

**DWARKA INTERNATIONAL SCHOOL**  
**SECTOR-12, DWARKA, NEW DELHI-110075**  
**CLASS VII (SCIENCE) 2019-2020**  
**SAMPLE PAPER**

**TIME: 3 hours**

**MM:80**

**Q1. Multiple choice questions:**

**(1x10=10)**

- a) Mohair wool comes from a/an  
(i) vicuna                      (ii) sheep                      (iii) cashmere goat                      (iv) angora goat
- b) A metal spoon kept in a cup of hot milk gets hot due to  
(i) conduction                      (ii) convection                      (iii) radiation                      (iv) none
- c) 0 °C is the same temperature as  
(i) 0 °F                      (ii) 32 °F                      (iii) 212°F                      (iv) 100 °F
- d) Normal human body temperature is  
(i) 35 °C                      (ii) 37°C                      (iii) 35°F                      (iv) 37°F
- e) Soil horizon rich in humus is  
(i) A horizon                      (ii) B horizon                      (iii) O horizon                      (iv) C horizon
- f) Biological weathering is caused by  
(i) animals                      (ii) plants                      (iii) microorganisms                      (iv) all of these
- g) Paddy can be grown best in  
(i) sandy soil                      (ii) loamy soil                      (iii) clayey soil                      (iv) black soil
- h) Lenticels are present in  
(i) woody stems                      (ii) leaves                      (iii) roots                      (iv) flower
- i) Exchange of gases in insects takes place through  
(i) alveoli                      (ii) gills                      (iii) bronchioles                      (iv) spiracles
- j) Urine mainly consists of  
(i) uric acid                      (ii) ammonia                      (iii) urea                      (iv) starch

**Q2. Fill in the blanks:**

**(1x5=5)**

- a) The \_\_\_\_\_ kidney is placed a little higher than the \_\_\_\_\_ kidney.
- b) A \_\_\_\_\_ records the instantaneous speed of the vehicle.
- c) The tallest trees form the \_\_\_\_\_ layer.
- d) The microscopic air sacs in the lungs are called \_\_\_\_\_.
- e) The formation of soil is a \_\_\_\_\_ process.

**Q3. Define the following term:**

**(1x5=5)**

- a) Uniform motion  
b) Humus  
c) Translocation  
d) Shearing  
e) Thermal equilibrium

**Q4. Answer the following questions in brief (any 10):**

**(10x2=20)**

- a) State the laws of reflection with the help of a ray diagram

- b) List out the names of the different processes involved in wool production.
- c) What are the common health hazards to the people working in the silk industry?
- d) Explain any two effects of heat.
- e) How is terrace farming helpful in preventing soil erosion?
- f) Differentiate between aerobic and anaerobic respiration. Write its equation.
- g) What is transpiration? Why is it necessary?
- h) What are the functions of blood? Name the oxygen carrying pigment of blood.
- i) Convert  $32^{\circ}\text{C}$  in  $^{\circ}\text{F}$ .
- j) A pendulum completes 60 oscillations in 2 minutes. Calculate its time period.
- k) What is a food chain? Explain with the help of an example.

**Q5. Answer the following questions in detail:**

**(3x6=18)**

- a) What are primary , secondary and tertiary consumers? Give example for each.
- b) What is speed? What is its SI unit? Calculate the speed of a car which has travelled 560 km in 10 hours.
- c) Give reasons:
  - i. Left side and the right side are separated by a septum.
  - ii. A puri swells up when put in hot oil.
  - iii. Water retention capacity of sand is less.
- d) Differentiate between conduction, convection and radiation and give one example for each.
- e) What are the components of blood? Write the function of each component.
- f) Draw the spiracles and describe the breathing process in cockroaches.

**Q6. Answer the following questions in detail:**

**(4x3=12)**

- 1) What is fermentation? How do the intercostal muscle and the diaphragm work together for inhalation and exhalation?
- 2) What is sericulture? Describe the life cycle of a silk moth.
- 3) a) If a bus completes 35 km in 80 minutes, what will be the speed of the bus in m/s.  
b) Plot a distance time graph for the motion of a car from the following data.

Time	Distance covered in km
8:00 am	0
8:05 am	3
8:10 am	6
8: 15 am	9
8: 20 am	12

**Q7. Answer the following questions in detail: (Any two)**

**(5x2=10)**

- 1) a) Draw and label the diagram of human respiratory system.  
b) Explain the difference between respiration and breathing.
- 2) Explain the different horizons of soil profile with the help of a diagram.
- 3) Explain the difference between land breeze and sea breeze. Draw its diagram.