

Design Fundamentals

by Steven Bradley

**Elements,
Attributes,
Principles** &

*A Beginner's Guide to
Graphic Communication*



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Direction and Movement

Two related attributes of design elements are direction and movement. Direction implies movement and movement implies direction. Both help lead the eye from one part of a design to another.

When talking about lines and line-like elements, I said the fundamental characteristic or function of a line was to impart direction. Even earlier I mentioned direction as part of saccadic eye movement. Fixate and move. Fixate and move.

The general idea with direction and movement is to get the eye to look somewhere else, though direction alone can come with potential meaning.

Direction

There are three basic directions that can be present in a composition.

- **Horizontal**—suggests calmness, stability and tranquility.
- **Vertical**—suggests balance, formality and alertness.
- **Diagonal**—suggests movement and action.

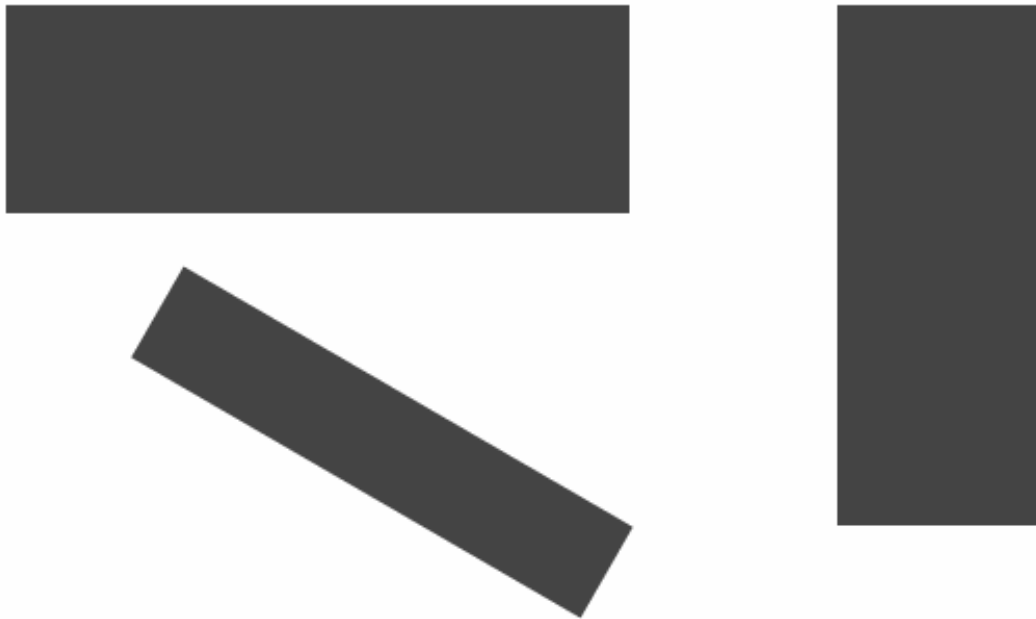


Figure 3.56: Three shapes indicating horizontal, vertical, and diagonal directions.

Figure 3.56, shows three line-like shapes one in each of the three directions, but lines and line-like elements are only one way to show direction. Direction exists:

- Through the orientation and shape of elements.
- Where people in images look.
- Where figures and objects in images appear to move.
- Through scale that creates perspective.
- Through arrows and other pointing devices.



Figure 3.57: Direction indicated by eye gaze, an arrow, and perceived movement.

A composition will usually have a dominant direction based on the direction of the majority of its elements, which can help set a general atmosphere. For example, a composition in which the dominant direction is horizontal can generate an impression of being stable and earth bound, while one with a vertical direction can come across as more dynamic.



Figure 3.58: Composition with horizontal direction (top left), vertical direction (top right), diagonal direction (bottom left) and a mix of horizontal and vertical direction (bottom right).

It is possible for a composition to have no dominant direction. The direction of different elements might be mixed and balance each other out in a way where none stands out above the others. When this occurs the viewer is able to and will impose his or her own dominant direction on the composition.

Since the viewer can impose a dominant direction with associations you might not intend, it makes sense to think about and plan to include one. You generally want your viewer to notice

key elements and information in your design and your composition should direct them to this information.

I'll talk more about direction and how it contributes to a design when we talk about compositional flow in the next chapter on design principles.

Movement

Disregarding animation and the ability to resize a browser and watch elements rearrange themselves on the screen, the elements in our designs don't actually move. Instead we imply movement.

Through the use of lines, colors, values, textures, forms, and space you can direct the eye from one part of a composition to another. This is considered movement or the illusion of movement in a design.

Direction leads to implied movement. Your eye follows the direction of a line or the gaze of a figure and your eye moves to see where the line leads or where the gaze is looking.

Movement is the path the eye follows when looking at a composition. How the eye travels through a composition can help create unity and it helps tie the elements together through the relationship of various components.

At the end of the Elements chapter, I presented Edward Hopper's *Lighthouse at Two Lights* to show how warmer colors advance and cooler colors recede. Here's the same image of the painting showing you the path my eye follows when I look at it (**Figure 3.59**). Notice how my eye follows the direction of several elements that stand out as it moves around the painting.



Figure 3.59: Where my eye moves through Edward Hopper's *Lighthouse at Two Lights*.

There are several ways in which we can show movement in a

composition.

- Rhythm
- Gradation
- Perspective
- Gestural lines
- Directional lines
- Repetition of elements
- Subject matter of elements
- Implied action an element exhibits

You might also arrange lines of text in patterns based on the length of each line as I've just done. I suppose this might be example of gradation of line length or maybe of an implied gestural line.

Movement in a design can be of one of two types

- Physical
- Compositional

Physical movement occurs when some physical activity is present in the subject. People walking, for example, or objects such as cars that appear to be in motion. Aerodynamic forms like planes suggest not only motion, but also speed.

These objects exist for movement and so they convey a sense of movement when we see them. They aren't literally moving on the

screen, but we know it's their function and perceive the movement they imply.



Figure 3.60: Representing physical movement.

Compositional movement occurs when different elements in a composition move the viewer's eye through the composition. This can occur by following a repetition of colors or patterns through the composition. Here you aren't concerned with a subject that appears to be physically moving, but rather the direction that elements are leading your eye.

Compositional movement can be further divided as either static or dynamic.

Static movement (**figure 3.61**) occurs when the eye jumps from one separate part of a composition to another. In static movement the eye will observe a color or shape in one part of the composition and jump to another part of the composition that includes a similar color or shape. Repetition of colors or isolated shapes are characteristic of static movement.



Figure 3.61: The color red creates static movement as your eye jumps between the red elements.

Dynamic movement (**figure 3.62**) flows more smoothly through a composition. With dynamic movement the eye is guided through a composition by continuous lines, forms, or gradations. Open shapes closely related to adjacent shapes are characteristic of dynamic movement.



Figure 3.62: Repetition of color, shape, and gradation give this composition a sense of dynamic vertical movement.

Direction and Movement in the Absence of Graphic Design

The eye will always move through a composition in some way. If you haven't planned for movement it will follow one of several natural patterns or their variations. Every composition has an optical center slightly above its geometric center. A viewer's eye naturally moves through this optical center as it moves from top to bottom in the composition.

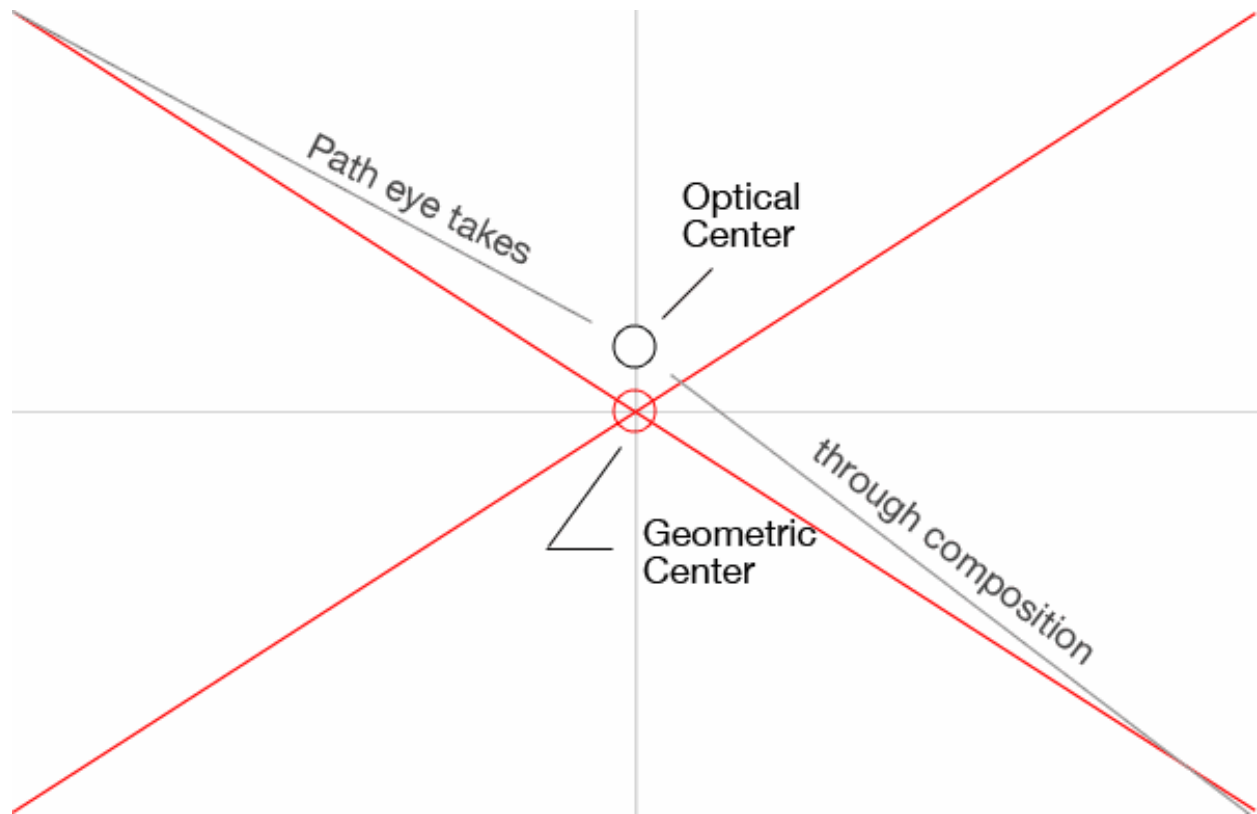


Figure 3.63: The optical center sits slightly above the geometric center.

Patterns exist that are based on this simple passing through the optical center. Here are three patterns, each described for languages that are read from left to right.

- **The Gutenberg Diagram**—The eye generally sweeps from the top/left to the bottom/right paying less attention to the other two corners.
- **The F-Pattern Layout**—The eye starts in the top/left and moves across the page to the right before moving back to the left and then down a little to repeat the same movement across the page. The general pattern follows the shape of the letter F.
- **The Z-Pattern Layout**—The eye starts in the top/left and

follows a z-pattern until it reaches the bottom/right.

- **The Zig-Zag Pattern Layout**—The eye starts in the top/left and follows a zig-zag pattern until it reaches the bottom/right.

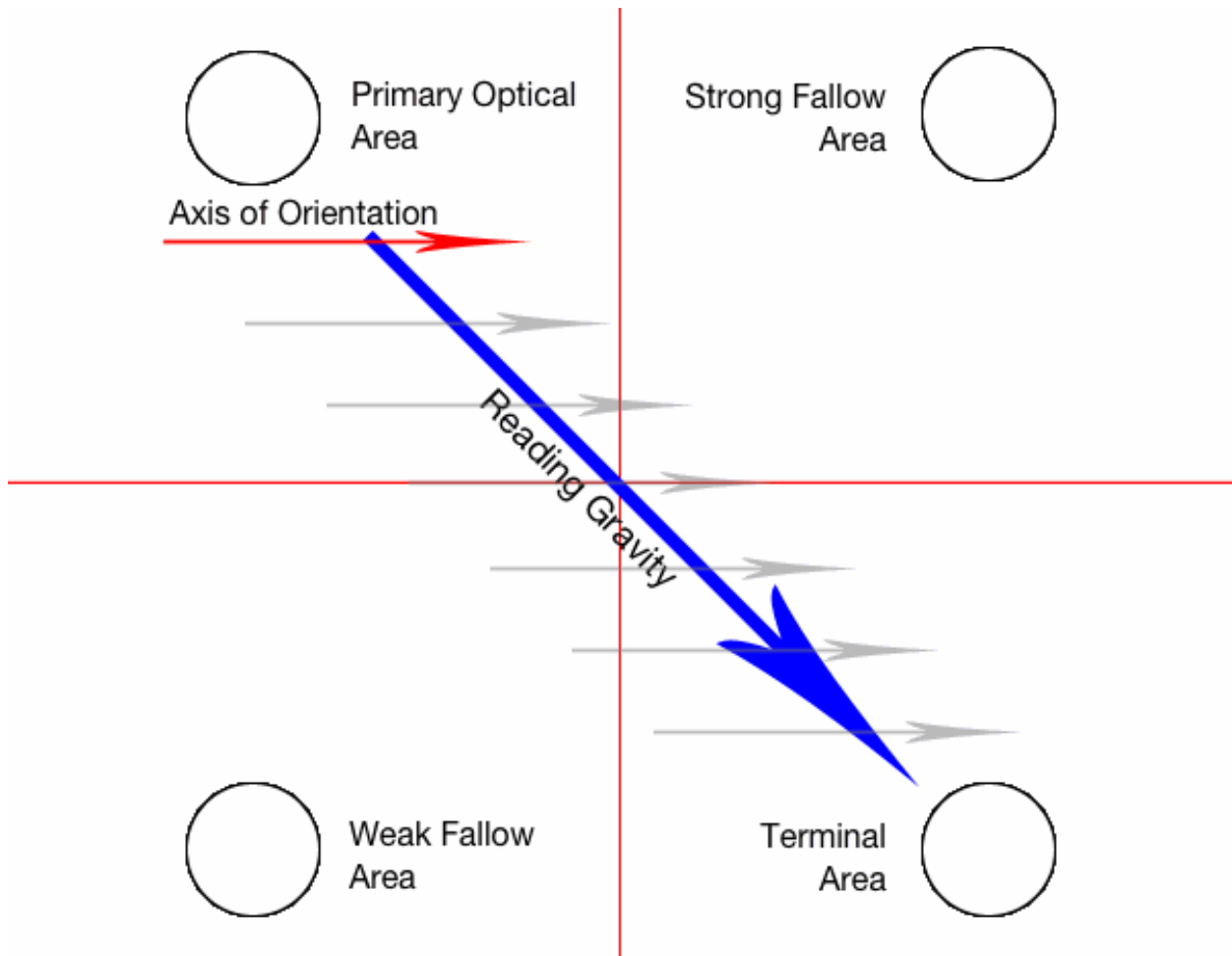


Figure 3.64: The Gutenberg Diagram.

Again, these patterns all start in the top/left in countries where reading is left to right. In languages that are read right to left, the pattern would be reversed and start in the top/right corner.

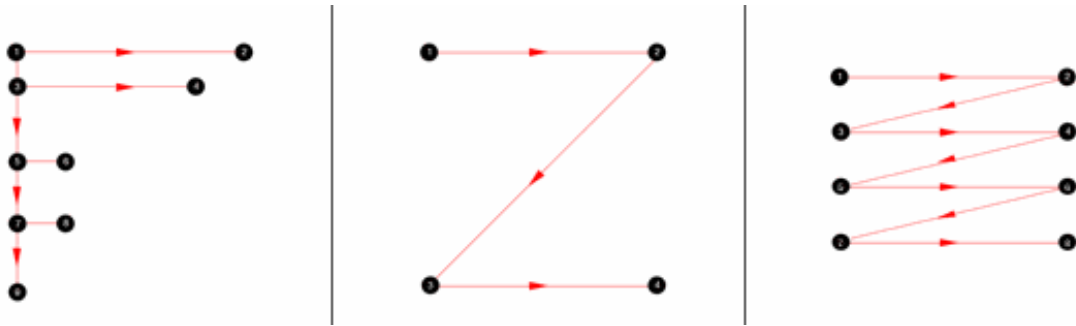


Figure 3.65: The F Pattern layout, the Z pattern layout, and the Zig-Zag Pattern layout.

Designing a sense of movement into a composition will always override these generic patterns. These natural patterns exist mostly in text heavy documents with an absence of design.

I'll talk more about each of these natural patterns when we discuss compositional flow in the Design Principles chapter, but let me repeat again that these patterns are in play when there's an absence of design. They exist as default patterns for the eye to follow in text heavy compositions, but as soon as you start to add dots and lines of various colors and sizes, with and without textures, these patterns no longer apply.

About the Author

Steven Bradley is a writer and former web designer. Born in Brooklyn and raised on Long Island, he now lives at the foot of the Rocky Mountains in Boulder, Colorado, where he hikes, bikes, plays softball, and enjoys beautiful weather nearly year round.

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