

FOCUS ON VOCABULARY AND LANGUAGE

Having *bagged* nearly all of Colorado's *tallest peaks*, *experienced climber* Aron Ralston . . . Aron Ralston was an expert mountaineer (*an experienced climber*) who had successfully climbed (*bagged*) nearly all of Colorado's highest mountains (*tallest peaks*). The remarkable story of how he cut off his own arm when it was trapped (*pinned*) under a large rock illustrates how **motivation** can energize and direct behavior.

Motivational Concepts

Arousal Theory

Curiosity drives monkeys to *monkey around* trying to figure out how to unlock a latch that opens nothing, or how to open a window that allows them to see outside their room (Butler, 1954). The expression "*monkey around*" means to play or fool around with something. Monkeys and young children have a very great need to explore and find out about their surroundings (*they are motivated or driven by curiosity*), and all humans have a strong desire to acquire new knowledge (*we humans hunger for information*). When our basic biological needs have been met, we may experience lowered arousal levels and so, according to arousal theory, we are driven to seek stimulation and increase our level of arousal to some comfortable, or optimal, state that is neither too high nor too low.

Hunger

They talked about it [food]. They daydreamed about it. They collected recipes, read cookbooks, and *feasted their eyes on tasty but forbidden food*. In this experiment, participants who were given only half their normal intake of food became lethargic (*they appeared sluggish and dull*). They focused all their thoughts on the topic of food and looked longingly at (*feasted their eyes on*) pictures of delicious but unobtainable food (*tasty but forbidden food*). The semi-starved men's preoccupation (*obsession*) with food demonstrates how motives can take over (*hijack*) conscious thought processes, and this supports Maslow's theory that there is a **hierarchy of needs**.

The Physiology of Hunger

Somehow, somewhere, your body is *keeping tabs on* the energy it takes in and the energy it uses. People and nonhuman animals naturally and automatically tend to control food intake in order to keep a relatively constant body weight. There is a tendency toward maintaining equilibrium between caloric intake and energy use (*a balancing act*). This indicates that there is a mechanism, or mechanisms, that monitors (*keeps tabs on*) energy fluctuations. Levels of the blood sugar **glucose** and certain brain chemicals may play a role in this process.

The Psychology of Hunger

Yet there is more to hunger than meets the stomach. The old saying, "*there is more to this than meets the eye*," suggests that other, not so apparent, factors may be involved in a given situation. Myers reinterprets this saying to make the point that hunger involves more than body chemicals, brain activity, and stomach reactions (*there is more to hunger than meets the stomach*). For example, research showing that amnesia patients could be fooled into eating more than one lunch suggests that part of our decision to eat may be our memory of when we last ate. As time passes, we think about eating again, and these thoughts generate (*trigger*) feelings of hunger.

When stressed, even rats find it extra rewarding to scarf *Oreos* (Artiga et al., 2007; Boggiano et al., 2005). When we are anxious, tense, or depressed, we tend to have a preference for starchy, high-carbohydrate foods, such as potato chips, candies, chocolate, or cookies (for example, *Oreos*). Such foods help increase or boost levels of the neurotransmitter serotonin in the brain, providing a calming effect. Research has shown that even rats will tend to overeat (*scarf*) cookies such as *Oreos* when stressed.

Obesity and Weight Control

Yet few overweight people *win the battle of the bulge*. Most overweight people who diet do not manage to permanently lose the many pounds of fat they want to (*they do not win the battle of the bulge*). Myers discusses a number of factors: (a) fat is easier to maintain and uses less energy than other tissue; (b) when body weight drops below the **set (or settling) point**, your hunger increases and metabolism decreases; (c) there are individual differences in resting metabolism (that is, some people with high metabolisms can eat more and not gain weight); (d) genetic influences; (e) social influences; and (f) sleep deprivation, lower levels of physical activity, and changing levels of food consumption. For those wanting to diet, Myers lists some useful tips (see *Close-Up: Waist Management*).

Pretty much everywhere this book is being read, *people have a growing problem*. This sentence has a double meaning. The phrase “*a growing problem*” can mean a problem that is getting increasingly worse. However, it can also refer to the fact that people are getting fatter and heavier (*they are growing*). Worldwide, the rates of people who are overweight and obese have continued to increase (the rate is a *growing problem*) over the past few decades; and, in most places (*pretty much everywhere*) this book is being read, people are getting fatter (*they have a growing problem*).

So why don't obese people just *drop* that *excess baggage*? Because their *bodies fight back*. In this context, “*excess baggage*” refers to the extra fat that obese people have, and extra fat around the waist is often referred to as a “*spare tire*.” One reason that overweight and obese people don't get rid of (*drop*) that extra fat (*excess baggage*) is that the body responds to dieting by lowering metabolism (*the body fights back*). Compared with muscle tissue, fat has a lower metabolic rate and takes less energy to maintain. When overweight people diet and their weight falls (*or drops*) below the previous set (or settling) point, their hunger increases and their metabolism decreases.

Our genes influence the size of our jeans. Myers is using a play on words here, suggesting that the complex interactions involved in our genetic make-up (*our genetic influences*) may influence the amount of excess weight we gain and, correspondingly, the size of the denim pants we wear (*the size of our jeans*).

What explains this *growing problem*? Many of the foods and sweetened beverages (*fast foods, junk foods, candy, soda*) we consume, along with sleep deprivation and physical inactivity, contribute to obesity (*our growing problem*) as well as other health-related issues that endanger the well-being of the population. Myers uses humor to make a point about the problems associated with obesity, referring, or alluding, to *growing problem . . . eighteen-inch butts . . . Big Apple bottoms . . . the “bottom” line . . . waist management . . . and In the end, today's people need more room*.

New York City, facing a large problem with *Big Apple bottoms*, has mostly replaced 17.5-inch *bucket-style subway seats* with *bucketless seats* (Hampson, 2000). New York City is known as the *Big Apple*. Myers notes that the city has replaced the smaller individual 17.5-inch rounded seats (*bucket-style seats*) common on underground trains (*the subway*) with bench-style seats (*bucketless*

seats). This has been done to accommodate the larger-sized buttocks of New Yorkers (their *Big Apple bottoms*).

Close-Up: Waist Management

American idle: Couch Potatoes beware—TV watching correlates with obesity Research shows that people who have a sedentary lifestyle and spend much of their time sitting around watching TV (*couch potatoes*) are more likely to be overweight or obese. In addition, spending time on computers or similar technological devices (*other screen time*) reduces physical activity (*it keeps your motor idling*), which can add to the obesity problem. Myers humorously emphasizes the point about our lack of physical activity with the title “*American idle*” (rather than *American Idol*, a popular TV show).

The Need to Belong

The Benefits of Belonging

Familiarity breeds liking, not contempt. “*Familiarity breeds contempt*” is an old saying that suggests that gaining intimate knowledge (*familiarity*) about others leads to disdain, dislike, or scorn (*contempt*) for them. Myers points out that the opposite seems to be true. When we are put in a situation that forces us to mix with other people (*when we are thrown together in groups*) at school, work, or under other circumstances, we tend to be drawn or attracted to others (*we behave like magnets, moving closer*) and to develop connections or relationships (*to form bonds*). The more we get to know people the more likely it is that we will become fond of them, form attachments, and resist breaking these social ties (*familiarity breeds liking*).

The Pain of Being Shut Out

Or perhaps others *gave you the silent treatment*, avoided you, looked away, *mocked* you, or *shut you out* in some other way. For both adults and children, to be ignored (*shut out* or *shunned*), to be treated with disdain and made fun of (*mocked*), or to be deprived of verbal interaction with others (*given the silent treatment*) is very distressing and upsetting. This type of social exclusion (*ostracism*) makes us feel isolated and abandoned (*it threatens our need to belong*) and can lead to depression, withdrawal, and deadened feelings (*emotional numbness*). Psychologically, the pain of social isolation and rejection is experienced with the same emotional unpleasantness and the same increased brain activity that is associated with (*that marks*) physical pain (*ostracism is a real pain*).

Connecting and Social Networking

Narcissism is self-esteem gone wild. *Narcissistic* people are self-important, self-focused, and self-promoting. Here, Myers is suggesting that *narcissism* is an extreme and excessive level of normal self-esteem (*self-esteem gone wild*). Those who have high *narcissism* scores on personality tests are particularly active on social networking sites, where they tend to overindulge their self-centeredness by doing such things as collecting more superficial “friends” or by offering more enhanced (*staged*), glamorous photos.

For narcissists, social networking sites are more than a gathering place; they are a *feeding trough*. A *feeding trough* is a long narrow open container where farm animals can eat as much of the available food or water as they desire. Like farm animals that overeat or gorge at the food trough, narcissists use social networking sites for promoting their own importance rather than for meeting and connecting with others (*a gathering place*).

And in your own *postings*, practice the golden rule. The golden rule is the guiding principle that advises us to be considerate of others and treat them in the same manner that we would wish to be treated ourselves. When you write something online (*posting*) consider whether it is something you'd be interested in reading if someone else wrote (*posted*) it (*practice the golden rule*).

Emotion: Arousal, Behavior, and Cognition

In an instant, *the arousal of terror spilled into ecstasy*. In this anecdote, when Myers finally located his lost child (*toddler*) in the store, his apprehension and fear (*the arousal of terror*) transformed (*spilled*) into heightened and intense feelings of happiness (*ecstasy*), and he was overcome with positive emotions (*he was awash in grateful joy*). This story illustrates the various components of **emotion**—bodily (*physiological*) arousal, expressive behaviors, and consciously experienced thoughts and feelings.

Our heart races. Our pace quickens. Emotions exist to aid us in our survival. They focus our attention and give us energy to take action when we are challenged—our heartbeat accelerates (*our heart races*) and we walk faster (*our pace quickens*). Confronted with unexpected good news, we may start to cry and shed tears (*we may find our eyes tearing up*). Emotions are our body's adaptive response.

A chicken-and-egg debate . . . The old riddle asks, “Which came first, the chicken or the egg?” Myers asks which comes first, bodily (*physiological*) arousal or emotional feelings? Furthermore, how do thinking (*cognition*) and feelings interact? To determine how the three components of emotion (*bodily arousal, expressive behaviors, and conscious experience*) fit together, psychologists need to answer these two questions.

Historic Emotion Theories

Common sense tells most of us that we cry because we are sad, *lash out* because we are angry, *tremble* because we are afraid. The **James-Lange theory** states that bodily arousal precedes the experience of emotion. Thus, first we cry, then we feel sad; first we strike someone (*lash out*), then we experience anger; first we shiver and shake (*tremble*), then we feel fear. In contrast, the **Cannon-Bard theory** proposes that bodily responses and the experience of emotion occur at the same time, but separately; one does not cause the other. Most researchers now agree that our emotions also involve cognitions.

These men reported increases in *weeping, lumps in the throat, and getting choked up* when *saying good-bye, worshiping, or watching a touching movie*. For emotions expressed mostly in body areas above the neck, people with *high spinal cord injuries* reported more intense reactions, such as crying (*weeping*), becoming inarticulate (having *lumps in the throat*), and being overcome emotionally (*getting choked up*) when participating in religious ceremonies (*worshiping*), parting company (*saying good-bye*), or viewing a sentimental film (*watching a touching movie*). On the other hand, emotional intensity for most other feelings decreased substantially—especially if they involved body areas below the neck. A feeling of extreme annoyance (*anger*) did not have the emotional intensity it once had (*it “just didn’t have the heat to it that it used to”*) and was experienced in a more intellectual way (*“it’s a mental kind of anger”*). This provides partial support for the James-Lange theory, which proposes that physical reactions are important in the experience of emotions. Nevertheless, cognitions are believed to be involved in our emotional reactions.

Schachter-Singer Two-Factor Theory: Arousal + Label = Emotion

. . . *testy* . . . This means to be ill-tempered or irritable. Those college men who were physiologically aroused, but who did not know the reason for their arousal, were affected by (“*caught*”) the apparent emotional state of the person they were with. They made different attributions about their aroused (*stirred-up*) state (for example, “I’m happy” or “I’m feeling *testy*”) on the basis of whether the accomplice acted in a euphoric or irritated way.

“Feelings that one interprets as fear in the presence of a *sheer drop* may be interpreted as *lust* in the presence of a *sheer blouse*” (Gilbert, 2006). Two different meanings of the word “*sheer*” contribute to the humor of this quote. A *sheer drop* is a very steep, downward slope that, if interpreted as dangerous, may produce feelings of intense anxiety. On the other hand, a *sheer blouse* is a very thin almost transparent female garment—the sight of a woman wearing such a see-through (*sheer*) shirt can arouse feelings that may be interpreted as sexual desire (*lust*). An emotion such as arousal (*a stirred-up state*) can be experienced in very different ways depending on how we interpret and label it. As Myers notes, arousal can stimulate (*fuel*) emotion, but cognition gives it direction (*channels it*).

Zajonc, LeDoux, and Lazarus: Emotion and the Two-Track Brain

Is the *heart* always subject to the *mind*? Robert Zajonc proposed that some emotional states are not preceded by cognitions. The emotions (*heart*) are not determined by our thoughts (*mind*) and we can have *some* feelings (*especially simple likes, dislikes, and fears*) without conscious thinking. These responses may reflect the automatic or unconscious processing that takes place in our two-track mind).

The amygdala’s structure makes it easier for our feelings to *hijack* our thinking than for our thinking to *rule* our feelings (LeDoux & Armony, 1999). Some neural pathways go from the ear or eye via the thalamus to the amygdala, an emotion control center. These pathways (*neural shortcuts*) detour around (*bypass*) the cortical areas involved in thinking (*the speedy low road*). This makes it possible to have extremely rapid (*greased-lightning*) emotional responses before cognitive factors become involved. Thus, our feelings can take over (*hijack*) our thinking, instead of our thinking controlling (*ruling*) our emotions.

Embodied Emotion

The Physiology of Emotions

So do we, like *Pinocchio*, give off *telltale signs* when we lie? *Pinocchio* is a fictional character in a children’s story whose nose grows longer every time he tells a lie. The **polygraph**, or *lie detector*, does not detect lies; rather, it measures a number of physiological reactions such as breathing, cardiovascular activity, and perspiration (*telltale signs*), which indicate a change in emotional state. Unlike *Pinocchio*, when people are given a standard polygraph test, they display no reliable or valid indicators of whether they are lying or telling the truth (there are no *telltale signs*). *Guilty knowledge tests*, which assess a person’s physiological responses to crime-scene details known only to the police and the guilty person, are more accurate.

Expressed and Experienced Emotion

Detecting Emotion in Others

Most of us *read nonverbal cues* fairly well. We communicate our feelings with words (*verbally*) and through body language (*nonverbally*). Without hearing a single word, we can discern much about someone's emotional state by observing (*reading*) his or her bodily actions and facial expressions. As Myers notes, when we look at a large group of faces, a single angry face will be extremely noticeable (*it "pops out"*) and will be detected more quickly than a single happy face.

. . . *slapstick comedy* . . . The humor in *slapstick comedy* is derived from fast physical actions and obvious jokes rather than language and verbal nuances. Women are more likely than men to express their feelings and identify with others (*to have empathy*) while watching a variety of films, such as those that are sad, happy (for example, *slapstick comedies*), or frightening.

Culture and Emotional Expression

Ditto for anger, and to a lesser extent the other basic expressions (Elfenbein & Ambady, 1999). People, regardless of their cultural backgrounds or their racial or ethnic origins, are very consistent when they are asked to categorize different facial expressions as happy, sad, disgusted, surprised, or fearful. They do equally well for anger (*ditto for anger*).

A *sneer*, for example, retains elements of an animal's baring its teeth in a *snarl*. Darwin believed that all humans inherited the ability to express emotions through very similar facial expressions. Thus, a person's scornful or contemptuous grimace (*sneer*) shares many aspects of the fierce growl with teeth showing (*snarl*) typical of dogs and other animals. Emotional expressions are one form of social communication.

The Effects of Facial Expressions

Fake a big grin. Now scowl. Can you feel the "*smile therapy*" difference? Clearly, our mood affects how we look, but here Myers is inviting you to test the idea that your facial expression can affect your mood. First, make a large, false smile (*fake a big grin*). Next, wrinkle or furrow your brow, frown and look sullen (*scowl*). People in numerous experiments felt different emotions under each condition. Smile and inside you feel happy (it is like "*smile therapy*"); scowl and you may see the world as more miserable than it is. This tendency for facial muscle states to elicit matching emotional states is called the **facial feedback effect**.

Nervous about *an upcoming date*, we feel *stomach butterflies*. Anxious over *public speaking*, we *head for the bathroom*. *Smoldering* over a family conflict, we get a *splitting* headache. If we are apprehensive and fearful before a social outing or get together (*an upcoming date*), we may experience internal sensations that may feel as though small flying insects (*butterflies*) are fluttering around in our stomach (*we feel stomach butterflies*). Likewise, the prospect of talking to a group of people (*public speaking*) may create an urgent need to use the toilet (*we head for the bathroom*), and being quietly angry (*smoldering*) can give rise to a painful (*splitting*) headache. Our psychological emotions are linked or associated with our physical reactions (*they go hand in hand* or *they come equipped with physical reactions*).