

Name \_\_\_\_\_

#### STUDY QUESTIONS FOR STEP 4

1. List three (3) uses for freehand sketches:

One use for free hand sketching is to record ideas quicker. Another use is to revise and refine their sketches for presentations. Last use for free hand sketching is it can be helpful for planning a drawing or a layout before using tools.

2. What does a "multiview sketch" show you about an object?

Multiview sketch shows the actual shape of an object from different directions that are 90° apart. It also shows the view from the top, front, and the right side. The back, bottom, and left side are optional depending on the object's shape.

3. List the three (3) principle views that are shown on a multiview sketch:

1. One of the principle view that are shown on multiview is the top

2. Another principle view is the front

3. Last principle view is the right side.

4. List in your own words the steps to follow in the making of a multiview sketch:

A multiview sketch shows one the actual shape of the object from different directions. The sketch show the front, right, and the top side.

5. What does a "pictorial sketch" show you about an object?

The pictorial sketch shows the overall shape of an object from one direction.

6. List the three (3) principle types of pictorial sketches:

1. One of the pictorial sketches is isometric.

2. Another principle is the oblique.

3. The last principle is the perspective.

7. Why is the "isometric pictorial sketch" the most commonly used type of pictorial view?

The isometric pictorial sketch is one of the easiest to create as actual measurements are used and the shape of arcs and circles is consistent on all surfaces. It also shows the true size. That is why isometric pictorial is the most commonly used.

8. What overall shape should an object have to utilize an "oblique view"?

The overall shape an object should have to utilize in an oblique view is the front view.

9. What does a "perspective sketch" show you about an object?

The perspective sketch shows one the most realistic view of an object and is difficult because all distances must be shortened.

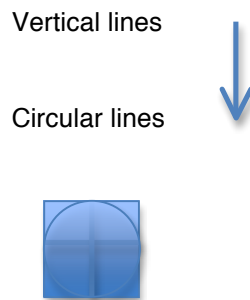
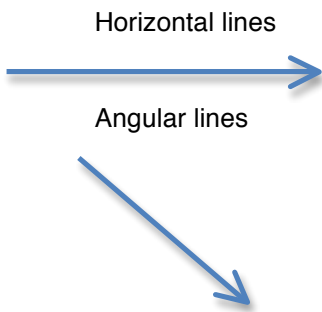
10. What does a "floor plan" and an "elevation" show you about a building?

The floor plan shows the top view with the roof removed. The elevation shows the height of the structure and the exterior materials.

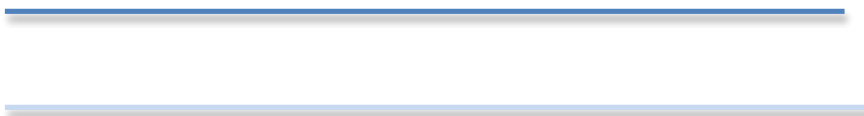
11. List in your own words the steps to follow in the making of a pictorial sketch:

To make a pictorial sketch you have to show the overall shape of an object from one direction.

12. Show and label with arrows the recommended methods for sketching the following lines:



13. Sketch an example of a "construction" line and explain how it is used:



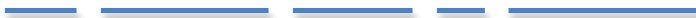
It is very thin and is very light to layout preliminary shapes.

14. Sketch an example of a "visible" line and explain how it is used:



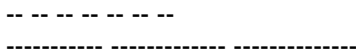
The visible lines show the outline or the visible edges of an object.

15. Sketch an example of a "hidden" line and explain how it is used:



Hidden lines are used to show edges or surfaces on the inside of an object.

16. Sketch an example of a "center" line and explain how it is used:



These are used to locate the center point of holes or the central axis of a cylinder.

17. Is it necessary to erase "construction" lines? No. Explain: Construction lines are very thin, light lines that should not be really visible.

18. What shape does a circle become when sketched on a pictorial view?

The circle becomes a square when sketched on a pictorial view.

19. Is it necessary to sketch objects in the proper "proportions"? Yes.

Explain:

If you do not make the idea in proper proportions, then you do not the how to make the idea and the measurements.

20. Make freehand sketches of the following using appropriate "proportions" in the space below :

1" x 2" rectangle



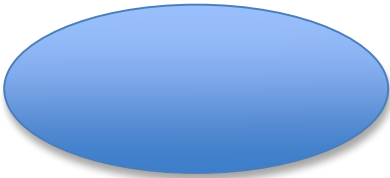
two 1.5" parallel lines 1/2" apart



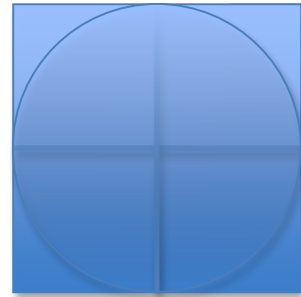
two 3/4" perpendicular lines



2" isometric ellipse



1.5" diameter circle



30°, 60° & 90° triangle a 45°, 45° & 90° triangle

