SECTION

FETAL DEVELOPMENT

34.3 **Study Guide**

KEY CONCEPT

Development progresses in stages from zygote to fetus.

VOCABULARY			
blastocyst	placenta	fetus	
embryo	umbilical cord		
amniotic sac	trimester		

MAIN IDEA: The fertilized egg implants into the uterus and is nourished by the placenta.

- **1.** What is the difference between a blastocyst and an embryo?
- 2. Fill in the following chart to summarize what you know about the structures that nourish and protect the growing embryo.

Structure	Description and Functions
amniotic sac	
chorion	
placenta	
piacenta	
umbilical cord	

3. Why must the blood flows of the mother and the embryo be kept separate?

Reproduction and Development

MAIN IDEA: A zygote develops into a fully formed fetus in about 38 weeks.

- **4.** In the first trimester of human life, what are some of the major organs that are forming and beginning to function?
- **5.** Would a mother be more likely to feel the fetus moving in the first trimester or in the second trimester? Explain your answer.
- **6.** Why would a fetus who is born at the beginning of the third trimester have a difficult time surviving?

MAIN IDEA: The mother affects the fetus and the pregnancy affects the mother.

- **7.** Why is the quality of the mother's diet so important to the developing fetus?
- **8.** Besides proper diet, what else can the mother do to help ensure a heathy pregnancy for herself and her baby?
- **9.** How can fluctuating hormone levels affect the mother's health during and just after a pregnancy?

Vocabulary Check

10. In the space below, draw a sketch that illustrates the terms *amniotic sac*, *placenta*, and *umbilical cord*. You can use Figure 34.10 as a reference or think up your own example, such as an astronaut's suit.