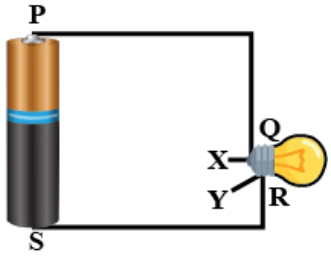
DR VIRENDRA SWARUP PUBLIC SCHOOL, KALYANPUR
(SESSION :2021-22)
WORKSHEET
CLASS: VI
Subject: Science

I. Multiple choice questions:

1. The figure given below consists of a bulb with two terminals X and Y and wires with ends P and O, and S and R. The direction of current will be



(a) PQRS (b) SQRP (C) SQRP (d) PRQS

2. When an opaque object comes in the path of light it forms
(a) An image with colors (b) Shadow (c) Black and White image (d) Depends on the color of the light

3. Which is an example of a translucent object?
(a) A thin sheet of paper (b) A thin glass slab (c) A thin iron sheet (d) All of these

4. Bouncing back of light from shining surfaces is called
(a) Reflection (b) Refraction (c) Bending (d) Dispersion

5. What is Lateral inversion?
(a) Image becomes inverted (b) Image bends laterally
(c) Right of the object appears left of the image (d) All of these happen

6. Which is a device to image the sun?
(a) Plane mirror (b) Pinhole camera (c) A straight pipe (d) Glass slab

7. Which of the following is a cold source of light?
(a) Firefly (Jugnu) (b) Tube light (c) The Sun (d) Electric bulb

8. Which of the following statement is or are correct?
(a) Light is a form of energy
(b) We need a source of light to make the object visible.
(c) An object which gives out light is called a source of light
(d) All of the above.

9. The Plane Mirror forms a/an
(a) Virtual image (b) Real image (c) Inverted image (d) Magnified image

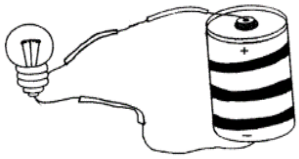
10. Virendra is doing his homework which is given by his teacher. Would you help him to choose the correct sentence/sentences?
(a) We can see many things kept in a room during the day on which sunlight does not fall directly.
(b) We cannot see an object if the light from that object does not reach our eyes.
(c) We can see the trees, walls, books etc. because they reflect the light falling on them, in all directions.
(d) All of the above

11. Cell is a device which
(a) converts chemical energy into electrical energy (b) electrical energy into light energy
(c) electrical energy into magnetic energy (d) None of these

12. Filament of a bulb is made up of
(a) aluminium (b) chromium (c) platinum (d) tungsten
13. Bulb glows only in
(a) closed circuit (b) open circuit (c) in both circuits (d) open circuit if bulb is not fused
14. Which is an example of an insulator ?
(a) Bakelite (b) aluminium (c) tap water (d) All of these
15. What is the function of the component shown below?
(a) It is used to connect the bulb to the other components in the circuit
(b) It provides the energy for the bulb to glow
(c) It can break a circuit, interrupting the current or diverting it from one conductor to another
(d) It measures the current in a circuit

II.Higher Order Thinking Questions:

1.Will the bulb glow in the circuit shown in Fig. given below?



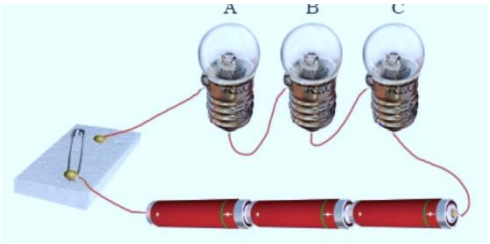
2.Why should an electrician use rubber gloves while repairing an electric switch at your home? Explain.

3.The handles of the tools like screwdrivers and pliers used by electricians for repair work usually have plastic or rubber covers on them. Can you explain why?

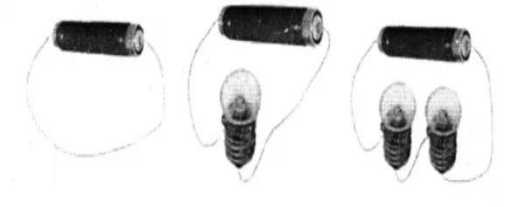
4.If you touch an electric wire carrying current you get a shock, but if on the same wire the birds sit they do not get any shock/current. Explain why?

5.What would happen if air were a good conductor of electricity?

6.Which bulb will glow first in the diagram shown below or all the bulb will glow together?



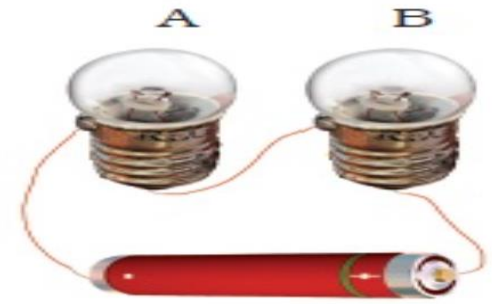
7.In which of the following circuits A, B and C given below, the cell will be used up very rapidly?



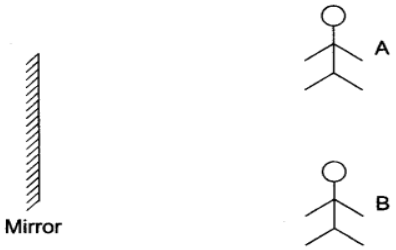
8.When Sheena's classmates leave for games, library, yoga classes, Sheena always remembers to switch off the lights and fans of her class. For this practice she was honored by the president of eco-club.
(a) What is electricity?
(b) What are the sources of electricity in your home?
(c) What values of Sheena are shown here?

9. After taking bath Rahman went to his room. As soon as he raised his hand to switch on the light, his mother shouted out loudly. He was very astonished at the strange behavior of his mother. His mother came to him and explained him the reason why he shouldn't be touching the electrical items with wet hands. Rahman made up his mind to spread this awareness in the school, so he decided to give a small speech on this topic during the school assembly.
(a) What are electrical appliances?
(b) What would have happened if Rahman touched the switch with his wet hand?
(c) What value of Rahman is shown here?

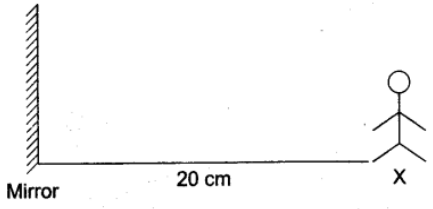
10.Paheli connected two bulbs to a cell as shown in figure below. She found that filament of bulb B is broken. Will the bulb A glow in this circuit? Give reason.



11. A and B are facing the mirror and standing in such a way that A can see B and B can see A. Explain this phenomenon.



12. 'X' is 20 cm away from the mirror. If he moves few steps closer to the mirror, what will happen to the image



13. Parthiv's grandmother looked a little worried today. She asked everybody to have their lunch after 3 p.m. When Parthiv asked the reason she said, "Today is solar eclipse at 2:15 p.m." Parthiv made her relaxed and said this is a natural phenomenon and nothing bad or unpleasant things are related to this. His grandmother listens to him carefully.
(a) What is Solar eclipse?
(b) Why do you think that some people believe that these eclipses will have some bad effect on them?
(c) Have you experienced such superstition in your life?
(d) What value of Parthiv is shown here?

14. Soumen's teacher asked her class to make a pinhole camera by themselves. Soumen read the activity 5 given in his textbook on how to make a pinhole camera. But he was unable to get the image of a well-lit object. He was very upset. His elder brother on observing his pinhole camera found that the hole made by him was quite large. He rectified Soumen's mistake and helped him making another pinhole camera. Now, Soumen could see the image of the object.
(a) On which principle of light does a pinhole camera work?
(b) Why was Soumen unable to get the image of a well-lit object?
(c) How is the formation of the image by a pinhole camera affected by size of the hole?
(d) What value of Soumen is shown here?

15. Four students A, B, C and D looked through pipes of different shapes to see a candle flame as shown in figure shown below. Who will be able to see the candle flame clearly? Give reason to justify your answer.