

Class: VI
Subject: Physics
Topic: Light, shadows and reflection
No. of Questions: 20

1. In a completely dark room, can you see your face in a mirror? Why?

Ans: Due to absence of light in a dark room. Light is the source that illuminates our face by reflection.

2. Why cannot we see upside down image of the sun?

Ans: Object like sun is in infinity whose image form point sized or highly demised.

3. Why shadows are black in colour?

Ans: It is because no light reaches on screen in area where shadow form. The colour of object is colour components of light that reflect and reach our eyes.

4. Can you see an object through a "T" shaper pipe? If, no, Why?

Ans: No, it is because light always travel in straight path that is known as rectilinear properties of light.

5. Can you see a reflected light directly? If, no Why?

Ans: No, the path of the ray of light is itself invisible but makes the things visible only when fall on our eyes.

6. What is the reason for the formation of shadow?

Ans: The rectilinear propagation of light .Kinds of shadow depends on the source f light.

(a)Point source of light form only dark and sharp shadow called the Umbra

(b)Extended source of light (smaller than object) form two reason a dark umbra and another less dark region called penumbra.

(c)Extended source of light (larger than object): The size of umbra decreases and penumbra increases as screen move away from object and vice versa.

7. How can you see the thing around yourself?

Ans: We see the thing around us when light from a luminous object (like the Sun, a torch or an electric light) falls on these objects and then travels towards our eye after refraction.

8. Light is form of what?

Ans: Energy

9. What is the speed of light?

Ans: 3×10^8 m/s

10. Name the dark part of shadow?

Ans: Umbra

11. What is lighter part of shadow known as?

Ans: Penumbra

12. Are stars luminous or non luminous?

Ans: Luminous _Objects that give out or emit light of their own are called luminous objects like the sun

13. Do shadow depends on colour of objects?

Ans: No

14. Which types of object allow light to pass partially?

Ans: Translucent

15. In a completely dark room, can you see your face in a mirror? Why?

Ans: Due to absence of light In a dark room. Light is the source that illuminates our face by reflection.

16. Why cannot we see upside down image of the sun?

Ans: Object like sun is in infinity whose image form point sized or highly demised.

17. Why shadows are black in colour?

Ans: It is because no light reaches on screen in area where shadow form. The colour of object is colour components of light that reflect and reach our eyes.

18. Is speed of light would remain same in medium?

Ans: No, it would be affected.

19. Can you see a refracted light directly? If, no Why?

Ans No, the path of the ray of light is itself invisible.

20. What is shadow .What are the essential conditions for the formation of shadow?

Ans: The dark patch that formed when opaque object come in the path of light is called shadow. Condition essential for the formation of shadow are:
(a)Source of light (b) Opaque object (c) Screen on which shadow form