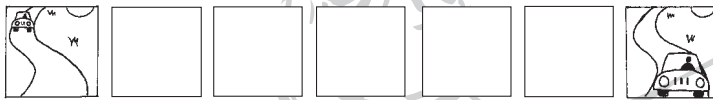


DRAWING MOVEMENT



Until 1914, when Earl Hurd patented “cels” (transparent sheets of celluloid or acetate), animators limited themselves to simple line drawings (like those depicting *Gertie the Dinosaur*). Without cels, the entire scene, including the background, had to be redrawn every time a character or object moved. Using cels, each part of the scene could be drawn separately. For example, when a character’s arm moved, the animator would draw several cels with different arm movements and exchange them as necessary, and the same background drawing could be used multiple times. The thin cels were layered in stacks of three or four and, to the camera, the images looked as if they were drawn on the same page.

PART A. The beginning and ending drawings of the flipbook you made in **Activity One** are similar to what animators call “extremes” or “key frames.” The drawings that connect the extremes are known as “in-betweens.” In the five boxes below, draw or sketch the in-betweens. If you have trouble completing the action, act it out in front of a mirror. Try to make the action as lively as possible.



What happens in the scene? _____

Does the action move quickly or slowly? _____

How does the speed of the action affect the mood of the scene? _____

Every action in an animated film contributes to the story. By changing an action, the animator changes the story. Imagine a character walking down the street with his head in a book. If he bumps into a girl, he might anger her, or they might share a laugh. If he avoids her without looking up, the end result would be completely different. The images in the first two boxes below show the beginning of an action. Complete the action in the next five boxes.



Now change one of the frames in the scene. How does this affect the rest of the scene? _____

What is the mood or atmosphere of the scene? _____

Add a special effect such as weather, reflections or shadows. How does this change the outcome of the story or its effect on the audience? _____

PART B. Animator Norman McClaren said that “animation is not the art of drawings-that-move, but rather the art of movements-that-are-drawn.” Consider a scene set in a forest. Each animal moves differently, from the awkward steps of a young deer to the energetic hops of a cheerful rabbit. The gentle rustle of the leaves on the trees tells us it is a fine day. A stream winds beneath the trees, breaking slightly on the rocks under the surface. What mood does the scene convey? _____

Imagine that something dangerous approaches. How would that be reflected in the movements of the characters and their surroundings? _____

Think of an emotion such as fear, surprise or happiness and act it out in front of a mirror. What facial expressions did you use? _____

How did your body move? _____

What do you think McClaren meant by his statement? _____

Why do you think animators are called the “actors” of an animated film? _____

CEL ANIMATION TERMS

CEL: A clear piece of celluloid or acetate .005 of an inch thick on which animation drawings are traced or photocopied.

EXTREMES: The beginning and ending of an animated action, also called “Key Frames” in computer graphics animation.

IN-BETWEENS: The drawings that take an action from one extreme point to another.

SCENE: A new angle in an animated film.

SEQUENCE: A collection of individual scenes that tell a specific part of the story.

SPECIAL EFFECT: Any added effect such as weather, shadows, reflections or the like, that gives depth and dimension to the animated drawings.

SQUASH AND STRETCH: Two opposing distortions of an animated object that help create expression and speed of motion in animation.