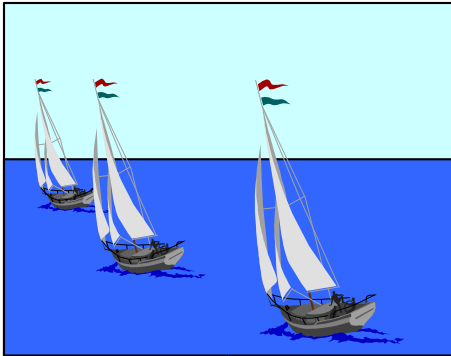


## Basic Graphic Communication

The design and production of graphic arts typically begins with two non-computer generated items 1) thumbnail sketches generally show choices for possible page layouts, and 2) the rough or mechanical layout shows the dimensions, size and locations, of all of the elements, text, and images on the page. More often now than in the past, designers are not physically pasting elements onto the camera-ready copy of the design. Instead, most of this so called, paste-up is done solely on the computer. Computers are also used in generating film and printing plates without the use of process cameras. Typical software that is involved in the graphic design or pre-press process includes PageMaker, and Quark Express. Color separations and other digital photographic processes are accomplished with software like PhotoShop.

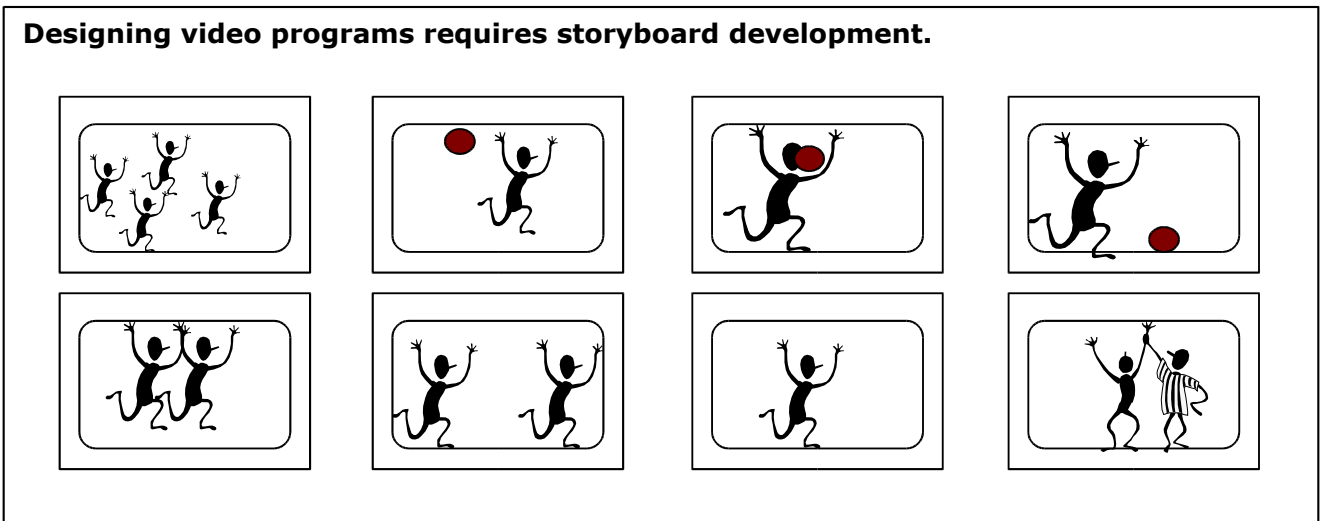
For the composition of landscape and other non-portrait photographs, generally the rule-of-thirds is followed. It means that the photograph is composed of two-thirds sky and one-third ground or visa versa depending on what is the most interesting. Students often leave too much headspace and shoot from too far away when composing interest shots.

Lead space should also be included if a subject is facing a certain direction or is moving in a particular direction. Portraits should be shot close up without too much headspace.



## Storyboard

The storyboard helps people visualize each shot with regard to lighting requirements, sound, dialog, etc. Planning shoots depends on the requirements that are specified in the storyboard.



## What Makes a Good Design?

A good design must work and be well organized and attractive to effectively communicate your message. A good design does what you set out to do. It helps the reader quickly and easily understand your message. It maps out a visual path for readers to follow. It shows what comes first, second, third, etc. and a good design grabs your reader's attention and pulls them into your piece.

## Elements of Design

### Color

Color does many things. It helps in identifying objects. It helps in understanding things, and it helps to communicate feelings and moods. Color adds a lot to a layout. The use of color makes a difference in the final result. Understanding the terminology of how color is described is essential to understanding its correct application. **Hue** is the name given to a color, such as red, green and blue. Within a hue, such as red, a variety of colors can be created by changing saturation and lightness. An example would be a scarlet red and pink, which are both of the same hue, but different colors. **Saturation** refers to the amount of hue in a color. Both pink and scarlet are of a red hue; scarlet would be the most saturated since it contains the greatest amount of red. The addition of black, white, or gray to a color lowers the saturation, or purity, of a color. **Lightness** refers to how light or dark a color appears. A light green and a dark green lightness of a hue can be changed by adding white or black.

<u>Colors</u>	<u>Feelings or Moods</u>
Red	Excitement, power, danger, aggression, anger, love
Orange	Lively, cheerful, friendly, energy, warmth
Yellow	Cheerful, bright, sympathy, cowardice
Green	Refreshing, restful, peaceful, luck, envy, hope
Blue	Calm, serious, reserved, depression, dignified, serenity
Purple	Dignified, dominating, mysterious, royalty
Black	Sophisticated, somber, despair, death, mourning, wisdom
White	Innocence, purity, faith, peace

### Color Systems

The ability to be accurate and consistent in describing which color to use, is very important to the reproduction of a design. Universal systems that assign codes to colors are referred to as color systems. Pantone, Munsell and CIE color systems assign numbers to colors for accurate reproduction of desired colors.

## **Color Relationships**

The **Color Wheel** shows how colors are related to one another.

- Primary colors (Used for mixing inks and dyes- red, green and blue). Remember that no other colors may be mixed to form a primary color.
- Secondary colors (Colors produced by combining primary colors-mixing red and blue make purple; mixing red and yellow make orange)
- Intermediate colors (Colors produced by combining a primary color and a secondary color- blue-green, yellow-orange)
- Warm colors (Colors related to red, orange and yellow that create a feeling of warmth. Also referred to as **Advancing** colors because they seem to move forward and suggest activity)
- Cool colors (Colors related to blue, violet and green. Also referred to **Receding** colors because they seem to move away or stay in the background)
- Neutrals (White, gray and black...Have no color and may be used alone or in combination with other colors. When used with another color in a design the other color looks brighter. When the neutral white is used it reflects light and makes objects appear larger. The neutral black absorbs light and makes objects appear smaller)

## **Line**

Lines give direction to a design. Lines give design movement and can express feelings. Lines can have different qualities, which is dependent on the type of tool used to create the line. They can be made “thick” to show importance or “thin” to demonstrate quick movement or give the meaning of less importance. Lines can be straight as a pencil or curved like a rainbow or they can be squiggly like a

worm. Lines can be used to organize such as the outline of images to be colored. They can be used to direct.

## Shape

Shape refers to the form of an object. Shapes are anything that has height and width. Shapes can be symbolic, such as the shape of a stop sign. There are three basic types of shapes- circle, square and triangle. Shapes can be used to identify an object such as a circle in the sky as the sun or a small oval to identify an egg. Unusual shapes attract attention. Arranging type in the shape of a star may be more visually appealing than the traditional vertical column.

## Texture

Texture is a very powerful tool if used effectively. It refers to the look or feel of a surface. A rough sand paper texture can remind us of a scratchy beard. Cotton ball texture can remind us of clouds or a soft bunny. Texture can add dimension to a design. The illusion of texture is often used for wallpaper to appear to be a type of fabric.

## Principles of Design

### Proportion

Proportion refers to the size relationship of how one part relates to the size of another part. It also refers to how the size of one part relates to the size of the whole item.

### Balance

Balance refers to how elements are arranged horizontally or vertically in a design. Balance can be achieved with color, line, shape, and or texture. Horizontal balance can be **formal** or **informal**. If all elements are equal on both sides of a design, this is formal balance or **symmetrical balance**. Balance can also be achieved when the design elements are different on both sides; this unequal type of balance is called informal balance or **asymmetrical balance**. Each side is different, but the design still appears to be balanced. This style is often used to make a design appear more exciting.

### Rhythm

Rhythm refers to the feeling of movement. Rhythm is achieved through repetition of lines, colors, shapes and or textures. When these elements are repeated, while changing slightly, and rhythm through gradation results. Radiation occurs when lines or other elements extend outward from a central point.

### Emphasis

Emphasis refers to the center of interest in a design. It is the first thing seen when looking at a design. A large, bold headline in a newspaper is a point of emphasis. Emphasis is important in making a layout functional, attractive and organized. What stands out most gets noticed first.

### Unity

Unity is the goal of design. It is achieved when all the parts of a design look as if they belong together. When the elements and principles of design are used effectively, the goal of unity is achieved.

### Proportion

Distinguishing the size relationship of various parts of the project or graphic as they relate to the finished product.

### Contrast

Establishing a point of emphasis to draw the viewer's eye in on specific elements of a graphic or product.

### Variety

Used to add elements of interest to a graphic or product to gain interest in a graphic or product.

### Harmony

Utilized to add rhythm and allow the viewer to see items in an agreeable manner.

## Understanding the difference between design principles and the principles of design.

The principles of design serve as a guideline as the elements of design are used. The elements of design make up the design. How the elements fit together -are the principles of design. The principles of design provide the guidelines for using the elements effectively.

## **Identify the principles and elements of design**

The influence of the basic *principles* of design is predicated on our ability to visualize applications of design *elements* that have been established throughout time. The fundamentals of design are incorporated within every element of our lives. A range of knowledge and experience is necessary to become technologically literate. Everyday we are compelled to view developments through our senses as they relate to shape, form, function, harmony, and balance. Students will learn to apply these principles and elements by developing live projects for all disciplines. "Design is regarded by many as the core problem-solving process of technological development. It is as fundamental to technology as inquiry is to science and reading is to language arts."

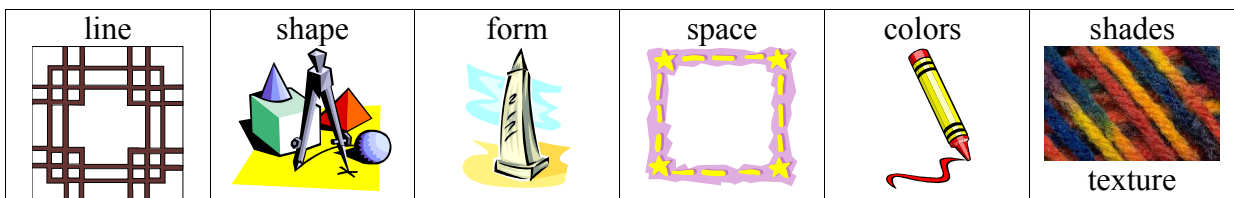
- Design –“An interactive decision-making process that produces plans by which resources are converted into products or systems that meet human needs and wants or solve problems .
- Design Brief – “A written plan that identifies a problem to be solved, its criteria, and its constraints. The design brief is used to encourage thinking of all aspects of a problem before attempting a solution.
- Design Principle – “Design rules regarding rhythm, balance, proportion, variety, emphasis, and harmony, used to evaluate existing designs and guide the design process.”

- Design Process – “A systematic problem-solving strategy, with criteria and constraints, used to develop many possible solutions to solve a problem or satisfy human needs and wants and to winnow (narrow) down the possible solutions to one final choice.”
- Design Proposal–“A written plan of action for solutions to a proposed problem.”

Designers are driven to develop products that are creative through inventions and innovations that show resourcefulness utilizing their ability to visualize and think abstractly along with considering several solutions for the same problem. Ideas are stimulated by our personal senses as they relate to the elements of design. These ideas are processed by individuals and incorporated into new products. Designers work through a collaborative effort to achieve the best possible solution for new products and systems. Designs are developed through an ongoing process of evolution that allows a product to improve over time.

The principles of design consist of:

- Balance-determining the visual weight of an object or image in either formal symmetry or informal symmetry.
- Proportion-distinguishing the size relationship of various parts of the project or graphic as they relate to the finished product.
- Contrast- establishing a point of emphasis to draw the viewer’s eye in on specific elements of a graphic or product.
- Variety-used to add elements of interest to a graphic or product to gain interest in a graphic or product.
- Harmony-utilized to add rhythm and allow the viewer to see items in an agreeable manner.
- Unity-refers to the ability to make components of a design have agreement with no elements out of place or seem as they do not belong together.
- Rhythm-the reoccurrence or repetition within a design that gives it the appearance that movement is taking place (R2, 144-146).



Product’s physical descriptions as they relates to the human senses.

## **Collect, Critique, and redesign a visual message.**

When working with design elements and principles it is important to have the ability to quickly identify the different parts of an advertisement. Well designed materials that appropriately utilize elements and effectively employ principles are remembered and often copied. Many times we remember those ads that stimulated us to think, pay attention or simply react to the message. Trial and Error is a proven scientific approach to effectively visualize our creative message. Designers rarely get their messages across on the first round. One usually changes some portion of the design before final approval.

### **Activity**

Look through your favourite magazine and choose advertisements that appeal to you.

1. Why do the ads appeal to you?
2. What are the design elements and principles employed in the ads?
3. What could be done to make the ads more effective?

**Newsletter/Magazine Cover Design: Student Assessment**      **Student:** \_\_\_\_\_

You will be assessed using the following criteria:

<b>Objectives</b>	<b>4 points</b>	<b>+</b>	<b>4 points</b>	<b>+</b>	<b>12 points</b>	<b>20 points for each objective</b>
Brainstorming and research	Individual or group sharing of ideas	+	Organization skills and recording of ideas	+	Evaluation of ideas upon completion of gathering thoughts through more in depth research material with attention to references	
Layout & Graphic Support	Topical item choices relevance to the final product	+	Organization skills and recording of ideas. Layout and positioning of graphics	+	Final layout of articles, graphics, calendar including structure, dimensions, details and notes	
Software Presentation	Ability to utilize software capabilities	+	Attention to details regarding formatting	+	Final production of newsletter including shape, form, function, harmony, and balance	
Technical Reporting	Data Collection and graphic collection methods	+	Relationship to overall objective	+	Composite of all necessary elements along with details within the framework	
Final Newsletter	Printing process including photo copy quality and methods	+	Digital imagery, text editing, layout, space, formatting process	+	Final production of the newsletter in relations to the SAFE concept of simple, appropriate, functional, and feasible	
<b>Total Points:</b>						
<b>Comments:</b>						