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Knife sound effects

It is a fundamental principle of modern language studies that individual sounds (or phonemes) do not have meanings. Linguistics Professor Edward Finegan offers a simple illustration of the point: The three sounds of peak do not individually matter; they form a meaningful unit only when combined as at the top. And it is precisely because the individual sounds at the top do not bear independent meaning that they can be formed in other combinations with other meanings, such as pot, opt, topped, and popped. (Language: Its structure and use, 5th ed. Thomson/Wadsworth, 2008) Yet this principle has an escape clause of sorts, one that goes by the name of sound symbolism (or phone aesthetician). While individual sounds may not have intrinsic meanings, some sounds seem to suggest certain meanings. In his small language book (2010), David Crystal shows the phenomenon of sound symbolism: It's interesting how some names sound good and some sound bad. Names with soft consonants like [m], [n], and [l] tend to sound nicer than names with hard consonants like [k] and [g]. Imagine we're approaching a planet where two alien races live. One of the breeds is called the Lamoniens. The other is called Grataks. Which sounds like the friendlier breed? Most people choose the Lamoniens, because the name sounds friendlier. Grataks sounds nasty. In fact, sound symbolism (also called phonosemantics) is one of the ways in which new words are shaped and added to the language. (Think frak, all-purpose swear words coined by the authors of the Battlestar Galactica TV series.) Of course, poets, rhetoricians and marketers have long been aware of the effects created by certain sounds, and in our dictionary you will find many overlapping terms that refer to specific arrangements of phonemes. Some of these terms you learned in school; others are probably less familiar. Give a listen to these linguistic sound effects (an example, by the way, of both alliteration and assonance). For more detailed explanations, follow the links. The repetition of a first consonant sound, as in the old slogan Country Life butter. You will never put a better piece of butter on your knife. The repetition of identical or similar vowel sounds in neighborly words, as in repetition of the short i sound in this couplet from the late rapper Big Pun: Dead in the middle of little Italy little, we knew that we pierced an intermediary who did not diddly--Twinz (Deep Cover '98). Death Penalty, 1998. Similar sounds to words, phrases, or sentences --like the repeated -nz sound in the advertising slogan Mame Beans. By and large, repetition of consonant sounds; more specifically, the repetition of the final consonant sounds of accented syllables or important words. Homophones are two (or more) words --that knew and new--that are pronounced the same but differ in meaning, origin, and often spelling. (As peas and peace differ in the invoicing of the final the two words are considered near homophones as opposed to true homophones.) A sequence of words (such as the things he knows) that sounds the same as another sequence of words (the stuffy nose). A word or lexeme (like mama, pooh-pooh, or chit-chat) that contains two identical or very similar parts. The use of words (such as elevator, murmur - or Snap, Crackle and Pop! by Kellogg's Rice Krispies) that imitate sounds associated with objects or actions they refer to. A word or phrase (like buzz and cock a doodle doo) that imitates the sound associated with the object or actions it refers to; an onomatopoeia. A short opinion (such as ah, d'oh, or yo) that usually expresses emotions and can stand alone. Writing is often followed an interjection (as Fred Flintstone's Yabba dabba do) by an exclamation point. To learn more about phonosemantics related to a variety of modern languages, take a look at interdisciplinary essays collected in Sound Symbolism, edited by Leanne Hinton, Johanna Nichols, and John J. Ohala (Cambridge University Press, 2006). The editors' introduction, Sound-Symbolic Processes, offers a fluid overview of the different types of sound symbolism and describes some universal tendencies. Meaning and sound can never be completely separated, they note, and linguistic theory must accommodate itself to the increasingly obvious fact. Air, like all matter, consists of molecules. Even a small region of air contains a large number of air molecules. The molecules are in constant motion, traveling randomly and at great speed. They constantly collide with and bounce back from each other, striking and bouncing back from objects that are in contact with the air. A vibrating object will produce sound waves in the air. For example, when the head of a drum is hit with a mallet, the drum head vibrates and produces sound waves. The vibrating drumhead produces sound waves because it moves alternately outwards and inwards, pushing toward, then moving away from, the air next to it. The air molecules that hit drumhead while moving outward rebound from it with more than their normal energy and speed, after receiving a push from drumhead. These faster moving molecules move into the surrounding air. For a moment, therefore, the region next to the drum head has a greater than normal concentration of air molecules—it becomes a region of compression. When the faster moving molecules overtake the air molecules in the surrounding air, they collide with them and pass on their extra energy. The compression region moves outwards with the energy from the vibrating drum head is transferred to groups of molecules farther and farther away. Air molecules that beat the drum head as it moves inward rebound from it with less than its normal energy and speed. For a moment, therefore, the region next to drumhead has fewer air molecules than normal—it becomes a region of rarefaction. Molecules with these slower-moving molecules also rebound at less speed than normal, and the region of rarefaction travels outwards. Wave character sounds become apparent when a chart is drawn to show changes in the concentration of air molecules at some point as the alternating pulses of compression and rarefaction pass that point. Graphene for a single pure tone, like the one produced by a tuning fork. The curve shows the changes in concentration. It begins, arbitrarily, at some point when the concentration is normal and a compression pulse is just arriving. The distance of each point on the curve from the horizontal axis indicates how much the concentration varies from normal. Each compression and the following rarefaction makes up a cycle. (A cycle can also be measured from any point on the curve to the next corresponding point.) The frequency of a sound is measured in cycles per second, or hertz (abbreviated Hz). Amplitude is the largest amount by which the concentration of air molecules varies from normal. The wavelength of a sound is the distance the interference travels under a cycle. It is related to the speed and frequency of sound by the speed/frequency formula = wavelength. This means that high frequency sounds have short wavelengths and low frequency sound long wavelengths. The human ear can detect sounds with frequencies as low as 15 Hz and as high as 20,000 Hz. In still air at room temperature, sounds with these frequencies have wavelengths of 75 feet (23 m) and 0.68 inches (1.7 cm) respectively. Intensity refers to the amount of energy transmitted by the interference. It is proportional to the square of the amplitude. Intensity is measured in watts per square centimetre or in decibels (db). The decibel scale is defined as follows: An intensity of 10-15 watts per square centimetre is equal to 0 db. (Printed in decimal form, 10-16 appears as 0.0000000000000001.) Each tenfold increase in watts per square centimetre means an increase of 10 db. Thus an intensity of 10-15 watts per square centimetre can also be expressed as 10 db and an intensity of 10-4 (or 0.0001) watts per square centimetre as 120 db. The intensity of the sound drops rapidly with increasing distance from the source. For a small sound source that radiates energy uniformly in all directions, the intensity varies inversely with the square of the distance from the source. That is, at a distance of two meters from the source the intensity is a quarter as large as it is at a distance of one foot; at three feet it is only a ninth as big as at one foot, etc. Pitch/Pitch depends on the frequency; in general, an increase in frequency causes a feeling of rising pitch. The ability to distinguish between two sounds that are close in frequency, however, decreases in the upper and lower parts of the audible frequency range. There is also variation from person to person in the ability to distinguish between two sounds of very nearly the same frequency. Some trained musicians may discover in as small a frequency as 1 or 2 Hz. Due to the way in which the hearing mechanism works, the perception of pitch of intensity is also affected. Thus when a tuning fork vibrating at 440 Hz (the frequency of A above the middle C on the piano) is brought closer to the ears, a slightly lower tone, which if the fork vibrates more slowly is heard. When the source of a sound moves at a relatively high speed, a stationary listener hears a sound louder in pitch as the source moves toward him or her, and a sound lower in pitch as the source moves away. This phenomenon, known as the Doppler effect, is due to wave nature of sound. Loudness in general, an increase in intensity will cause a feeling of increased loudness. But loudness does not increase in direct proportion to intensity. A sound of 50 dB has ten times the intensity of a sound of 40 dB, but is only twice as loud. Loudness doubles with each increase of 10 dB in intensity. Loudness is also affected by frequency, because the human ear is more sensitive to certain frequencies than to others. The threshold for hearing—the lowest sound intensity that will produce the feeling of hearing for most people—is about 0 dB in the 2,000 to 5,000 Hz frequency range. For frequencies below and above this range, sounds must have greater intensity to be heard. Thus, for example, a sound of 100 Hz is barely audible at 30 dB; a sound of 10,000 Hz is barely audible at 20 dB. At 120 to 140 dB most people experience physical discomfort or actual pain, and this level of intensity is called the threshold of pain. Ad ad