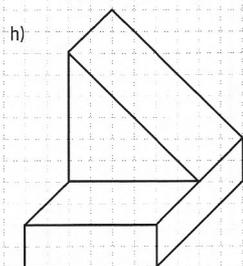
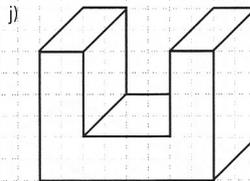
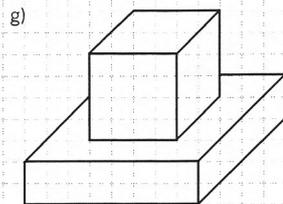
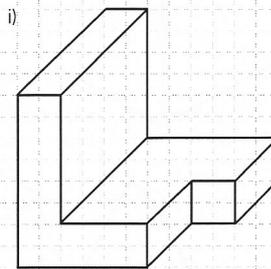
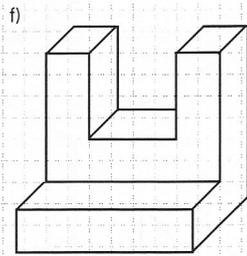


Actividades de repaso 1º ESO TPR. Curso 2016/2017:

1. Draw the primary views of the figures below:



2. Answer the next questions:

1. The creation of a product that did not exist before is called...
 - a. An invention
 - b. An innovation
 - c. A technical project
 - d. A construction

2. Technology is...
 - a. The set of skills and techniques used to invent, design, build and adapt products to meet human needs and resolve the problems of everyday life.
 - b. Science
 - c. The products we use in everyday life
 - d. Technique

3. Anything that has been made, including the knowledge that allowed it to be made, is called...
 - a. A technical project
 - b. A prototype
 - c. A technological product
 - d. The preliminary design

4. The person who writes down which materials are needed to start the project, makes sure that they are available in the correct quantities and puts the project away at the end of the class is the...
 - a. Coordinator
 - b. Materials Manager
 - c. Tools Manager
 - d. All of the above

5. A change to the way an existing product works is called...
 - a. An invention
 - b. An innovation
 - c. A technical project
 - d. A construction

6. We only need to clean the workspace at the end of class or when the teacher tell us to:
 - a. True.
 - b. False.

7. Shavings can be cleaned of the table by blowing them off or wiping them away with our hands:
 - a. True.
 - b. False.

8. Tools should not be left on the table if they are not being used:
- True.
 - False.
9. Each tool is designed for a specific use and should not be used for any other purpose because it could break or damage other things.
- True.
 - False.
10. Indicate which of the following sentences is correct:
- Man-made woods are soft, light-coloured woods.
 - Cork is not related to wood, it is a thinner type of material.
 - Wood derivatives are usually obtained from leftover wood (chips, sawdust, etc.).
 - Plywood is a wood derivative, made from chips and sawdust.
11. We obtain natural materials...
- Directly from nature.
 - From raw materials.
 - From processed raw materials.
 - From other existent materials.
12. Metallic materials are generally...
- Soft, malleable and ductile.
 - Hard, liquid and malleable.
 - Hard, ductile and good insulator of heat.
 - Hard, malleable and good conductors of heat.
13. Ferrous metals are formed by...
- Carbon and other metals
 - Carbon and iron
 - Carbon and alloys
 - Iron and copper
14. The language that computers use to communicate with each other is called...
- High-level language
 - Programming language
 - Machine language
 - Scratch
15. Scratch is...
- A proprietary software programming environment
 - A free graphical programming environment
 - A low-level language
 - An app compiler

16. The Scratch window has four sub-windows:
- The scripts area, the list of sprites area, the list of categories and the backpack
 - The scripts area, the list of stages area, the list of categories and the backpack
 - The scripts area, the list of sprites and stages area, the list of categories and the backpack
 - The scripts area, the list of sprites and stages area, the stage and the block palette
17. Indicate which of the following sentences is correct:
- Move is a block from Events category.
 - Move is a category from Events block.
 - Think is a block from Looks category.
 - Think is a category from Looks block.
- 18.- Draw an atom that is negatively charged.
- 19.- Ohm's law relates the three main electric variables with the next equation.
- $V=RxI$.
 - $V=R/I$.
 - $I=VxR$.
 - $R=VxI$.
- 20.- In a series circuit ...
- the same current flows through all the load devices.
 - the same current doesn't flow through all the load devices.
 - if one load device stop working, the rest of them continue working.
 - Answers a and c are correct.
- 21.- Electrical energy can be converted to...
- light and heat.
 - light and motion.
 - light and sound.
 - light, heat, motion and sound.
22. – Which of the following materials are electrical insulators?
- Wood, paper, water, copper, plastic.
 - Water, paper, wood, fabric, plastic.
 - Paper, wood, copper, plastic, fabric.
 - Paper, wood, plastic, fabric, ceramic.
- 23.- Which of the following elements are control and protection devices?
- One-way switch, cell, two-way switch, push switch.
 - One-way switch, two-way switch, push switch, fuse.
 - One-way switch, two-way switch, push switch, wire.
 - One-way switch, push switch, two-way switch, resistor.

24.- Electrical current is...

- a. The flow of protons from one atom to another.
- b. The flow of electrons through an insulator.
- c. The flow of electrons through a conductor.
- d. The flow of protons from one atom to another through a conductor.

25.- Answer the next questions.

a) What voltage must a cell have to allow an electric current of 5A to flow through a resistance of 100Ω ?

b) In a circuit, what resistance should we use for a flow of 2A if we have a 80V cell?

26.- From the series circuit shown in the figure calculate:

- a) The total current flowing through the circuit.
- b) The voltage across the $50\ \Omega$ resistance.

