



Brain International School

Vikas Puri, New Delhi

ASSIGNMENT NO. 4

SUBJECT: SCIENCE

CLASS-VIII

OCTOBER'2025

Chapter-7 Reaching the age of Adolescence

1. Choose the correct option:

- i. Which of these is not a secondary sex characteristic?
 - a) increase in height
 - b) release of testosterone
 - c) voice change
 - d) hair growth on body
- ii. The number of chromosomes present in human cell are
 - a) 25 pairs
 - b) 22 pairs
 - c) 23 pairs
 - d) none of these

2. In each of the following questions, two statements are given one labelled. Assertion (A) and the other labelled Reason (R). Select the correct answer to these questions the codes (a), (b), (c) and (d) as given below:

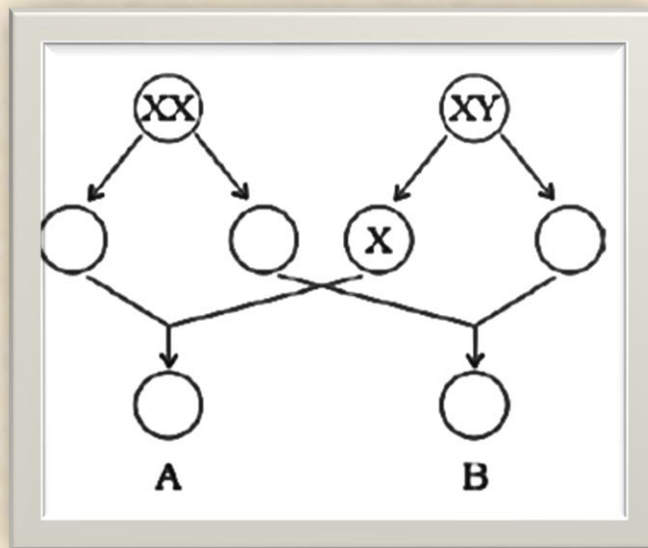
- a) Both A and R are true, and R is correct explanation of the assertion.**
- b) Both A and R are true, but R is not the correct explanation of the assertion**
- c) A is true, but R is false**
- d) Both assertion and reason are false.**

- (i) Assertion: Reproductive life of a woman lasts from menarche to menopause.
Reason: Menarche is the starting phase of menstruation and menopause is the stoppage of menstruation.
- (ii) Assertion: Thyroxine and insulin are the growth hormones.
Reason: The onset of puberty is the result of release of sex hormones in the body.

3. Answer the following question.

1. In human females, each time during maturation and release of egg the inner wall of uterus thickens. Is this thickening permanent? Give reasons.
2. Explain the terms menarche and menopause.
3. Mention different types of glands, their functions and hormones secreted by them.

4. John and Radha have been classmates since childhood. When Radha was eleven years old, she developed a little swelling on her neck. She visited the doctor who started medication for her. After a few years, John also developed a slight protrusion on his throat. He got worried and went to the doctor. But the doctor assured him that it was a normal feature in boys while they are growing up. Can you think of any reasons for the difference in diagnoses?
5. Fill in the blank circles in figure and identify the sex of children A and B.



4. Answer the following case study-based questions

Salma had a very soft and smooth skin during her childhood. As she entered adolescence, she developed pimples on her face, her body became taller compared to her face. She got worried of all of the sudden changes. Her mother explained that all these changes are normal and advised her to wash her face at regular intervals.

- (i) Why Salma's mother advised Salma to wash her face at regular intervals?
- (ii) What is the reason for appearance of pimples on her face?
- (iii) Why Salma experienced disproportionate growth of the body?

Chapter -10: Sound

1. Choose the correct option:

- i. In order to reduce the loudness of a sound, we have to
 - a) decrease its frequency of vibration of the sound.
 - b) increase its frequency of vibration of the sound.
 - c) decrease its amplitude of vibration of the sound.
 - d) increase its amplitude of vibration of the sound.
- ii. An object is vibrating at 50 hertz. What is its time period?
 - a) 0.02 s b) 2 s c) 0.2 s d) 20 s

2. In each of the following questions, two statements are given one labeled Assertion (A) and the other labelled Reason (R). Select the correct answer to these questions from the codes (a), (b), (c) and (d) as given below:

- a) Both A and R are true, and R is correct explanation of the assertion.
 - b) Both A and R are true, but R is not the correct explanation of the assertion.
 - c) A is true, but R is false.
 - d) A is false, but R is true.
- (i) **Assertion:** The sounds of frequencies less than about 20 vibrations per second (20 Hz) cannot be detected by the human ear.
 Reason: Any sound that is above 80 decibels is extremely harmful to human health.
- (ii) **Assertion:** The speed of sound increases with temperature.
 Reason: As temperature increases, the particles of the medium vibrate faster.

3. Answer the following question.

1. Why do women have shriller voices than men?
2. When we put our ears onto a railway line, we can hear the sound of an approaching train even when the train is far off but its sound cannot be heard through the air. Why?
3. The town hall building is very close to Vipin's house. There is a clock on the top of the town hall building, which rings the bell every hour. Vipin noticed that the sound of the bell appeared to be much clearer at night. Why?
4. Can sound travel through vacuum? Describe an experiment to explain your answer.
5. Explain the structure and functioning of human ear with the help of diagram.

4. Answer the following case study-based question

On Ramesh's 13th birthday, his father invited all his friends and their relatives. It was a big party with lots of food and DJs. Ramesh didn't like the loud sound of DJs and asked his father to play it in a low volume so that their neighbours do not get much disturbed and people in the party can also enjoy the music. Ramesh's father felt good for his wisdom and did as he said.

- (i) What is noise pollution and why it is considered so harmful?
- (ii) What are some common sources of noise pollution?
- (iii) How can you control noise pollution at your end?