safe and Effective Care Environment | Difficulty Level: Easy

24. The perinatal nurse defines a _____ as any substance that adversely affects the growth and development of the embryo/fetus.

ANS: teratogen

Teratogens (drugs, radiation, and infectious agents that can cause development of abnormal structures in an embryo) and a variety of internal and external developmental events may cause structural and functional defects.

KEY: Integrated Process: Teaching and Learning | Cognitive Level: Knowledge | Content Area: Maternity | Client Need: Physiological Integrity | Difficulty Level: Easy

25. _____ is when sperm and oocytes are mixed outside the woman's body and then placed into the fallopian tube via laparoscopy.

ANS: Gamete intrafallopian transfer

Gamete intrafallopian transfer, also referred to as GIFT, is used when there is a history of failed infertility treatment for anovulation, or unexplained infertility, or low sperm count.

KEY: Integrated Process: Teaching and Learning | Cognitive Level: Knowledge | Content Area: Maternity | Client Need: Physiological Integrity | Difficulty Level: Moderate

Multiple Response

26. A woman seeks care at an infertility clinic. Which of the following tests may this woman undergo to determine what, if any, infertility problem she may have? (Select all that apply.)

- a. Chorionic villus sampling
- b. Endometrial biopsy
- c. Hysterosalpingogram
- d. Serum FSH analysis

ANS. b, c, d

	Feedback
a.	Chorionic villus sampling is done to assess for genetic disorders of the fetus.
b.	Endometrial biopsy is performed about 1 week following ovulation to detect the endometrium's response to progesterone.
c.	Hysterosalpingogram is used to determine if fallopian tubes are patent.
d.	Serum FSH levels are used to assess ovarian function.

KEY: Integrated Process: Teaching and Learning | Cognitive Level: Knowledge | Content Area: Maternity | Client Need: Health Promotion and Maintenance | Difficulty Level: Moderate

27. A couple who has been attempting to become pregnant for 5 years is seeking assistance from an infertility clinic. The nurse assesses the clients' emotional responses to their infertility. Which of the following responses would the nurse expect to find? (Select all that apply.)

- a. Anger at others who have babies.
- b. Feelings of failure because they cannot make a baby.
- c. Sexual excitement because they want to conceive a baby.
- d. Guilt on the part of one partner because he or she is unable to give the other a baby.

ANS: a, b, d

	Feedback
a.	Infertile couples often feel anger toward couples who have babies.
b.	Infertile couples often express feelings of personal failure.
c.	Infertile couples undergoing infertility testing

	and treatment often express an aversion to sex.
d.	Guilt is often expressed by the couple.

KEY: Integrated Process: Teaching and Learning | Cognitive Level: Knowledge | Content Area: Maternity | Client Need: Health Promotion and Maintenance | Difficulty Level: Moderate

28. Which of the following places a couple at higher risk for conceiving a child with a genetic abnormality? (Select all that apply.)

- a. Maternal age over 35 years
- b. Partner who has a genetic disorder
- c. Maternal type 1 diabetes
- d. Paternal heart disease

ANS: a, b

Fertility decreases after 35 years. A partner contributes half of the chromosomal makeup, and genetic disorders can be inherited. Maternal diabetes can have an effect on the fetus/neonate, such as causing complications such as macrosomia and hypoglycemia, but these are not genetic disorders. Paternal heart disease can place the neonate at risk for heart disease later in life, but this is not referred to as a genetic disorder, such as is trisomy 21 and hemophilia.

KEY: Integrated Process: Teaching and Learning | Cognitive Level: Analysis | Content Area: Maternity | Client Need: Health Promotion and Maintenance | Difficulty Level: Difficult

29. The ovarian cycle includes which of the following phases? (Select all that apply.)

- a. Follicular phase
- b. Secretory phase
- c. Ovulatory phase
- d. Luteal phase
- e. Menstrual phase

ANS: a, c, d

Follicular phase, ovulatory phase, and luteal phase are part of the ovarian cycle. Secretory and menstrual phases are part of the endometrial cycle.

KEY: Integrated Process: Teaching and Learning | Cognitive Level: Knowledge | Content Area: Maternity | Client Need: Physiological Adaptation | Difficulty Level: Easy

30. A couple is undergoing an infertility workup. The semen analysis indicates a decreased number of sperm and immature sperm. Which of the following factors can have a potential effect on sperm maturity? (Select all that apply.)

- a. The man rides a bike to and from work each day.

- b. The man takes a calcium channel blocker for the treatment of hypertension.
- c. The man drinks 6 cups of coffee a day.
- d. The man was treated for prostatitis 12 months ago and has been symptom free since treatment.

ANS: a, b

The daily riding of a bike can be the cause of prolonged heat exposure to the testicles. Prolonged heat exposure is a gonadotoxin. A number of medications, such as calcium channel blockers, can have an effect on sperm production. Coffee has not been associated with low sperm counts. Prostatitis or other infections within the last 3 months may have an effect on the sperm analysis. This man's episode of prostatitis was 12 months prior.

KEY: Integrated Process: Teaching and Learning | Cognitive Level: Application | Content Area: Maternity | Client Need: Health Promotion and Maintenance | Difficulty Level: Moderate

31. The clinic nurse recognizes that pregnant women who are in particular need of support are those who (select all that apply):
- a. Are experiencing a second pregnancy
 - b. Are awaiting genetic testing results
 - c. Are experiencing a first pregnancy
 - d. Are trying to conceal this pregnancy as long as possible

ANS: b, d

A second pregnancy is not an indication of a woman in need of additional support. A support system may be lacking for women who are trying to conceal a pregnancy or for women who are trying to keep the news of their pregnancy from relatives or friends until results from genetic tests are known. These individuals may need additional support from their nurses and other health-care providers, as they are placed in a powerless situation while awaiting results and face a pregnancy that may be in jeopardy.

KEY: Integrated Process: Nursing Process: Clinical Problem Solving | Cognitive Level: Comprehension | Content Area: Maternity | Client Need: Safe and Effective Care Environment | Difficulty Level: Moderate