

Name Calvin Park

## STUDY QUESTIONS FOR STEP 4

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

1. to record ideas quickly on paper.
2. helpful in preliminary planning of a drawing or layout
3. Faster + Easier than using tools.

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

A multiview sketch shows the actual shape of an object from many directions that are 90 degrees apart. The sketch includes the top, front, and right side. The back, bottom and left side are optional and only for complex objects.

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

the three principle views are top, front, and the right side.

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

1. Analyze the object:
2. Layout the views:
3. Block in the Views:
4. Locate details
5. Add details
6. Darken Visible lines
7. Darken hidden lines
8. Add centerlines

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

Shows the overall shape of an object.

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

Isometric, oblique and perspective

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

Is the easiest to create as actual measurements and use the shape of arcs and circles.

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

Cylindrical shapes.

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

The most realistic view of the object.

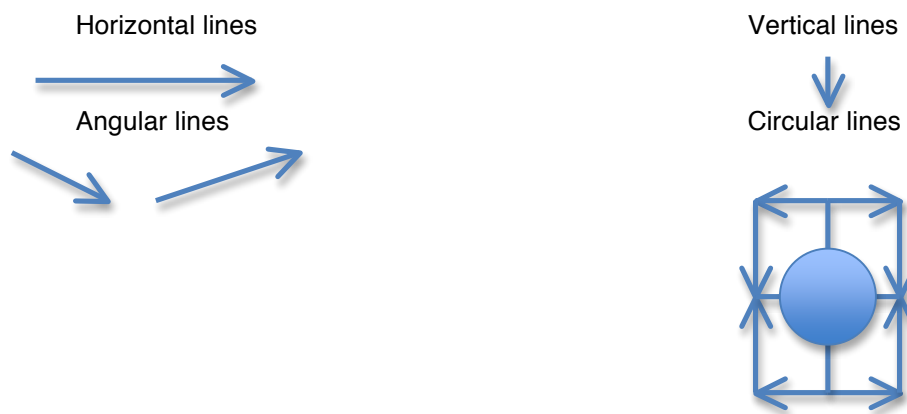
10. What does a "floor plan" and an "elevation" show you about a building?

Top view of the building with the roof removed and shows interior walls windows, doors, appliances, fixtures, built in cabinetry and stairways.

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

1. analyze the object
2. layout the axis for a isometric sketch
3. add dimensions to the axis
4. sketch light construction lines parallel
5. locate holes or rounded corners.
6. use light construction to make a diamond that represents the diameter of holes.
7. all visible edge lines should be shown as thick lines.
8. erase hidden or center lines

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:

thin light lines used to layout preliminary shapes.

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

thick solid lines to show outline or visible edge of an object.

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

medium thick dashed lines 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:

thin lines made of long + short dashes and used to locate the center point of a hole or central axis of a cylinder.

17. Is it necessary to erase "construction" lines? No Explain: The lines are very thin so do not have to be erased.

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

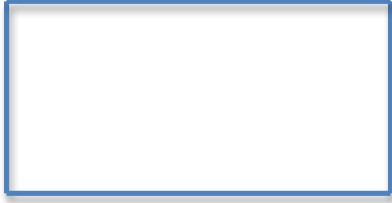
It becomes an oval

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

Explain: so when you make the object it will be easier to make because the proportions part is complete. \_\_

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

1" x 2" rectangle



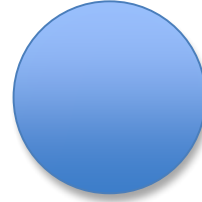
two 1.5" parallel lines 1/2" apart



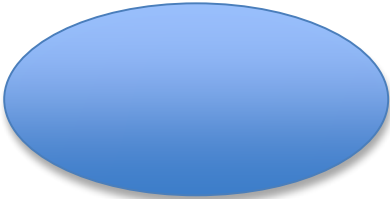
two 3/4" perpendicular lines



1.5" diameter circle



2" isometric ellipse



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

