13

CHAPTER THIRTEEN

Treatment of Psychological Disorders

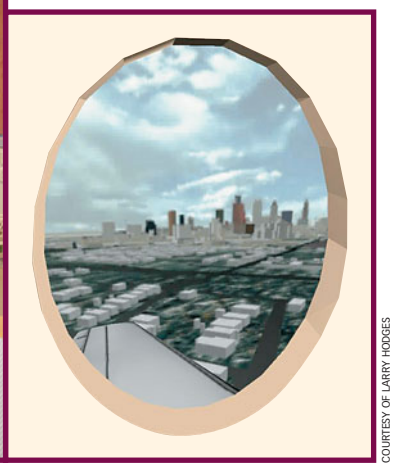
THE PLANE WAS STILL AT THE GATE, BUT Lisa was buckled in her seat with her hands tightly squeezing the armrests, her knuckles white. She glanced out the window, swallowed hard, and then stole a look at the people across the aisle. They seemed calm, but she didn't feel calm at all. Her heart was pounding, and then she noticed that the plane was starting to move. She was deathly afraid of flying, but she hoped that this flight might be easier. After all, she wasn't really in a plane. Instead, she was seated in a psychologist's office, wearing virtual

ROZA/DREAMSTIME.COM

reality goggles that projected the sights and sounds of the flight all around her. She was in therapy.

Psychological therapy takes many forms. In this case, Lisa's fear was being treated with a relatively new technique called *virtual reality therapy*. The therapist sat nearby during the virtual flight and encouraged Lisa to progress at her own pace through the stages of air travel that made her anxious—sitting on a plane with the engines off, sitting on a plane with the engines on, taxiing on the runway, a smooth takeoff and a smooth flight, a smooth landing, a close pass similar to a missed landing, a rough landing, a turbulent flight, and a rough takeoff. Lisa came back for six sessions over several weeks, and at the end of her virtual travels she reported feeling no anxiety about any of these virtual events. With the therapist's encouragement, she soon took the step of flying in a real plane (Rothbaum et al., 1996). ■

COURTESY CHARLES VAN DER MAST/ DELFT UNIVERSITY OF TECHNOLOGY



COURTESY OF LARRY HODGES

Virtual reality therapy offers new possibilities for treating people with psychological disorders, especially phobias. Clients can practice engaging in "virtual experiences" before tackling the real-life experiences they fear. On the left is a therapist conducting a virtual flight, on the right, the client's virtual "view" out the "plane" window.

There are a number of ways to treat most psychological disorders, with the goal of changing a person's thoughts, behaviors, emotions, or coping skills. Treatments requiring a person to wear wraparound video goggles are not yet commonplace, but the variety and ingenuity of goggle-free treatment techniques is remarkable. In this chapter, we will explore the most common approaches to psychological treatment. We will examine why people need to seek psychological help in the first place, and then explore how psychotherapy for individuals is built on the major theories of the causes and cures of disorders—including psychoanalytic, behavioral, cognitive, and humanistic/existential theories—and explore how psychotherapy can be conducted for people in groups as well. We'll look into medical and biological approaches to treatment that focus on understanding the brain's role in disorders. Finally, we will discuss whether treatment works, as well as how we know that treatment works.

Treatment: Getting Help to Those Who Need It

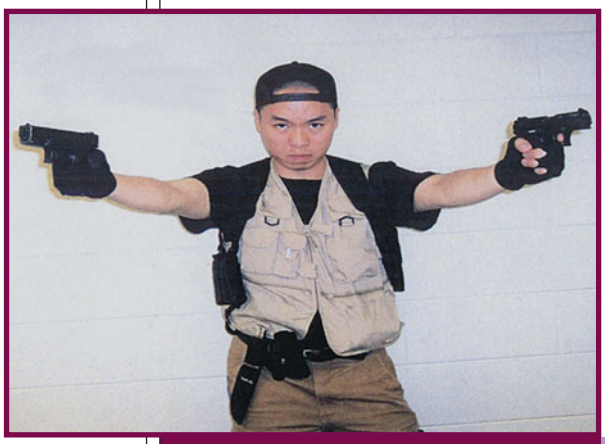
Estimates suggest that almost one in five people suffers from some type of mental disorder (Narrow et al., 2002). The personal costs of these disorders involve anguish to the sufferers as well as interference in their ability to carry on the activities of daily life. Think about Lisa, our fearful flyer. If she did not (or could not) seek treatment, she would be unable to take advantage of air travel—but there's more. Some people with fear of airplanes develop difficulty with simple day-to-day tasks due to a disabling fear of encountering anything that could even remind them of airplanes. Watching an airplane trip on television might be too much to bear, and even the sound of airplanes flying overhead could be so frightening as to keep the person at home all the time.

What are some of the personal, social, and financial costs of mental illness?

Beyond the personal costs, the social burdens associated with mental disorders are also enormous. For example, people with anxiety disorders report levels of impairment in their daily lives that are comparable to or higher than those of people with chronic medical illnesses, such as multiple sclerosis or end-stage renal disease (Antony, Roth, et al., 1998). Impairment is widespread, affecting family life, the ability to work, maintenance of friendships, and more. A person with schizophrenia or severe depression may be unable to hold down a job or even get organized enough to collect a welfare check, and people with many disorders stop getting along with family

or people who are trying to help. At the extreme, victims of some disorders can become violent and dangerous to themselves or others.

There are financial costs, too. One set of calculations found that the annual financial burden of anxiety disorders alone in the United States was $42.3 billion, or $1,542 per sufferer, including costs of treatment, diminished productivity, and absenteeism in the workplace (Greenberg et al., 1999). If we add in similar figures for schizophrenia, mood disorders, substance abuse, and all the other psychological problems, the overall costs are astronomical. In addition to the personal benefits of treatment, then, society also stands to benefit from the effective treatment of psychological disorders.



UPI PHOTO/HO/NBC NEWS/NEWSCOM

Cho Seung-Hui slaughtered 32 people at Virginia Tech University in 2007 and then killed himself. He sent an angry, rambling manifesto and videos of himself to the media. Posing with guns, he said, "Jesus was crucifying me. When the time came, I did it. I had no choice. . . . This didn't have to happen." Cho was clearly mentally ill, and effective treatment might have saved these lives.

Why People Cannot or Will Not Seek Treatment

Despite the high prevalence of psychological problems in the general population, most people who suffer from such problems do not receive help. One national survey of more than 1,600 adults diagnosed with depression or an anxiety disorder found that only 30% received appropriate treatment for the problem—despite the fact that 83% had seen a health care provider in the previous year (in most cases, a family doctor) (Young et al., 2001). People may fail to get treatment because of three major problems:

What are the obstacles to help/treatment for the mentally ill?

1. *People may not realize that their disorder needs to be treated.* Mental illness is often not taken nearly as seriously as physical illness, perhaps because the origin of mental illness is "hidden" and usually cannot be diagnosed by a blood test or x-ray. The stigma of mental illness often includes beliefs that mental problems can be solved by "mind over matter." In other words, some people believe that mental illness is a sign of personal weakness or that people suffering from mental illness are not trying hard enough to help themselves.
2. *There may be barriers to treatment, such as beliefs and circumstances that keep people from getting help.* Individuals may believe that they should be able to handle things themselves. In some cases, families discourage their loved ones from seeking help because the public acknowledgment of a psychological disorder may be seen as an embarrassment to the family. In other cases, there may be financial obstacles to getting treatment, such as lack of medical insurance that covers treatment for mental health disorders. Barriers may even arise from treatment providers or facilities themselves, including such factors as long waiting lists, lack of funding for adequate staffing, or lack of staff education about the most up-to-date treatments. Cultural and gender factors may also affect who seeks treatment and who does not. For example, one study of college students found that being male predicted negative attitudes toward seeking psychological help, suggesting that men may be less likely than women to seek psychological services (Komiya, Good, & Sherrod, 2000).
3. *Even people who acknowledge they have a problem may not know where to look for services.* Like finding a good lawyer or plumber, finding the right psychologist can be more difficult than simply flipping through the yellow pages or searching online. This confusion is understandable given the plethora of different types of treatments available.

   Even when people seek and find help, they sometimes do not receive the most effective treatments, which further complicates things (see the Real World box on page 400). For example, although cognitive and behavioral therapies yield the best results for treating anxiety disorders, most people do not receive these treatments. In one study, most individuals seeking help in a clinic specializing in anxiety disorders reported having previously received treatments other than cognitive or behavioral therapy for their anxiety problems even though there is little evidence

ADRI BERGER/GETTY IMAGES

There's nothing funny about depression.

[THE REAL WORLD]

Types of Psychotherapists

Therapists have widely varying backgrounds and training, and this affects the kinds of services they offer. There are several major "flavors":

- **Psychologist** A psychologist who practices psychotherapy holds a doctorate with specialization in clinical psychology (a Ph.D. or Psy.D.). This degree takes about 5 years to complete, and the psychologist will have extensive training in therapy, the assessment of psychological disorders, and research. The psychologist will sometimes have a specialty, such as working with adolescents or helping people overcome sleep disorders, and will usually conduct therapy that involves talking. Psychologists must be licensed by the state, and most states require candidates to complete about 2 years of supervised practical training and a competency exam.
- **Psychiatrist** A psychiatrist is a medical doctor who has completed an M.D. with specialized training in assessing and treating mental disorders. Psychiatrists can prescribe medications, and some also practice psychotherapy. General practice physicians can also prescribe medications for mental disorders and often are the first to see people with such disorders because people consult them for a wide range of health problems. However, general practice physicians do not typically receive much specialized training in the diagnosis or treatment of mental disorders, and they do not practice psychotherapy.
- **Social worker** A social worker has a master's degree in social work and has training in working with people in dire life situations such as poverty, homelessness, or family conflict. Clinical or psychiatric social workers also receive special training to help people in these situations who have mental disorders. Social workers often work in government or private social service agencies, and they also may work in hospitals or have a private practice.
- **Counselor** Counselors have a wide range of training. To be a counseling psychologist, for example, requires a doctorate and practical training; the title uses that key term *psychologist* and is regulated by state laws. But states vary in how they define *counselor.* In some cases, a counselor must have a master's degree and extensive training in therapy, whereas in others, this person may have minimal training or relevant education. Counselors who work in schools usually have a master's degree and specific training in counseling in educational settings.

Some people offer therapy under made-up terms that sound professional—"mind/body healing therapist," for example, or "marital adjustment adviser." Often these terms are simply invented to mislead clients and avoid licensing boards, and the "therapist" may have no training or expertise at all. And, of course, there are a few people who claim to be licensed practitioners who are not: Louise Wightman, who had once worked as stripper "Princess Cheyenne," was convicted of fraud in 2007 after conducting psychotherapy as a psychologist with dozens of clients. She claimed she didn't know the Ph.D. degree she had purchased over the Internet was bogus (Associated Press, 2007).

People who offer therapy may be well meaning and even helpful, but they could do harm too. For these reasons, it's important that a person seeking therapy shops wisely for a therapist whose training and credentials reflect expertise and inspire confidence. Such therapists can be found by referral from a general practice physician or school counselor, by visiting a college clinic or hospital, or by contacting an Internet site of an organization such as the American Psychological Association that offers referrals to licensed mental health care providers.

The therapist's personality and approach can sometimes be as important as his or her background or training. If you are shopping for a therapist, you should seek out someone who is willing and open to answer questions, who has a clear understanding about the type of problem leading you to seek therapy, and who shows general respect and empathy for you. A therapist is someone you are entrusting with your mental health, and you should only enter into such a relationship when you and the therapist have good rapport.

Which one? Finding the right psychotherapist can seem like finding the best watermelon: You won't really know until you've had a taste. Shoppers sometimes thump melons on the theory that the sweetest ones sound different, but no one quite knows how a good one will sound. In the case of psychotherapists, fortunately, no thumping is required. You can find out about their qualifications in advance and even talk to several to see which one seems right.

for the effectiveness of these other approaches for anxiety disorders. Only about a third of people reported previously receiving the treatment approaches most strongly supported by prior research (Rowa et al., 2000). Clearly, before choosing or prescribing a therapy, we need to know what kinds of treatments are available and understand which treatments are best for particular disorders.

Approaches to Treatment

Treatments can be divided broadly into two kinds: psychotherapy, in which a person interacts with a psychotherapist, and medical or biological treatments, in which the mental disorder is treated with drugs or surgery. In some cases, both psychotherapy *and* biological treatments are used. Lisa's fear of flying, for example, might be treated not only with the virtual reality therapy you read about (a form of psychotherapy) in preparation for the real flight but also with antianxiety medications in the hours before the actual takeoff. For many years, psychotherapy was the main form of treatment for psychological disorders because few medical or biological options were available. But alongside psychotherapy, there have always been folk remedies that depend on biology. As we learn more about the biology and chemistry of the brain, approaches to mental health that begin with the brain are becoming increasingly widespread. As you'll see later in the chapter, often the most effective treatments combine both psychotherapy and medications.

Culture & Community

Is Psychotherapy the Same around the World?

Not at all. Some psychotherapies are indigenous to particular cultures. For example, two well-known therapies influenced by Buddhism originated in Japan: Morita therapy and Naikan therapy (Sato, 2001).

Morita therapy instructs patients that feelings cannot be changed and are to be accepted. Actions can be taken to achieve goals, in spite of feelings, and these actions may in turn increase positive feelings.

In Naikan, patients are asked to think about what they can do for others. They examine instances of care and benevolence they received from another person, recollect memories of what they returned to that person, and recall any trouble or worries they have given to that person. The goal of Naikan therapy is to have patients realize their indebtedness to their significant others, their mothers, in particular.

COURTESY OF REN ADAMS

COURTESY OF MISSOURI STATE ARCHIVES

Patients in steam cabinets, about 1910. Without a clue about how to proceed, early mental health workers gave patients steam baths as a form of treatment for psychological disorders in the forlorn hope that something might work.

summary quiz [13.1]

1. Which of the following statements is true?
   a. Mental illness is very rare, with only 1 person in 100 suffering from a psychological disorder.
   b. The majority of individuals with psychological disorders seek treatment.
   c. Women and men are equally likely to seek treatment for psychological disorders.
   d. Mental illness is often not taken as seriously as physical illness.

2. Your textbook lists three reasons why people may fail to get treatment for psychological disorders. Which of the following is *not* one of these reasons?
   a. People may be unaware that they have a problem.
   b. People may be aware that most treatments are ineffective.
   c. People face obstacles to getting treatment.
   d. People may not know where to look for treatment.

3. The most effective treatment for psychological disorders often is
   a. psychotherapy.
   b. medication.
   c. a combination of psychotherapy and medication.
   d. doing nothing, since most people improve anyway.

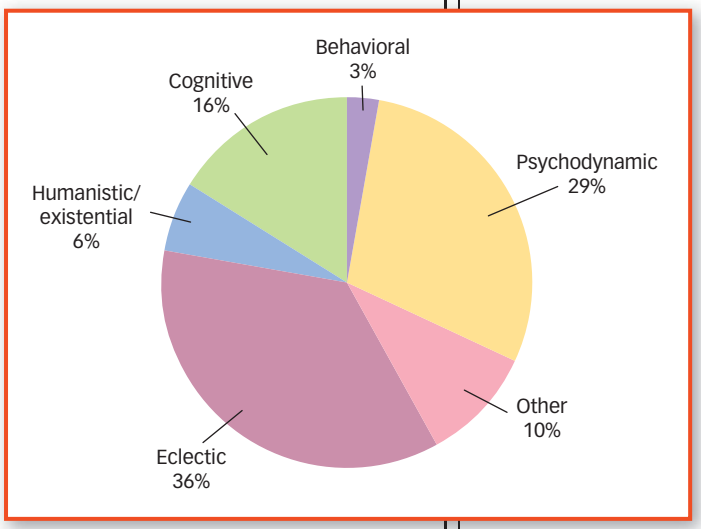


FIGURE 13.1
Approaches to Psychotherapy in the 21st Century *This chart shows the percentage of psychologists (from among 1,000 members of the American Psychological Association's Division of Psychotherapy) who have various primary psychotherapy orientations (adapted from Norcross et al., 2002).*

Psychological Therapies: Healing the Mind through Interaction

Psychological therapy, or **psychotherapy**, is *an interaction between a therapist and someone suffering from a psychological problem, with the goal of providing support or relief from the problem.* Currently over 400 different systems of psychotherapy exist. Although there are similarities among all the psychotherapies, each approach is unique in its goals, aims, and methods. A recent survey of 1,000 psychotherapists asked them to describe their main theoretical orientation (Norcross, Hedges, & Castle, 2002; see **FIGURE 13.1**). Over a third reported using **eclectic psychotherapy**, a form of psychotherapy that involves *drawing on techniques from different forms of therapy, depending on the client and the problem.* This allows the therapists to apply an appropriate theoretical perspective that is suited to the problem at hand rather than adhering to a single theoretical perspective for all clients and all types of problems. Nevertheless, as **FIGURE 13.1** shows, the majority of psychotherapists use a single approach, such as psychodynamic therapy, behavioral and cognitive therapies, humanistic and existential therapies, or group therapy. We'll examine each of those four major branches of psychotherapy in turn.

Psychodynamic Therapy

Psychodynamic psychotherapy has its roots in Freud's psychoanalytically oriented theory of personality (see Chapter 11). **Psychodynamic psychotherapies** *explore childhood events and encourage individuals to use this understanding to develop insight into their psychological problems.* There are a number of different psychodynamic therapies that can vary substantially, but they all share the belief that the path to overcoming psychological problems is to develop insight into the unconscious memories, impulses, wishes, and conflicts that are assumed to underlie these problems. Psychodynamic therapies include psychoanalysis and modern psychodynamic therapy, such as interpersonal psychotherapy.

● What is the commonly held belief behind all psychodynamic therapies?

In traditional psychoanalysis, the patient lies on a couch, with the therapist sitting behind, out of the patient's view. This also happens in the comics.

Psychoanalysis

As you saw in Chapter 11, *psychoanalysis* assumes that humans are born with aggressive and sexual urges that are repressed during childhood development through the use of defense mechanisms. Psychoanalysts encourage their clients to bring these repressed conflicts into consciousness so that the clients can understand them and reduce their unwanted influences. Psychoanalysts focus a great deal on early childhood events because they believe that urges and conflicts were likely to be repressed during this time.

Traditional psychoanalysis takes place over an average of 3 to 6 years, with four or five sessions per week (Ursano & Silberman, 2003). During a session, the client reclines on a couch, facing away from the analyst, and is asked to express whatever thoughts and feelings come to mind. Occasionally, the analyst may comment on some of the information presented by the client, but the analyst does not express his or her values and judgments. The stereotypic image you might have of psychological therapy—a person lying on a couch talking to a person sitting in a chair—springs from this approach.

How to Develop Insight

The goal of psychoanalysis is for the client to understand the unconscious in a process Freud called developing insight. A psychoanalyst can use several key techniques to help the client develop insight, including these:

Free association. In free association, the client reports every thought that enters the mind, without censorship or filtering. This strategy allows the stream of consciousness to flow unimpeded. If the client stops, the therapist prompts further associations ("And what does that make you think of?"). The therapist may then look for themes that recur during therapy sessions.

Dream analysis. Psychoanalysis treats dreams as metaphors that symbolize unconscious conflicts or wishes, and that contain disguised clues that the therapist can help the client understand. A psychoanalytic therapy session might begin with an invitation for the client to recount a dream, after which the client might be asked to participate in the interpretation by freely associating to the dream.

Interpretation. This is the process by which the therapist deciphers the meaning (e.g., unconscious impulses or fantasies) underlying what the client says and does. Interpretation is used throughout therapy, during free association, dream analysis, and in other aspects of the treatment. During the process of interpretation, the analyst suggests possible meanings to the client, looking for signs that the correct meaning has been discovered. Unfortunately, a correct interpretation is usually not accompanied by giant flashing neon lights. The analyst could overinterpret the client's thoughts and emotions and sometimes even contribute interpretations that are far from the truth. For example, the discovery that a client had a traumatic sexual experience with a visiting relative as a child might seem so important to the analyst that it could suggest a way of understanding many of the client's dreams and associations. But this particular event actually might *not* be the basis of the client's unconscious conflicts, in which case the therapist would be directing the client to an insight that is really no insight at all.

"I'll say a normal word, then you say the first sick thing that pops into your head."

Analysis of resistance. In the process of "trying on" different interpretations of the client's thoughts and actions, the analyst may suggest an interpretation that the client finds particularly unacceptable. **Resistance** is *a reluctance to cooperate with treatment for fear of confronting unpleasant unconscious material*. For example, the therapist might suggest that the client's problem with obsessive health worries could be traced to a childhood rivalry with her mother for her father's love and attention. The client could find the suggestion insulting and fervently resist the interpretation. Curiously, the analyst might interpret this resistance as a signal not that the interpretation is wrong but instead that the interpretation is on the right track. If a client always shifts the topic of discussion away from a particular idea, that might signal to the therapist that this is indeed an issue on which the client could be directed to confront in order to develop insight.

● **What might a client's resistance signal to a therapist?**

The Process of Transference

These psychoanalytic techniques may be used over the course of an intensive and lengthy process of analysis. During this process, the client and psychoanalyst often develop a close relationship. Freud noticed this relationship developing in his analyses and was at first troubled by it: Clients would develop an unusually strong attachment to him, almost as though they were viewing him as a parent or lover, and he worried that this could interfere with achieving the goal of insight. Over time, however, he came to believe that the development and resolution of this relationship was a key process of psychoanalysis.

Transference occurs *when the analyst begins to assume a major significance in the client's life and the client reacts to the analyst based on unconscious childhood fantasies*. Successful psychoanalysis involves analyzing the transference so that the client understands this reaction and why it occurs. In fact, insight, the ultimate goal of psychoanalysis, may be enhanced because interpretations of the client's interaction with the therapist also have implications for the client's past and future relationships (Andersen & Berk, 1998).

ONLY HUMAN

PSYCHO-BEAR-APY? The Central Park Zoo revealed in 1994 that it had paid an animal behaviorist $25,000 for psychotherapy for Gus, its 9-year-old polar bear who was involved in various repetitive behaviors, which the zoo director said could have been a mild neurosis. The behaviorist recommended creating games to make Gus's life less monotonous.

psychotherapy An interaction between a therapist and someone suffering from a psychological problem, with the goal of providing support or relief from the problem.

eclectic psychotherapy Treatment that draws on techniques from different forms of therapy, depending on the client and the problem.

psychodynamic psychotherapies A general approach to treatment that explores childhood events and encourages individuals to develop insight into their psychological problems.

resistance A reluctance to cooperate with treatment for fear of confronting unpleasant unconscious material.

transference An event that occurs in psychoanalysis when the analyst begins to assume a major significance in the client's life and the client reacts to the analyst based on unconscious childhood fantasies.

FREUD MUSEUM, LONDON

Sigmund Freud, with his mother, Amalia, on her 90th birthday.

Beyond Psychoanalysis

Although Freud's insights and techniques are fundamental, modern psychodynamic theory reflects the contributions of many who followed, including several of Freud's students who broke away from him and developed their own approaches to psychotherapy. Carl Jung (1875–1961) and Alfred Adler (1870–1937) agreed with Freud that insight was a key therapeutic goal but disagreed that insight usually involves unconscious conflicts about sex and aggression (Arlow, 2000). Instead, Jung emphasized what he called the *collective unconscious,* the culturally determined symbols and myths that are shared among all people that, he argued, could serve as a basis for interpretation beyond sex or aggression. Adler believed that emotional conflicts are the result of perceptions of inferiority and that psychotherapy should help people overcome problems resulting from inferior social status, sex roles, and discrimination.

● **In what common ways do other psychodynamic theories differ from Freudian analysis?**

Other analysts to break with Freud were Melanie Klein (1882–1960), who believed that primitive fantasies of loss and persecution (e.g., worrying about a parent dying or about being bullied) were important factors underlying mental illness, and Karen Horney (1885–1952), who disagreed with Freud about inherent differences in the psychology of men and women and traced such differences to society and culture rather than biology. All of these approaches to psychotherapy stress that the individual is part of a larger society and that conflicts can reflect the individual's role in that society.

These social themes have been developed most explicitly in **interpersonal psychotherapy (IPT),** *a form of psychotherapy that focuses on helping clients improve current relationships* (Weissman, Markowitz, & Klerman, 2000). Therapists using IPT try to focus treatment on the person's interpersonal behaviors and feelings. They pay particular attention to the client's grief (an exaggerated reaction to the loss of a loved one), role disputes (conflicts with a significant other), role transitions (changes in life status, such as starting a new job, getting married, or retiring), or interpersonal deficits (lack of the necessary skills to start or maintain a relationship). The treatment focuses on interpersonal functioning with the assumption that, as interpersonal relations improve, symptoms will subside.

interpersonal psychotherapy (IPT) A form of psychotherapy that focuses on helping clients improve current relationships.

behavior therapy A type of therapy that assumes that disordered behavior is learned and that symptom relief is achieved through changing overt maladaptive behaviors into more constructive behaviors.

token economy A form of behavior therapy in which clients are given "tokens" for desired behaviors, which they can later trade for rewards.

exposure therapy An approach to treatment that involves confronting an emotion-arousing stimulus directly and repeatedly, ultimately leading to a decrease in the emotional response.

systematic desensitization A procedure in which a client relaxes all the muscles of his or her body while imagining being in increasingly frightening situations.

cognitive therapy A form of psychotherapy that involves helping a client identify and correct any distorted thinking about self, others, or the world.

Behavioral and Cognitive Therapies

Unlike psychodynamic psychotherapy, which emphasizes early developmental processes as the source of psychological dysfunction, behavioral and cognitive treatments emphasize the current factors that contribute to the problem—maladaptive behaviors and dysfunctional thoughts.

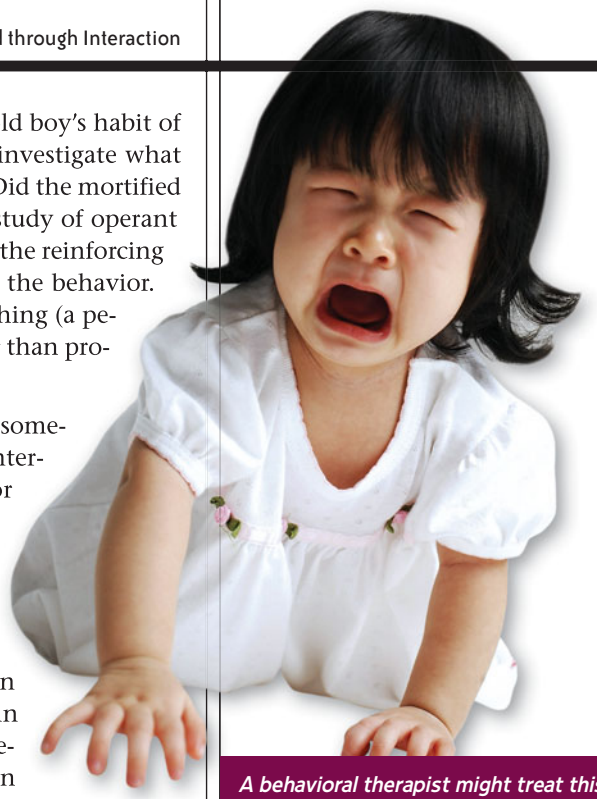
Behavior Therapy

The idea of focusing treatment on the client's behavior rather than the client's unconscious was inspired by behaviorism. As you read in Chapter 1, behaviorists rejected theories that posited "invisible" mental properties that were difficult to test and impossible to observe. Behaviorists found psychoanalytic ideas particularly hard to test: How do you know whether a person has an unconscious conflict or whether insight has occurred? Behavioral principles, in contrast, focused solely on behaviors that could be observed (e.g., avoidance of a feared object, such as refusing to get on an airplane). **Behavior therapy** assumes that *disordered behavior is learned and that symptom relief is achieved through changing overt maladaptive behaviors into more constructive behaviors.* A variety of behavior therapy techniques have been developed for many disorders, based on the learning principles you encountered in Chapter 6—including operant conditioning procedures (which focus on reinforcement and punishment) and classical conditioning procedures (which focus on extinction). Here are three examples of behavior therapy techniques in action:

● **What primary problem did behaviorists have with psychoanalytic ideas?**

Eliminating unwanted behaviors. How would you change a 3-year-old boy's habit of throwing tantrums at the grocery store? A behavior therapist might investigate what happens after the tantrum: Did the child get candy to "shut him up"? Did the mortified parent provide a lot of attention, begging the child to be quiet? The study of operant conditioning shows that behavior can be predicted by its *consequences* (the reinforcing or punishing events that follow). Adjusting these might help change the behavior. Making the consequences less reinforcing (no candy) and more punishing (a period of time-out in the car while the parent watches from nearby rather than providing a rush of attention) could eliminate the problem behavior.

Promoting desired behaviors. In a psychiatric hospital, patients may sometimes become unresponsive and apathetic, withdrawing from social interaction and failing to participate in treatment programs. A behavior therapy technique sometimes used in such cases is the **token economy**, which involves *giving clients "tokens" for desired behaviors, which they can later trade for rewards*. Tokens for behaviors such as cleaning their rooms, getting exercise, or helping other patients signal positive reinforcement because they can be exchanged for rewards such as time away from the hospital, television privileges, and special foods. Token economies have proven to be effective while the system of rewards is in place, but the learned behaviors are not usually maintained when the reinforcements are discontinued (Glynn, 1990). Similar systems used in classrooms to encourage positive behaviors may work temporarily but can undermine students' interest in these behaviors when the reinforcements are no longer available (Lepper & Greene, 1976). A child who is rewarded for controlling his temper in class may become an ogre on the playground when no teacher is present to offer rewards for good behavior.



ALEX MARES-MANTON/AGEFOTOSTOCK

A behavioral therapist might treat this temper tantrum with an analysis of the antecedents, behavior, and consequences of the act.

Reducing unwanted emotional responses. One of the most powerful ways to reduce fear is by gradual *exposure* to the feared object or situation, a behavioral method originated by psychiatrist Joseph Wolpe (1958). **Exposure therapy** involves *confronting an emotion-arousing stimulus directly and repeatedly, ultimately leading to a decrease in the emotional response*. This technique depends on the processes of habituation and response extinction that were originally discovered in the study of classical conditioning (see Chapter 6). Wolpe called his form of treatment **systematic desensitization**, *a procedure in which a client relaxes all the muscles of his or her body while imagining being in increasingly frightening situations*. For example, a client who fears snakes might first imagine seeing a photo of a snake, followed by imagining seeing a snake that is inside an aquarium, followed eventually by imagining holding a large snake, all while engaging in exercises that relax the muscles of the body. It's now known that *in vivo exposure*, or live exposure, is more effective than imaginary exposure (Emmelkamp & Wessels, 1975; Stern & Marks, 1973). In other words, if a person fears social situations, it is better for that person to practice social interaction than to merely imagine it. Behavioral therapists use an exposure hierarchy to expose the client gradually to the feared object or situation. Easier situations are practiced first, and as fear decreases, the client progresses to more difficult or frightening situations.

● **How might exposure therapy help treat a phobia or fear of a specific object?**

Exposure therapy is a powerful treatment for overcoming fear. Up to 90% of individuals with animal phobias are able to overcome their fears in as little as one session lasting 2 to 3 hours. Eventually, almost anyone could handle a snake.

MASHABUBA/ISTOCKPHOTO

Cognitive Therapy

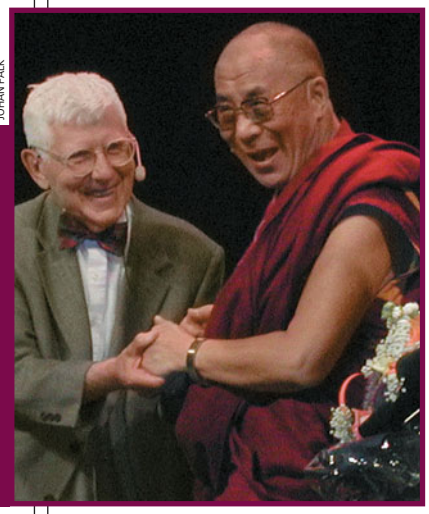
Whereas behavior therapy doesn't take into account a person's thoughts and feelings, and instead focuses on an individual's behavior, **cognitive therapy** focuses on *helping a client identify and correct any distorted thinking about self, others, or the world* (e.g., Beck & Weishaar, 2000). For example, behaviorists might explain a phobia as the outcome of a classical conditioning experience such as being bitten by a dog, where the dog bite leads to the development of a dog phobia through the simple association of the dog with the experience of pain. Cognitive theorists might instead emphasize the *meaning*

"Don't make me come over there!"

of the event. It might not be the event itself that caused the fear, but rather the individual's beliefs and assumptions about the event and the feared stimulus. In the case of a dog bite, cognitive theorists might focus on a person's new or strengthened belief that dogs are dangerous to explain the fear.

Cognitive therapies use a principal technique called **cognitive restructuring**, which involves *teaching clients to question the automatic beliefs, assumptions, and predictions that often lead to negative emotions and to replace negative thinking with more realistic and positive beliefs*. Specifically, clients are taught to examine the evidence for and against a particular belief or to be more accepting of outcomes that may be undesirable yet still manageable. For example, a depressed client may believe that she is stupid and will never pass her college courses—all on the basis of one poor grade. In this situation, the therapist would work with the client to examine the validity of this belief. The therapist would consider relevant evidence such as grades on previous exams, performance on other coursework, and examples of intelligence outside school. It may be that the client has never failed a course before and has achieved good grades in this particular course in the past. In this case, the therapist would encourage the client to consider all this information in determining whether she is truly "stupid."

● **How might a client restructure a negative self image into a positive one?**



JOHAN FALK

Western cognitive therapy meets the Eastern Buddhist meditation tradition as Aaron Beck greets his holiness the Dalai Lama at the International Congress for Cognitive Psychotherapy in 2005. Beck's approach to psychotherapy helps people change maladaptive thinking patterns in a direct and rational approach, whereas the practice of Buddhism expressed by the Lama aims to create mental peace through meditation. Here they seem to be amused by each other's choice of clothing.

Some forms of cognitive therapy include techniques for coping with unwanted thoughts and feelings, techniques that resemble meditation (see Chapter 8). Clients may be encouraged to attend to their troubling thoughts or emotions or be given meditative techniques that allow them to gain a new focus. One such technique, called **mindfulness meditation**, *teaches an individual to be fully present in each moment; to be aware of his or her thoughts, feelings, and sensations; and to detect symptoms before they become a problem*. Researchers have found mindfulness meditation to be helpful for preventing relapse in depression. In one study, people recovering from depression were about half as likely to relapse during a 60-week assessment period if they received mindfulness meditation–based cognitive therapy than if they received treatment as usual (Teasdale, Segal, & Williams, 2000).

Cognitive Behavioral Therapy

Historically, cognitive and behavioral therapies were considered distinct systems of therapy, and some people continue to follow this distinction, using solely behavioral *or* cognitive techniques. Today, the extent to which therapists use cognitive versus behavioral techniques depends on the individual therapist as well as the type of problem being treated. Most therapists working with anxiety and depression use *a blend of cognitive and behavioral therapeutic strategies,* often referred to as **cognitive behavioral therapy**, or **CBT**. In a way, this technique acknowledges that there may be behaviors that people cannot control through rational thought but also that there are ways of helping people think more rationally when thought does play a role. In contrast to traditional behavior therapy and cognitive therapy, CBT is "problem focused," meaning that it is undertaken for specific problems (e.g., reducing the frequency of panic attacks or returning to work after a bout of depression), and "action oriented," meaning that the therapist tries to

● **Why do most therapists use a blend of cognitive and behavioral strategies?**

cognitive restructuring A therapeutic approach that teaches clients to question the automatic beliefs, assumptions, and predictions that often lead to negative emotions and to replace negative thinking with more realistic and positive beliefs.

mindfulness meditation A form of cognitive therapy that teaches an individual to be fully present in each moment; to be aware of his or her thoughts, feelings, and sensations; and to detect symptoms before they become a problem.

cognitive behavioral therapy (CBT) A blend of cognitive and behavioral therapeutic strategies.

IMAGE SOURCE/GETTY IMAGES

The cognitive behavior therapy (CBT) client with obsessive-compulsive disorder who fears contamination in public restrooms might be given "homework" to visit three such restrooms in a week not necessarily to touch anything, but just to look.

assist the client in selecting specific strategies to help address those problems. The client is expected to *do* things, such as practice relaxation exercises or use a diary to monitor relevant symptoms (e.g., the severity of depressed mood, panic attack symptoms). This is in contrast to psychodynamic or other therapies where goals may not be explicitly discussed or agreed on and the client's only necessary action is to attend the therapy session.

CBT also contrasts with psychodynamic approaches in its assumptions about what the client can know. CBT is *transparent* in that nothing is withheld from the client. By the end of the course of therapy, most clients have a very good understanding of the treatment they have received as well as the specific techniques that are used to make the desired changes. For example, clients with obsessive-compulsive disorder who fear contamination would feel confident in knowing how to confront feared situations such as public washrooms and why confronting this situation is helpful. In this way, the CBT model of therapy differs from the more mystical relationship between the therapist and client in psychodynamic psychotherapy, in which the therapist serves almost as a kind of spiritual guide urging the client toward insight.

"That's Eleanor. She's a fact checker."

Humanistic and Existential Therapies

Humanistic and existential therapies emerged in the middle of the 20th century, in part as a reaction to the negative views that psychodynamic psychotherapies hold about human nature. Psychodynamic approaches emphasize unconscious drives toward sex and aggression, as we noted earlier. Humanistic and existential therapies assume that human nature is generally positive, and they emphasize the natural tendency of each individual to strive for personal improvement. Humanistic and existential therapies share the assumption that psychological problems stem from feelings of alienation and loneliness—and that these feelings can be traced to failures to reach one's potential (in the humanistic approach) or from failures to find meaning in life (in the existential approach). Although interest in these approaches peaked in the 1960s and 1970s, some therapists continue to use these approaches today. Two well-known types are person-centered therapy (a humanistic approach) and Gestalt therapy (an existential approach).

How does a humanistic view of human nature differ from a psychodynamic view?

person-centered therapy An approach to therapy that assumes all individuals have a tendency toward growth and that this growth can be facilitated by acceptance and genuine reactions from the therapist.

Gestalt therapy An existentialist approach to treatment with the goal of helping the client become aware of his or her thoughts, behaviors, experiences, and feelings and to "own" or take responsibility for them.

group therapy Therapy in which multiple participants (who often do not know one another at the outset) work on their individual problems in a group atmosphere.

Person-Centered Therapy

Person-centered therapy (also known as *client-centered therapy*) *assumes that all individuals have a tendency toward growth and that this growth can be facilitated by acceptance and genuine reactions from the therapist* (Rogers, 1951). Person-centered therapy assumes that each individual is qualified to determine his or her own goals for therapy, such as feeling more confident or making a career decision, and even the frequency and length of therapy. In this type of *nondirective* treatment, the therapist tends not to provide advice or suggestions about what the client should be doing. Instead, the therapist paraphrases the client's words, mirroring the client's thoughts and sentiments (e.g., "I think I hear you saying . . ."). Person-centered therapists believe that with adequate support, the client will recognize the right things to do.

Person-centered therapists strive to demonstrate three basic qualities: congruence, empathy, and unconditional positive regard. *Congruence* refers to openness and honesty in the therapeutic relationship and ensuring that the therapist communicates the same message at all levels. For example, the same message must be communicated in the therapist's words, the therapist's facial expression, and the therapist's body language. Saying, "I think your concerns are valid," while smirking would simply not do. *Empathy* refers to the continuous process of trying to understand the client by getting inside his or her way of thinking, feeling, and understanding the world. Seeing the world from the client's perspective enables the therapist to better appreciate the client apprehensions, worries, or fears. Finally, the therapist must treat the client with *unconditional positive regard* by providing a nonjudgmental, warm, and accepting environment in which the client can feel safe expressing his or her thoughts and feelings.

In person-centered therapy, the goal of therapy sessions is not to uncover repressed conflicts, as in psychodynamic therapy, or to challenge unrealistic thoughts, as in cognitive behavior therapy. Instead, the person-centered therapist tries to understand the client's experience and reflect that experience back to in a supportive way, encouraging the client's natural tendency toward growth. This style of therapy is a bit reminiscent of psychoanalysis in its way of encouraging the client toward the free expression of thoughts and feelings, although humanistic therapies clearly start from a set of assumptions about human nature that differ diametrically from psychodynamic theories.

Gestalt Therapy

Gestalt therapy *has the goal of helping the client become aware of his or her thoughts, behaviors, experiences, and feelings and to "own" or take responsibility for them.* Gestalt therapists are encouraged to be enthusiastic and warm toward their clients, an approach they share in common with person-centered therapists. Gestalt therapy emphasizes the experiences and behaviors that are occurring at that particular moment in the therapy session. For example, if a client is talking about something stressful that occurred during the previous week, the therapist might shift the attention to the client's current experience by asking, "How do you feel as you describe what happened to you?" This technique is known as *focusing*. Clients are also encouraged to put their feelings into action. One way to do this is the *empty chair technique,* in which the client imagines that another person (e.g., a spouse, a parent, a coworker) is in an empty chair, sitting directly across from the client. The client then moves from chair to chair, alternating from role playing what he or she would say to the other person and what he or she imagines the other person would respond. In this type of therapy, the goal is to facilitate awareness of the client's thoughts, feelings, behaviors, and experiences in the "here and now," with the assumption that greater awareness will clear a path to living more fully and meaningfully.

As part of Gestalt therapy, clients are encouraged to imagine that another person is sitting across from them in a chair. The client then moves from chair to chair, role-playing what he or she would say to the imagined person and what that person would answer.

PHOTOALTO/ALAMY

Groups in Therapy

It is natural to think of psychopathology as an illness that affects only the individual. A particular person "is depressed," for example, or "has anxiety." Yet each person lives in a world of other people, and interactions with others may intensify and even create disorders. A depressed person may be lonely after moving away from friends and loved ones, or an anxious person could be worried about pressures from parents. These ideas suggest that people might be able to recover from disorders in the same way they got into them—not just as an individual effort, but through social processes.

● When is group therapy the best option?

Couples and Family Therapy

When a couple is "having problems," neither individual may be suffering from any psychopathology. Rather, it may be the relationship itself that is disordered. *Couples therapy* is when a married, cohabitating, or dating couple is seen together in therapy to work on problems usually arising within the relationship. A traditional use of couples therapy might involve a couple seeking help because they are unhappy with their relationship. In this scenario, both members of the couple are expected to attend therapy sessions and the problem is seen as arising from their interaction rather than from the problems of one half of the couple. Treatment strategies would target changes in *both* parties, focusing on ways to break their repetitive dysfunctional pattern (Watzlawick, Beavin, & Jackson, 1967).

ANNA GOLDBERGS/AGEFOTOSTOCK

Families enter therapy for many reasons, sometimes to help particular members and other times because there are problems in one or more of the relationships in the family.

There are cases when therapy with even larger groups is warranted. An individual may be having a problem—say, an adolescent is abusing alcohol—but the source of the problem is in the individual's relationships with family members; perhaps the mother is herself an alcoholic who subtly encourages the adolescent to drink and the father travels and neglects the family. In this case, it could be useful for the therapist to work with the whole group at once in *family therapy*—psychotherapy involving members of a family. In family therapy, the "client" is the entire family. Family therapists believe that problem behaviors exhibited by a particular family member are the result of a dysfunctional family. For example, an adolescent girl suffering from bulimia might be treated in therapy with her mother, father, and older brother. The therapist would work to understand how the family members relate to one another, how the family is organized, and how it changes over time. In discussions with the family, the therapist might discover that the parents' excessive enthusiasm about her brother's athletic career led the girl to try to gain their approval by controlling her weight to become "beautiful." Both couples and family therapy involve more than one person attending therapy together, and the problems and solutions are seen as arising from the *interaction* of these individuals rather than simply from any one individual.

Group Therapy

Taking these ideas one step further, if individuals (or families) can benefit from talking with a psychotherapist, perhaps they can also benefit from talking with other clients who are talking with the therapist. This is **group therapy**, *a technique in which multiple participants (who often do not know one another at the outset) work on their individual problems in a group atmosphere*. The therapist in group therapy serves more as a discussion leader than as a personal therapist, conducting the sessions both by talking with individuals and by encouraging them to talk with one another. Group therapy is often used for people who have a common problem, such as substance abuse, but it can also be used for those with differing problems.

● What are the pros and cons of a group therapy approach?

"So, does anyone in the group feel like responding to what Richard has just shared with us?"

Why do people choose group therapy? One advantage is that groups provide a context in which clients can practice relating to others. People in group therapy have a "built-in" set of peers whom they have to talk to and get along with on a regular basis. This can be especially helpful for clients who are otherwise socially isolated. Second, attending a group with others who have similar problems shows clients that they are not alone in their suffering. Third, group members model appropriate behaviors for one another and share their insights about how to deal with their problems.

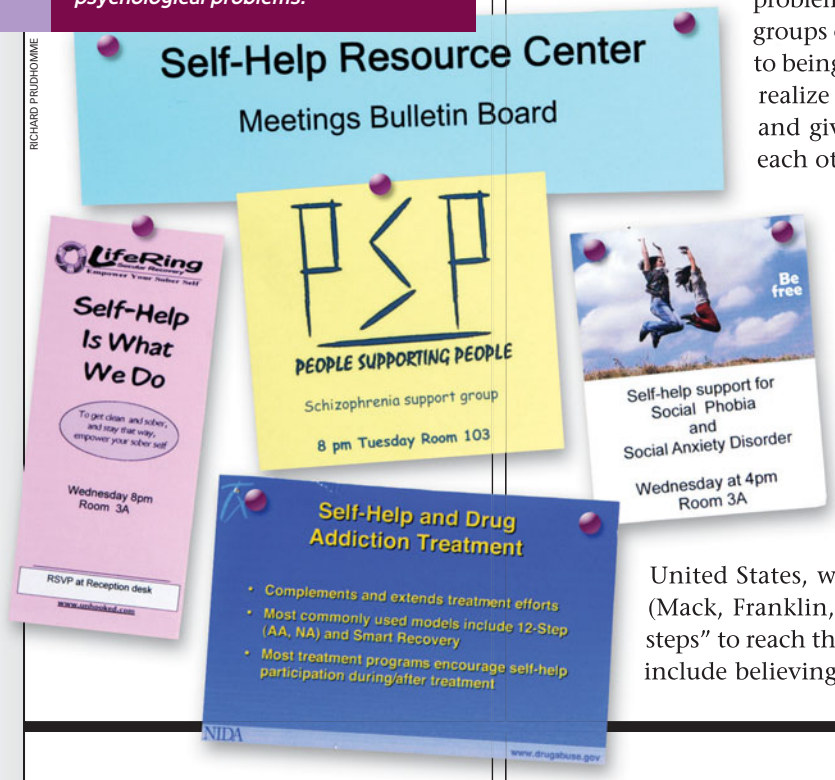
Group therapy also has disadvantages. It may be difficult to assemble a group of individuals who have similar needs. This is particularly an issue with CBT, which tends to focus on specific problems such as depression or panic disorder. Group therapy may become a problem if one or more members undermine the treatment of other group members. This can occur if some group members dominate the discussions, threaten other group members, or make others in the group uncomfortable (e.g., attempting to date other members). Finally, clients in group therapy get less attention than they might in individual psychotherapy. As a result, those who tend to participate less in the group may not benefit as much as those who participate more.

Self-Help and Support Groups

An important offshoot of group therapy is the concept of *self-help groups* and *support groups*, which are discussion or Internet chat groups that focus on a particular disorder or difficult life experience and are often run by peers who have themselves struggled with the same issues. The most famous self-help and support groups are Alcoholics Anonymous (AA), Gamblers Anonymous, and Al-Anon (a program for the family and friends of those with alcohol problems). Other self-help groups offer support to cancer survivors or to parents of children with autism or to people with mood disorders, eating disorders, substance abuse problems, and self-harming disorders—in fact, self-help and support groups exist for just about every psychological disorder. In addition to being cost effective, self-help and support groups allow people to realize that they are not the only ones with a particular problem and give them the opportunity to offer guidance and support to each other based on personal experiences of success.

What are pros and cons of self-help support groups?

Self-help groups are a cost-effective, time-effective, and treatment-effective solution for dealing with some types of psychological problems.



In some cases, though, self-help and support groups can do more harm than good. Some members may be disruptive or aggressive or encourage one another to engage in behaviors that are countertherapeutic (e.g., avoiding feared situations or using alcohol to cope). People with moderate problems may be exposed to others with severe problems and may become oversensitized to symptoms they might otherwise have not found disturbing. Because self-help and support groups are usually not led by trained therapists, mechanisms to evaluate these groups or to ensure their quality are rarely in place.

Today, AA has more than 2 million members in the United States, with 185,000 group meetings that occur around the world (Mack, Franklin, & Frances, 2003).Members are encouraged to follow "12 steps" to reach the goal of lifelong abstinence from all drinking, and the steps include believing in a higher power, practicing prayer and meditation, and

making amends for harm to others. Most members attend group meetings several times per week, and between meetings they receive additional support from their "sponsor." A few studies examining the effectiveness of AA have been conducted, and it appears that individuals who participate tend to overcome problem drinking with greater success than those who do not participate in AA (Fiorentine, 1999; Morgenstern et al., 1997). However, several tenets of the AA philosophy are not supported by the research. We know that the general AA program is useful, but questions about which parts of this program are most helpful have yet to be studied.

Considered together, the many social approaches to psychotherapy reveal how important interpersonal relationships are for each of us. It may not always be clear how psychotherapy works, whether one approach is better than another, or what particular theory should be used to understand how problems have developed. What is clear, however, is that social interactions between people—both in individual therapy and in all the different forms of therapy in groups—can be useful in treating psychological disorders.

summary quiz [13.2]

4. Which type of psychotherapy emphasizes helping clients gain insight into their unconscious conflicts?
a. humanistic
b. Gestalt
c. cognitive
d. psychodynamic

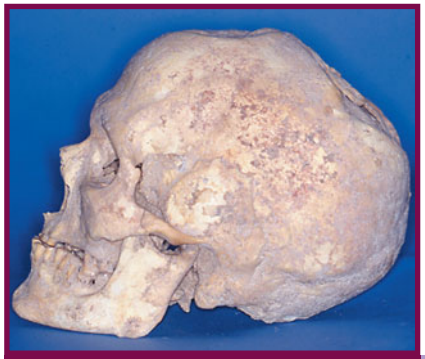
5. Which type of therapy aims at challenging irrational thoughts?
a. Gestalt
b. existential
c. cognitive
d. person-centered

6. Which type of therapy would likely work best to eliminate a person's fear of snakes?
a. psychodynamic
b. behavioral
c. cognitive
d. humanistic

7. Which type of therapy aims to help clients become aware of their thoughts, feelings, and behaviors in the present moment?
a. Gestalt
b. person-centered
c. cognitive
d. behavioral

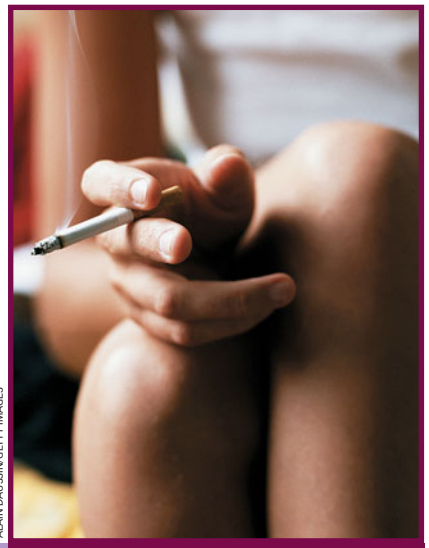
Medical and Biological Treatments: Healing the Mind through the Brain

Ever since someone discovered that a whack to the head can affect the mind, people have suspected that direct brain interventions might hold the keys to a cure for psychological disorders. Archeological evidence, for example, indicates that the occasional human thousands of years ago was "treated" for some malady by the practice of trepanning—drilling a hole in the skull, perhaps in the belief that this would release evil spirits that were affecting the mind (Alt et al., 1997). Surgery for psychological disorders is a last resort nowadays, and treatments that focus on the brain usually involve interventions that are less dramatic. The use of drugs to influence the brain was also discovered in prehistory (alcohol, for example, has been around for a long time). Since then, drug treatments have grown in variety and effectiveness to become what is now the most common medical approach in treating psychological disorders.



DR. KURT W. ALT

This is a trepanned skull from a Stone Age burial site (about 5900–6200 BCE) in the Alsace region of France. Two holes were drilled in the skull, and the patient lived afterward, as shown by the regrowth of bone covering the holes (from Alt et al., 1997). Don't try this at home.



ALAIN DAUSSIN/GETTY IMAGES

People with schizophrenia are two to three times more likely to smoke tobacco than the average person (Kelly & McCreadie, 2000). Several explanations are being tested for this, including the possibility that people with schizophrenia seek out nicotine to reduce their symptoms. If this is true, their "self-medication" may point the way toward new drug treatments for the disorder that might be more helpful and less harmful than smoking.

Antipsychotic Medications

The story of drug treatments for severe psychological disorders starts in the 1950s, with chlorpromazine (brand name Thorazine), which was originally developed as a sedative but which, when administered to people with schizophrenia, often left them euphoric and docile when they had formerly been agitated and incorrigible (Barondes, 2003). Chlorpromazine was the first in a series of **antipsychotic drugs**, which *treat schizophrenia and related psychotic disorders*, and which completely changed the way schizophrenia was managed. Other related medications, such as thioridazine (Mellaril) and haloperidol (Haldol) followed. Before the introduction of antipsychotic drugs, people with schizophrenia often exhibited bizarre symptoms and were sometimes so disruptive and difficult to manage that the only way to protect them (and other people) was to keep them in asylums. In the period following the introduction of these drugs, the number of people in psychiatric hospitals decreased by more than two thirds. Antipsychotic drugs made possible the deinstitutionalization of hundreds of thousands of people and gave a major boost to the field of **psychopharmacology**, *the study of drug effects on psychological states and symptoms*.

What do antipsychotic drugs do?

Antipsychotic medications are believed to block dopamine receptors in parts of the brain such as the mesolimbic area, an area between the tegmentum (in the midbrain) and various subcortical structures (see Chapter 3). The medication reduces dopamine activity in these areas. As you read in Chapter 12, the effectiveness of schizophrenia medications led to the "dopamine hypothesis," suggesting that schizophrenia may be caused by excess dopamine in the synapse. Research has indeed found that dopamine overactivity in the mesolimbic areas of the brain is related to the more bizarre positive symptoms of schizophrenia, such as hallucinations and delusions (Marangell et al., 2003).

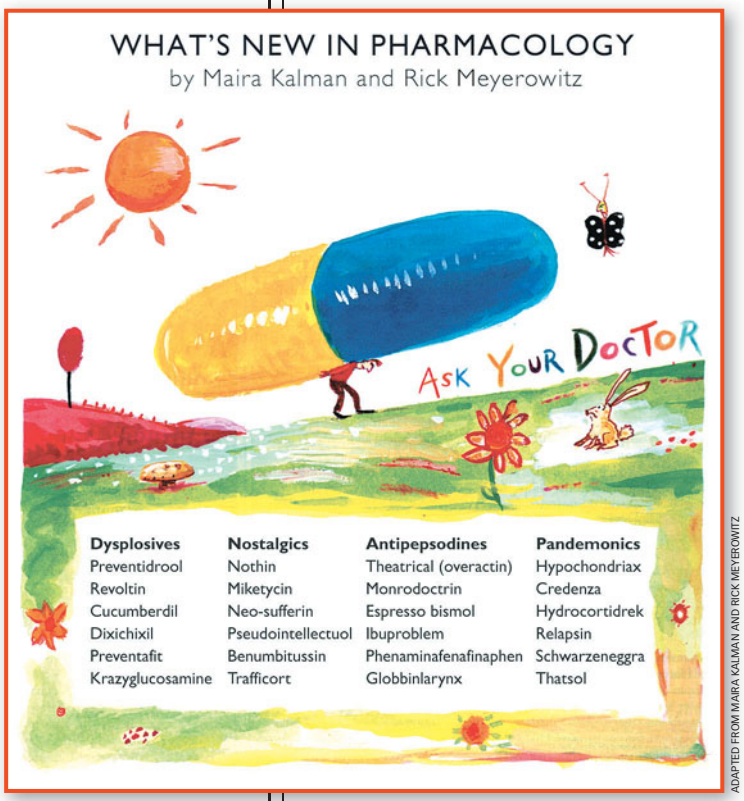
Although antipsychotic drugs work well for positive symptoms, it turns out that negative symptoms of schizophrenia, such as emotional numbing and social withdrawal, may be related to dopamine *under* activity in the mesocortical areas of the brain (connections between parts of the tegmentum and the cortex). This may help explain why antipsychotic medications do not relieve negative symptoms well. Instead of a medication that blocks dopamine receptors, negative symptoms require a medication that *increases* the amount of dopamine available at the synapse. This is a good example of how medical treatments can have broad psychological effects but not target specific psychological symptoms.

After the introduction of antipsychotic medications, there was little change in the available treatments for schizophrenia for more than a quarter of a century. However, in the 1990s, a new class of antipsychotic drugs was introduced. These newer drugs, which include clozapine (Clozaril), risperidone (Risperidal), and olanzepine (Zyprexa), have become known as *atypical antipsychotics* (the older drugs are now often referred to as *conventional* or *typical* antipsychotics). Unlike the older antipsychotic medications, these newer drugs appear to affect both the dopamine and serotonin systems, blocking both types of receptors. The ability to block serotonin receptors appears to be a useful addition since enhanced serotonin activity in the brain has been implicated in some of the core difficulties in schizophrenia, such as cognitive and perceptual disruptions, as well as mood disturbances. This may explain why atypical antipsychotics work at least as well as older drugs for the positive symptoms of schizophrenia but also work fairly well for negative symptoms (Bradford, Stroup, & Lieberman, 2002).

What are the advantages of the newer, atypical antipsychotic medications?

Like most medications, antipsychotic drugs have side effects. The side effects can be sufficiently unpleasant that some people "go off their meds," preferring their symptoms to the drug. One side effect that often occurs with long-term use is *tardive dyskinesia,* a condition of involuntary movements of the face, mouth, and extremities. In fact, patients often need to take another medication to treat the unwanted side effects of the conventional antipsychotic drugs. Side effects of the newer medications tend to be milder

than those of the older antipsychotics. For that reason, the atypical antipsychotics are now usually the front-line treatments for schizophrenia (Marangell et al., 2003).



Antianxiety Medications

Antianxiety medications are *drugs that help reduce a person's experience of fear or anxiety.* The most commonly used antianxiety medications are the *benzodiazepines,* a type of tranquilizer that works by facilitating the action of the neurotransmitter gamma-aminobutyric acid (GABA). As you read in Chapter 3, GABA inhibits certain neurons in the brain, producing a calming effect for the person. Commonly prescribed benzodiazepines include diazepam (Valium), lorazepam (Ativan), and alprazolam (Xanax). The benzodiazepines typically take effect in a matter of minutes and are effective for reducing symptoms of anxiety disorders (Roy-Byrne & Cowley, 2002).

Nonetheless, these days doctors are relatively cautious when prescribing benzodiazepines. One concern is that these drugs have the potential for abuse. They are often associated with the development of *tolerance,* which is the need for higher dosages over time to achieve the same effects following long-term use (see Chapter 8). Furthermore, after people become tolerant of the drug, they risk significant withdrawal symptoms following discontinuation. Some withdrawal symptoms include increased heart rate, shakiness, insomnia, agitation, and anxiety—the very symptoms the drug was taken to eliminate! Another consideration when prescribing benzodiazepines is their side effects. The most common side effect is drowsiness, although benzodiazepines can also have negative effects on coordination and memory.

What are some reasons for caution when prescribing antianxiety medications?

A newer drug, buspirone (Buspar), has been shown to reduce anxiety among individuals who suffer from generalized anxiety disorder (GAD). Buspirone is not as effective as the benzodiazepines for anxiety disorders other than GAD, but it doesn't produce the drowsiness and withdrawal symptoms associated with benzodiazepines (Roy-Byrne & Cowley, 2002). Gabapentin (Neurontin), an antiseizure medication, has also been recently studied as a remedy for anxiety. Preliminary results suggest that this drug may be useful for treating social anxiety and panic disorder (Pande et al., 1999, 2000).

Antidepressants and Mood Stabilizers

Antidepressants are *a class of drugs that help lift people's mood.* They were first introduced in the 1950s, when iproniazid, a drug that was used to treat tuberculosis, was found to elevate mood (Selikoff, Robitzek, & Ornstein, 1952). Iproniazid is a *monoamine oxidase inhibitor (MAOI),* a medication that prevents the enzyme monoamine oxidase from breaking down neurotransmitters such as norepinephrine, serotonin, and dopamine. However, despite their effectiveness, MAOIs are rarely prescribed anymore. MAOI side effects such as dizziness and loss of sexual interest are often difficult to tolerate, and these drugs interact with many different medications, including over-the-counter cold medicines. They also can cause dangerous increases in blood pressure when taken with foods that contain tyramine, a natural substance formed from the breakdown of protein in certain cheeses, beans, aged meats, soy products, and draft beer.

A second category of antidepressants is the *tricyclic antidepressants,* which were also introduced in the 1950s. These include drugs such as imipramine (Tofranil) and amitriptyline (Elavil). These medications block the reuptake of norepinephrine and serotonin,

antipsychotic drugs Medications that are used to treat schizophrenia and related psychotic disorders.

psychopharmacology The study of drug effects on psychological states and symptoms.

antianxiety medications Drugs that help reduce a person's experience of fear or anxiety.

antidepressants A class of drugs that help lift people's mood.

thereby increasing the amount of neurotransmitter in the synaptic space between neurons. The most common side effects of tricyclic antidepressants include dry mouth, constipation, difficulty urinating, blurred vision, and racing heart (Marangell et al., 2003). Although these drugs are still prescribed, they are used much less frequently than they were in the past because of these side effects.

Among the most commonly used antidepressants today are the *selective serotonin reuptake inhibitors,* or SSRIs, which include drugs such as fluoxetine (Prozac), citalopram (Celexa), and paroxetine (Paxil). The SSRIs work by blocking the reuptake of serotonin in the brain, which makes more serotonin available in the synaptic space between neurons. The greater availability of serotonin in the synapse gives the neuron a better chance of "recognizing" and using this neurotransmitter in sending the desired signal.

What are the most common antidepressants used today? How do they work?

The SSRIs were developed based on hypotheses that low levels of serotonin are a causal factor in depression (see Chapter 12). Supporting this hypothesis, SSRIs are effective for depression, as well as for a wide range of other problems. SSRIs are called "selective" because, unlike the tricyclic antidepressants, which work on the serotonin and norepinephrine systems, SSRIs work more specifically on the serotonin system (see **FIGURE 13.2**).

Finally, in the past several years, a number of new antidepressants such as Effexor and Wellbutrin have been introduced. Effexor is an example of a serotonin and norepineprhine reuptake inhibitor (SNRI); whereas SSRIs act only on serotonin, SNRIs act on both serotonin and norepinephrine. Wellbutrin, in contrast, is a norepinephrine and dopamine reuptake inhibitor. These and other newly developed antidepressants appear to have fewer side effects than the tricyclic antidepressants and MAOIs.

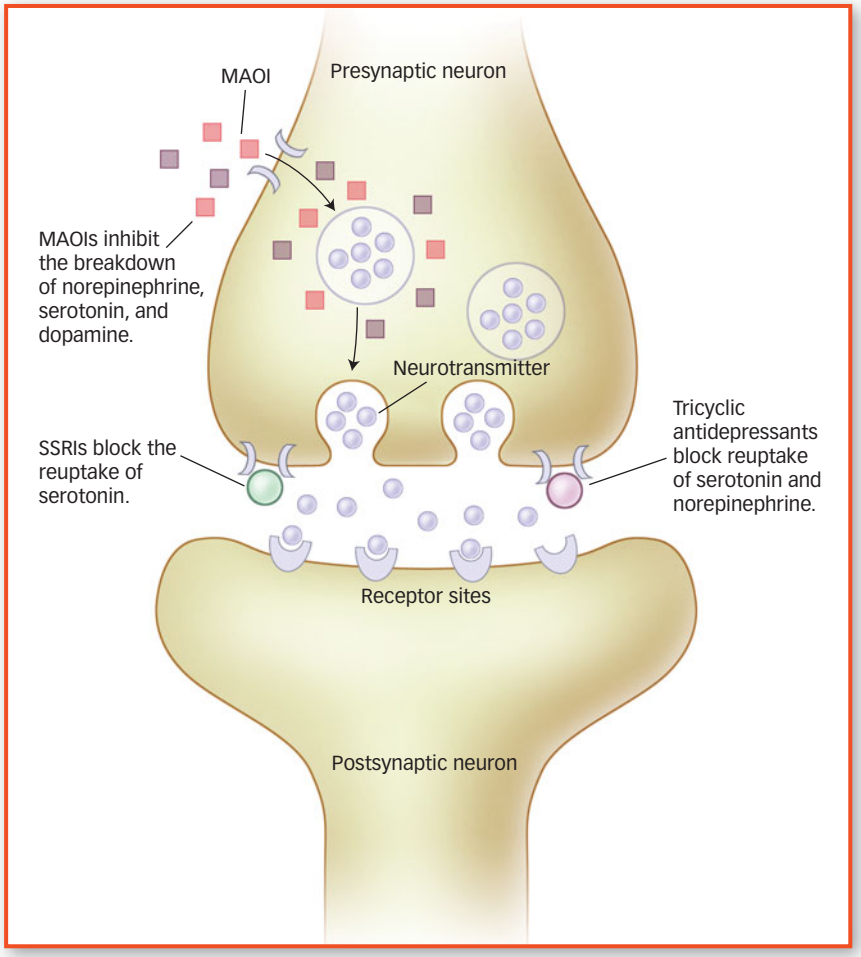


FIGURE 13.2
Antidepressant Drug Actions *Antidepressant drugs, such as MAOIs, SSRIs, and tricyclic antidepressants, act on neurotransmitters such as serotonin, dopamine, and norepinephrine by inhibiting their breakdown and blocking reuptake. These actions make more of the neurotransmitter available for release and leave more of the neurotransmitter in the synaptic gap to activate the receptor sites on the postsynaptic neuron. These drugs relieve depression and often alleviate anxiety and other disorders.*

Most antidepressants take from a few weeks to more than a month before they start to have an effect. Besides relieving symptoms of depression, almost all of the antidepressants effectively treat anxiety disorders, and many of them can resolve other problems, such as eating disorders. In fact, several companies that manufacture SSRIs have recently marketed their drugs as treatments for anxiety disorders rather than for their antidepressant effects. The general improvement in mood and outlook produced by antidepressants is attractive not only to people who are clinically depressed or anxious but also to many others seeking to level out the emotional hills and valleys of everyday life. Prozac is widely prescribed for people who are not suffering from specific disorders, and there is considerable debate about whether antidepressants should be used in this way to contribute to the well-being of people who are not sick (Kramer, 1997).

"More lithium."

Although antidepressants are effective in treating major depression, they are not recommended for treating bipolar disorder, which is characterized by manic or hypomanic episodes (see Chapter 12). Antidepressants are not prescribed because they might actually trigger a manic episode in a person with bipolar disorder. Instead, bipolar disorder is treated with *mood stabilizers,* which are medications used to suppress swings between mania and depression. Commonly used mood stabilizers include lithium and valproate. Even in unipolar depression, lithium is sometimes effective when combined with traditional antidepressants in people who do not respond to antidepressants alone.

● Why aren't antidepressants prescribed for bipolar disorder?

Lithium has been associated with possible long-term kidney and thyroid problems, so people taking lithium must monitor their blood levels of lithium on a regular basis. Furthermore, lithium has a precise range in which it is useful for each person—another reason it should be closely monitored with blood tests. Valproate, in contrast, does not require such careful blood monitoring. Although valproate may have side effects of nausea and weight gain, it is currently the most commonly prescribed drug in the United States for bipolar disorder (Schatzberg, Cole, & DeBattista, 2003). In sum, although the antidepressants are effective for a wide variety of problems, mood stabilizers may be required when a person's symptoms include extreme swings between highs and lows, such as experienced with bipolar disorder.

Herbal and Natural Products

In a survey of more than 2,000 Americans, 7% of those suffering from anxiety disorders and 9% of those suffering from severe depression reported using alternative "medications" such as herbal medicines, megavitamins, homeopathic remedies, or naturopathic remedies to treat these problems (Kessler et al., 2001). Major reasons people use these products are that they are easily available over the counter, are less expensive, and are perceived as "natural" alternatives to "drugs." Are herbal and natural products effective in treating mental health problems, or are they just so much "snake oil"?

The answer to this question isn't simple. Herbal products are not considered medications by regulatory agencies (e.g., the U.S. Food and Drug Administration) and are exempt from rigorous research to establish their safety and effectiveness. Instead, herbal products are classified as nutritional supplements and regulated in the same way as foods. There is little scientific information about herbal products, including possible interactions with other medications, possible tolerance and withdrawal symptoms, side effects, appropriate dosages, how they work, or even *whether* they work—and the purity

● Why are herbal remedies used? Are they actually effective?

BITTER/ISTOCKPHOTO

Many of the "natural" remedies and treatments available at health food and supplement stores come with little or no evidence of effectiveness and no claims for any specific benefit on the label, but the price tag is usually quite clear.

of these products often varies from brand to brand (Kressmann, Muller, & Blume, 2002). Although herbal medications and treatments are worthy of continued research, these products should be closely monitored and used judiciously until more is known about their safety and effectiveness.

Combining Medication and Psychotherapy

Psychologists looking for effective ways to treat psychological disorders get pretty excited about the progress of drug therapy. New drugs appear with some regularity, improving on prior medications and suggesting even greater improvements to come. At the same time, as we have seen, drugs can be blunt instruments as treatment devices, producing general changes in mood or relieving unpleasant symptoms—but leaving specific problems untreated. How can we bring medication and psychotherapy together to produce comprehensive treatments?

Many studies have compared psychological treatments, medication, and combinations of these approaches for addressing psychological disorders. The results of these studies often depend on the particular problem being considered. For example, in the cases of schizophrenia and bipolar disorder, researchers have found that medication is a necessary part of treatment, and studies have tended to examine whether adding psychotherapeutic treatments such as social skills training or cognitive behavioral treatment can be helpful. In the case of anxiety disorders, medication and psychotherapy may be about equally effective. One study compared cognitive behavior therapy, imipramine (the antidepressant also known as Tofranil), and the combination of these treatments (CBT plus imipramine) with a placebo (administration of an inert medication) for the treatment of panic disorder (Barlow et al., 2000). After 12 weeks of treatment, either CBT alone or imipramine alone was found to be superior to a placebo. For the CBT-plus-imipramine condition, the response rate also exceeded the placebo one but was not significantly better than that for either CBT or imipramine alone. In other words, either treatment was better than nothing, but the combination of treatments was not significantly more effective than one or the other (see **FIGURE 13.3**).

Do therapy and medications work through similar mechanisms?

Given that both therapy and medications are effective, one question is whether they work through similar mechanisms. A recent study of people with social phobia examined patterns of cerebral blood flow following treatment using either citalopram (an SSRI) or CBT (Furmark et al., 2002). Patients in both groups were alerted to the possibility that they would soon have to speak in public. In both groups, those who responded to treatment showed similar reductions in activation in the amygdala, hippocampus, and neighboring cortical areas during this challenge. As you'll recall from Chapter 5, the amygdala and hippocampus play significant roles in memory for emotional information.

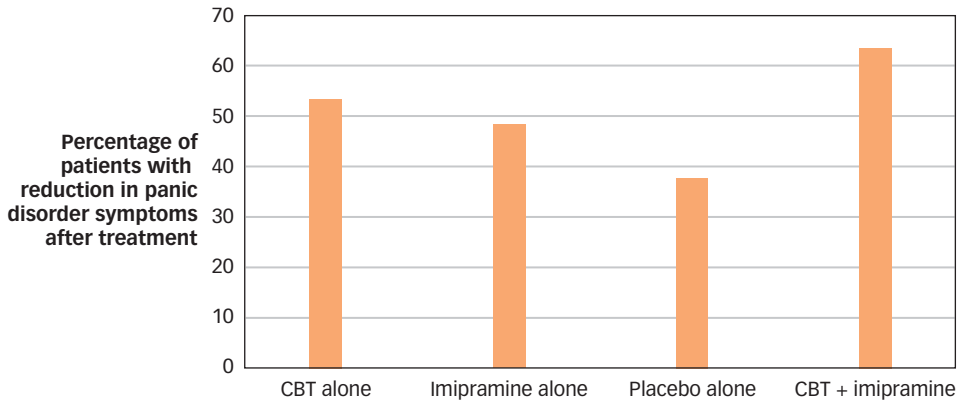


FIGURE 13.3
The Effectiveness of Medication and Psychotherapy for Panic Disorder *One study of CBT and medication (imipramine) for panic disorder found that the effects of CBT, medication, and treatment that combined CBT and medication were not significantly different over the short term, though all three were superior to the placebo condition (Barlow et al., 2000).*

These findings suggest that both therapy and medication affect the brain in regions associated with a reaction to threat. Although it might seem that events that influence the brain should be physical—after all, the brain is a physical object—both the physical administration of a drug and the psychological application of psychotherapy produce similar influences on the brain.

One complication in combining medication and psychotherapy is that these treatments are often provided by different people. Psychiatrists are trained in the administration of medication in medical school (and they may also provide psychotherapy), whereas psychologists provide psychotherapy but not medication. This means that the coordination of treatment often requires cooperation between psychologists and psychiatrists.

The question of whether psychologists should be licensed to prescribe medications has been a source of debate among physicians as well as among psychologists (Heiby, 2002; Lavoie & Fleet, 2002; Sammons, Paige, & Levant, 2003). Opponents argue that psychologists do not have the medical training to understand how medications interact with other drugs. On the other hand, proponents of prescription privileges argue that patient safety would not be compromised as long as rigorous training procedures were established. This issue remains a focus of debate, so at present, the coordination of medication and psychotherapy usually involves a team effort of psychiatry and psychology.

Biological Treatments beyond Medication

Although medication can be an effective biological treatment, for some people medications do not work or side effects are intolerable. If this group of people doesn't respond to psychotherapy, either, what other options do they have to achieve symptom relief?

Where do people turn if medication and therapy are unsuccessful?

Some additional avenues of help are available, but some are risky or poorly understood.

One example is **electroconvulsive therapy (ECT)**, more commonly known as "shock therapy," which is *a treatment that involves inducing a mild seizure by delivering an electrical shock to the brain*. The shock is applied to the person's scalp for less than a second. ECT is primarily used to treat severe depression, although it may also be useful for treating mania (Mukherjee, Sackeim, & Schnur, 1994). Patients are pretreated with muscle relaxants and are under general anesthetic, so they are not conscious of the procedure. The main side effect of ECT is impaired short-term memory, which usually improves over the first month or two after the end of treatment. In addition, patients undergoing this procedure sometimes report headaches and muscle aches afterward (Marangell et al., 2003). Despite these side effects, the treatment can be effective: About half the individuals who do not respond to medication alone may find ECT helpful in treating their depression (Prudic et al., 1996).

Another biological approach that does not involve medication is **transcranial magnetic stimulation (TMS)**, *a treatment that involves placing a powerful pulsed magnet over a person's scalp, which alters neuronal activity in the brain* (George, Lisanby, & Sackeim, 1999). As a treatment for depression, the magnet is placed just above the right or left eyebrow in an effort to stimulate the right or left prefrontal cortex—areas of the brain implicated in depression. TMS is an exciting development because it is noninvasive and has fewer side effects than ECT (see Chapter 2). Side effects are minimal; they include mild headache and small risk of seizure, but TMS has no impact on memory or concentration. TMS may be particularly useful in treating depression that is unresponsive to medication (Fitzgerald et al., 2003; Kauffmann, Cheema, & Miller,

electroconvulsive therapy (ECT) A treatment that involves inducing a mild seizure by delivering an electrical shock to the brain.

transcranial magnetic stimulation (TMS) A treatment that involves placing a powerful pulsed magnet over a person's scalp, which alters neuronal activity in the brain.

Electroconvulsive therapy (ECT) can be an effective treatment for severe depression. To reduce the side effects, it is administered under general anesthesia.

WILL & DENI MCINTYRE/PHOTO RESEARCHERS

UNDERWOOD & UNDERWOOD/CORBIS

Rosemary Kennedy, sister of President John F. Kennedy, was intellectually challenged from childhood and had violent tantrums and rages that began in her early 20s. Her family agreed to her treatment with a lobotomy at St. Elizabeth's Hospital in Washington, DC, in 1942, but it went very wrong. She became permanently paralyzed on one side, incontinent, and unable to speak coherently, and she spent the rest of her life in institutions.

2004). In fact, a recent study comparing TMS to ECT found that both procedures were effective, with no significant differences between them (Janicak et al., 2002). Other studies have investigated the utility of TMS for problems such as hallucinations, and early results are promising (Hoffman et al., 2003).

In very rare cases, **psychosurgery**, *the surgical destruction of specific brain areas,* is used to treat certain psychological disorders, such as obsessive-compulsive disorder (OCD). Psychosurgery has a controversial history, beginning in the 1930s with the invention of the lobotomy to calm violent or agitated human patients. Lobotomies involved inserting an instrument into the brain through the patient's eye socket or through holes drilled in the side of the head. The objective was to sever connections between the frontal lobes and inner brain structures such as the thalamus, known to be involved in emotion. Although some lobotomies produced highly successful results, many patients were devastated by significant and permanent side effects such as extreme lethargy or childlike impulsivity.

Today, psychosurgeries are far more precise than lobotomies of the 1930s and 1940s in targeting particular brain areas to lesion. This increased precision has produced better results. For example, patients suffering from obsessive-compulsive disorder who fail to respond to treatment (including several trials of medications and cognitive behavioral treatment) may benefit from specific surgical procedures called *cingulotomy* and *anterior capsulotomy*. Cingulotomy involves destroying part of the cingulate gyrus and corpus callosum (see Chapter 3). Anterior capsulotomy involves creating small lesions to disrupt the pathway between the caudate nucleus and putamen. Long-term follow-up studies suggest that more than a quarter of patients with OCD who do not respond to standard treatments report significant benefit following psychosurgery, with relatively few side effects (Baer et al., 1995; Cumming et al., 1995; Hay et al., 1993). However, due to the intrusive nature of psychosurgery and a lack of controlled studies, these procedures are currently reserved for the most severe cases.

summary quiz [13.3]

8. Medications called *atypical antipsychotics*
- a. affect only the dopamine system.
- b. affect only the serotonin system.
- c. affect both the dopamine and serotonin systems.
- d. do not work as well as typical antipsychotics.

9. Which is true of the benzodiazepines?
- a. They work by facilitating the action of the neurotransmitter dopamine.
- b. They are the most commonly used antianxiety medications.
- c. They typically take several weeks before they start to have an effect.
- d. They are recommended for treating bipolar disorders.

10. Among the most commonly used antidepressants today are the
- a. selective serotonin reuptake inhibiters.
- b. monoamine oxidase inhibitors.
- c. tricyclic antidepressants.
- d. mood stabilizers.

11. Electroconvulsive therapy is primarily used to treat
- a. severe anxiety.
- b. schizophrenia.
- c. obsessive-compulsive disorder.
- d. depression.

Treatment Effectiveness: For Better or for Worse

Think back to our fearful flyer Lisa at the beginning of the chapter. What if, instead of virtual reality therapy, Lisa had been assigned by her therapist to a drug treatment or to psychosurgery? For that matter, what if her therapy was to walk around for a week wearing a large false nose? Could these alternatives have been just as effective for treating her phobia? Through this chapter, we have explored various psychological and biomedical treatments that may help people with psychological disorders. But do these treatments actually work, and which ones work better than the others?

As you learned in Chapter 2, this can be a difficult detective exercise. The detection is made even more difficult because people may approach treatment evaluation very unscientifically, often by simply noticing an improvement (or no improvement or that dreaded decline) and reaching a conclusion based on that sole observation. Treatment evaluation can be susceptible to illusions—mindbugs in how people process information about treatment effects—and these illusions can only be overcome by scientific evaluation of the effectiveness of treatments.

psychosurgery Surgical destruction of specific brain areas.

placebo An inert substance or procedure that has been applied with the expectation that a healing response will be produced.

Treatment Illusions

Imagine you're sick and the doctor says, "Take a pill." You follow the doctor's orders, and you get better. To what do you attribute your improvement? If you're like most people, you reach the conclusion that the pill cured you. How could this be an illusion? There are at least three ways: Maybe you would have gotten better anyway; maybe the pill wasn't the active ingredient in your cure; or maybe after you're better, you mistakenly remember having been more ill than you really were. These possibilities point to three potential illusions of treatment—illusions produced by natural improvement, by nonspecific treatment effects, and by reconstructive memory.

Natural improvement is the tendency of symptoms to return to their mean or average level, a process sometimes called *regression to the mean*. The illusion in this case happens when you conclude mistakenly that a treatment has made you better when you would have gotten better anyway. People typically turn to therapy or medication when their symptoms are at their worst, so they start their personal "experiment" to see if treatment makes them improve at a time when things couldn't get much worse. When this is the case, the client's symptoms will often improve regardless of whether there was any treatment at all; when you're at rock bottom, there's nowhere to move but up. In most cases, for example, depression that becomes severe enough to make a person a candidate for treatment will tend to lift in several months. A person who enters therapy for depression may develop an illusion that the therapy works because the therapy coincides with the typical course of the illness and the person's natural return to health.

● What are three kinds of treatment illusions?

Another treatment illusion occurs when a client or therapist attributes the client's improvement to a feature of treatment, although that feature wasn't really the active element that caused improvement. Recovery could be produced by *nonspecific treatment effects* that are not related to the specific mechanisms by which treatment is supposed to be working. For example, the doctor prescribing the medication might simply be a pleasant and hopeful individual who gives the client a sense that things will improve. Client and doctor alike might attribute the client's improvement to the effects of medication on the brain, whereas the true active ingredient was the warm relationship with the good doctor.

● What is the placebo effect?

Simply knowing that you are getting a treatment can be a nonspecific treatment effect. These instances include the positive influences that can be produced by a **placebo**, *an inert substance or procedure that has been applied with the expectation that a healing response will be produced.* For

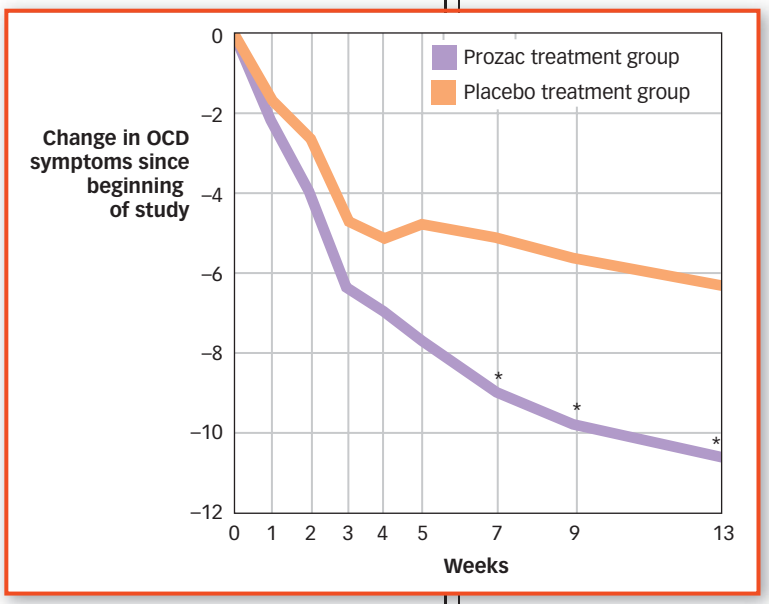


FIGURE 13.4
The Placebo Effect *Two groups of patients were given pills to treat OCD. The first group was given Prozac, an antidepressant, and the second group was given an inert sugar pill, a placebo. Interestingly, both groups showed significant improvement in their OCD symptoms until week 7, when the benefits of taking the placebo leveled off. As shown by the asterisks (*), Prozac reduced symptoms significantly more than did placebo pills by weeks 7, 9, and 13 (Geller et al., 2001).*

INSADCO PHOTOGRAPHY/ALAMY

When you feel you've come a long way, you may remember where you started as farther down than it was. People who feel they have improved from a treatment program may reconstruct memories of the past that exaggerate their pretreatment problems.

example, if you take a sugar pill that does not contain any painkiller for a headache thinking it is Tylenol or aspirin, this pill is a placebo. Placebos can have profound effects in the case of psychological treatments. Research shows that a large percentage of individuals with anxiety, depression, and other emotional problems experience significant improvement after a placebo treatment. Chapter 15 further discusses how placebo effects may occur as well as their influence on the brain.

One study compared the decrease in symptoms of obsessive-compulsive disorder between adolescents taking Prozac (fluoxetine) and those taking a placebo (Geller et al., 2001). Participants receiving medication showed a dramatic decrease in symptoms over the course of the 13-week study. Those taking a placebo also showed a reduction in symptoms, and the difference between the Prozac and placebo groups only became significant in the seventh week of treatment (see **FIGURE 13.4**). In fact, some psychologists estimate that up to 75% of the effects shown by antidepressant medications are due to the placebo effect (Kirsch & Sapirstein, 1998).

A third treatment illusion can come about when the client's motivation to get well causes errors in *reconstructive memory* for the original symptoms. You might think that you've improved because of a treatment when in fact you're simply misremembering—mistakenly believing that your symptoms before treatment were worse than they actually were. This tendency was first observed in research examining the effectiveness of a study skills class (Conway & Ross, 1984). Some students who wanted to take the class were enrolled, while others were randomly assigned to a waiting list until the class could be offered again. When their study abilities were measured afterward, those students who took the class were no better at studying than their wait-listed counterparts. However, those who took the class *said* that they had improved. How could this be? Those participants recalled their study skills before the class as being worse than they actually had been. This motivated reconstruction of the past was dubbed by the researchers "getting what you want by revising what you had" (Conway & Ross, 1984). A client who forms a strong expectation of success in therapy might conclude later that even a useless treatment had worked wonders—by recalling past symptoms and troubles as worse than they were and thereby making the treatment seem effective.

A person who enters treatment is often anxious to get well and so may be especially likely to succumb to errors and illusions in assessing the effectiveness of the treatment. Treatments can look as if they worked when mindbugs lead us to ignore natural improvement, to overlook nonspecific treatment effects (e.g., the placebo effect), and to reconstruct our pretreatment history as worse than it was. Such treatment illusions can be overcome by using scientific methods to evaluate treatments—rather than trusting only our potentially faulty personal skills of observation.

Treatment Studies

How can treatment be evaluated in a way that allows us to choose treatments that work and not waste time with procedures that may be useless or even harmful? Treatment studies depend generally on the research design concepts covered in Chapter 2 but also depend on some ideas that are unique to the evaluation of psychological treatments.

There are two main types of treatment studies: outcome studies and process studies. *Outcome studies* are designed to evaluate *whether* a particular treatment works, often in relation to some other treatment or a control condition. For example, to study the outcome of treatment for depression, researchers might compare the self-reported moods and symptoms of two groups of people who were initially depressed—those who had received a treatment for 6 weeks and a control group who had also been selected for the

study but had been assigned to a waiting list for later treatment and were simply tested 6 weeks after their selection. The outcome study could determine whether this treatment had any benefit.

Process studies are designed to answer questions regarding *why* a treatment works or under what circumstances a treatment works. For example, process researchers might examine whether a treatment for depression is more effective for certain clients than others. Process studies also can examine whether some parts of the treatment are particularly helpful, whereas others are irrelevant to the treatment's success. Process studies can refine therapies and target their influence to make them more effective.

Both outcome and process studies can be plagued by treatment illusions, so scientists usually design their research to overcome them. For example, the treatment illusions caused by natural improvement and reconstructive memory happen when people compare their symptoms before treatment to their symptoms after treatment. To avoid this, researchers typically compare an treatment (or experimental) group and a control group need to be randomly selected from the same population of patients before the study and then compared at the end of treatment. That way, natural improvement or motivated reconstructive memory can't cause illusions of effective treatment.

But what should happen to the control group during the treatment? If they simply stay home waiting until they can get treatment later (a wait-list control group), they won't receive the nonspecific effects of the treatment that the treatment group enjoys (such as visiting the comforting therapist or taking a medication). So, ideally, a treatment should be assessed in a *double-blind experiment*—a study in which both the patient and the researcher/therapist are uninformed about which treatment the patient is receiving (see Chapter 2). In the case of drug studies, this isn't hard to arrange because active drugs and placebos can be made to look alike to both the patients and the researchers during the study. Keeping both patients and researchers "in the dark" is much harder in the study of psychotherapy; in fact, it may even be impossible. Both the patient and the therapist can easily notice the differences in treatments such as psychoanalysis and behavior therapy, for example, so there's no way to keep the beliefs and expectations of both patient and therapist out of the picture in evaluating psychotherapy effectiveness.

● Why is a double-blind experiment so important in assessing treatment effectiveness?

COLLEEN CAHILL/AGEFOTOSTOCK

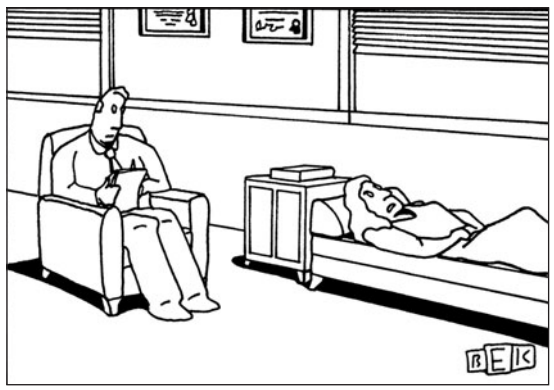
Many psychological disorders don't play favorites with one gender or the other, but anxiety and depression are more common for women than men.

Which Treatments Work?

The distinguished psychologist Hans Eysenck (1916–1997) reviewed the relatively few studies of psychotherapy effectiveness available in 1957 and raised a furor among therapists by concluding that psychotherapy—particularly psychoanalysis—not only was ineffective but seemed to *impede* recovery (Eysenck, 1957). Much larger numbers of studies have been examined statistically since then, and they support a more optimistic conclusion: The typical psychotherapy client is better off than three quarters of untreated individuals (Seligman, 1995; Smith, Glass, & Miller, 1980). Although critiques of psychotherapy continue to point out weaknesses in how patients are tested, diagnosed, and treated (Dawes, 1994), strong evidence generally supports the effectiveness of many treatments. The key question then becomes, Which treatments are effective for which problems (Hunsley & Di Giulio, 2002)?

● What is the current thinking about the effectiveness of psychotherapy?

One of the most enduring debates in clinical psychology concerns how the various psychotherapies compare to one another. Some psychologists have argued for years that evidence supports the conclusion



"Well, I do have this recurring dream that one day I might see some results."

St. Panacea was a shepherdess born in Italy in 1378. The name Panacea means "all healing," and a remedy for all that ails us is something we all would love. But a treatment that heals everything could be too much of a wish come true. Psychotherapy researchers worry that if any version of psychotherapy is effective for any mental disorder, the "active ingredient" of psychotherapy may be so general that the treatment could be meaningless.

© ROBERT M. PLACE DESIGNS

that most psychotherapies work about equally well. In this view, it is the nonspecific factors shared by all forms of psychotherapy, such as contact with and empathy from a professional, that contribute to change (Luborsky et al., 2002; Luborsky & Singer, 1975). In contrast, others have argued that there are important differences between therapies and that certain treatments are more effective than others, especially for treating particular types of problems (Beutler, 2002; Hunsley & Di Giulio, 2002). Yet others have noted that some treatments such as long-term psychodynamic therapy are not easily studied, because of the difficulty of establishing a control group, and because the therapy typically takes a long time—but this doesn't mean that psychotherapy may not be effective nonetheless.

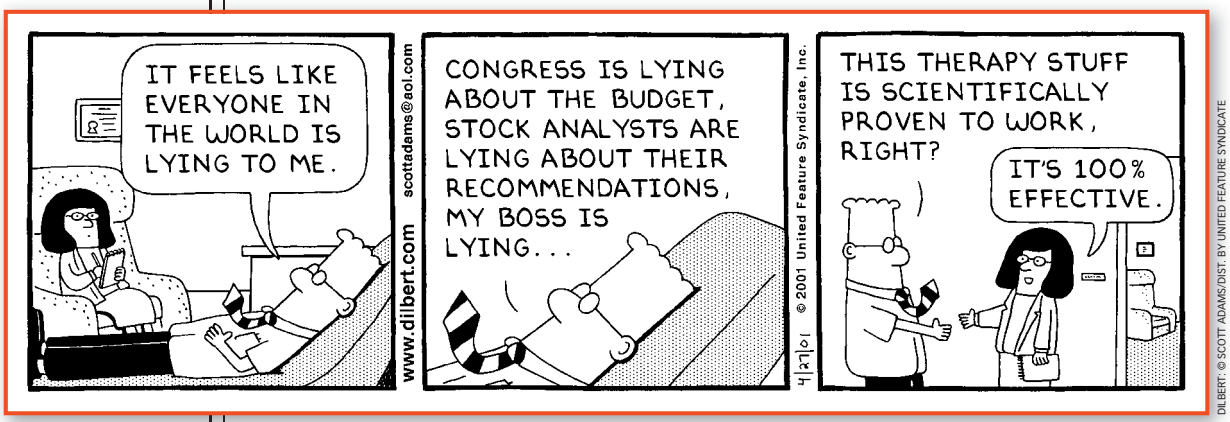
Even trickier than the question of establishing whether a treatment works is whether a psychotherapy or medication might actually do damage. The dangers of drug treatment should be clear to anyone who has read a magazine ad for a drug—and studied the fine print with its list of side effects, potential drug interactions, and complications. Many drugs used for psychological treatment may be addictive, creating long-term dependency with serious withdrawal symptoms. The strongest critics of drug treatment claim that drugs do no more than trade one unwanted symptom for another—trading depression for sexual disinterest, anxiety for intoxication, or agitation for lethargy and dulled emotion (see, e.g., Breggin, 2000).

The dangers of psychotherapy are more subtle, but one is clear enough in some cases that there is actually a name for it: **Iatrogenic illness** is *a disorder or symptom that occurs as a result of a medical or psychotherapeutic treatment itself* (e.g., Boisvert & Faust, 2002). Such an illness might arise, for example, when a psychotherapist becomes convinced that a client has a disorder that in fact the client does not have. As a result, the therapist works to help the client accept that diagnosis and participate in psychotherapy to treat that disorder. Being treated for a disorder can, under certain conditions, make a person show signs of that very disorder—and so an iatrogenic illness is born.

There are cases of patients who have been influenced through hypnosis and repeated suggestions in therapy to believe that they have dissociative identity disorder (even coming to express multiple personalities) or to believe that they were subjected to traumatic events as a child and "recover" memories of such events when investigation reveals no evidence for these problems prior to therapy (Acocella, 1999; McNally, 2003; Ofshe & Watters, 1994). There are people who have entered therapy with a vague sense that something odd has happened to them and who emerge after hypnosis or other imagination-enhancing techniques with the conviction that their therapist's theory was right: They were abducted by space aliens (Clancy, 2005). Needless to say,

ONLY HUMAN

AT LEAST THE DUCK GOT REIMBURSED BY THE SPCA In 1997, Ms. Nadean Cool won a settlement of $2.4 million in her lawsuit in Appleton, Wisconsin, against her former psychotherapist, Dr. Kenneth Olson. She claimed that he had first persuaded her that she had a multiple personality disorder (120 personalities, including Satan and a duck) and then billed her insurance company for "group" therapy because he said he had to counsel so many people. (Olson, seeking greener pastures for his psychotherapy business, has since moved to Montana.)



a therapy that leads patients to develop such bizarre beliefs is doing more harm than good.

To regulate the potentially powerful influence of therapies, psychologists hold themselves to a set of ethical standards for the treatment of people with mental disorders (American Psychological Association, 2002). Adherence to these standards is required for membership in the American Psychological Association, and state licensing boards also monitor adherence to ethical principles in therapy. These ethical standards include (1) striving to benefit clients and taking care to do no harm; (2) establishing relationships of trust with clients; (3) promoting accuracy, honesty, and truthfulness; (4) seeking fairness in treatment and taking precautions to avoid biases; and (5) respecting the dignity and worth of all people. When people suffering from mental disorders come to psychologists for help, adhering to these guidelines is the least that psychologists can do. Ideally, in the hope of relieving this suffering, they can do much more.

"First, I'd like to thank everyone who believed in me."

summary quiz [13.4]

12. Joe attributes the lessening of his depression to the medication he took. But in fact, his improvement was the result of positive interactions with his pleasant, supportive therapist. This phenomenon illustrates a treatment illusion called
- a. regression to the mean.
- b. nonspecific treatment effects.
- c. natural improvement.
- d. error in reconstructive memory.

13. Dr. Carolyn Johnson is studying whether Drug X is more effective in treating anxiety in women than in men. Her research is an example of a(n)
- a. double-blind experiment.
- b. placebo control.
- c. outcome study.
- d. process study.

14. Which statement is true regarding treatments for psychological disorders?
- a. Receiving psychotherapy does not lead to any more improvement than no treatment at all.
- b. Drug treatments for psychological problems are prescribed only if there are no known side effects.
- c. A disorder or symptom may occur as a result of the treatment itself.
- d. Treatments that take a long time, such as psychodynamic therapy, are usually ineffective.

iatrogenic illness A disorder or symptom that occurs as a result of a medical or psychotherapeutic treatment.

WhereDoYouStand?

Should Drugs Be Used to Prevent Traumatic Memories?

Medication can be an effective means of treating the symptoms of psychological disorders. Is medication also an effective way of *preventing* psychological disorders? Psychiatrist Roger Pitman's controversial studies of posttraumatic stress disorder (PTSD; see Chapter 15) focus on the use of the drug propranolol to prevent the consolidation of distressing memories after traumatic events. One of the key symptoms of PTSD is the presence of vivid and intrusive memories of a traumatic event such as a car accident or being the victim of a physical or sexual assault. If these memories are such prominent symptoms of PTSD, can we avoid the disorder if we prevent these memories from being associated with unpleasant emotions?

The idea that the emotional consequences of traumatic memories might be blocked is based on the role of brain structures and chemicals in the consolidation of emotional memories. Researchers have confirmed that the amygdala and the hippocampus are involved in emotional memory (McNally, 2003). Propranolol is a drug that dampens emotional arousal by blocking beta-adrenergic receptors in the peripheral and central nervous system; this weakens the effects of chemicals such as adrenaline on receptors in these brain areas. If arousal cues were dampened by the administration of propranolol

immediately after the trauma, perhaps the memories of the event would not be linked so strongly with the emotional response to the trauma.

To test this hypothesis, Pitman and his colleagues gave people who had experienced a traumatic event either propranolol or a placebo (sugar pill) when they arrived in an emergency room right after the trauma. On follow-up, the researchers found that the group given propranolol was significantly less physiologically reactive later when listening to a tape about their accident than those given the placebo (Pitman et al., 2002). This medication does not prevent memories from forming, but it seems to prevent them from becoming associated with upsetting emotions.

Some people question whether researchers should be tampering with memory at all. A *New York Times Magazine* article argued that our painful memories are essential in shaping us into caring human beings with empathy toward others (Henig, 2004). Opponents of such research also point out that our memories, good and bad, make us who we are. Proponents of the approach note that the treatment is not meant to *remove* unpleasant memories, only to reduce the emotional arousal which, in PTSD patients, leads to such debilitating symptoms.

Where do you stand? Should people be given drugs to reduce the influence of traumatic events on their memories? Would you want to take such a drug if you suffered a trauma? By taking such a drug, do you feel you might be losing an experience that makes you you?

CHAPTER REVIEW

Summary

Treatment: Getting Help to Those Who Need It

- Mental illness is often misunderstood, and because of this, it too often goes untreated.
- Untreated mental illness can be extremely costly, affecting an individual's ability to function and also causing social and financial burdens.
- Many people who suffer from mental illness do not get the help they need; they may be unaware that they have a problem, they may face obstacles to getting treatment, and they simply may not know where to turn.
- Treatments include psychotherapy, which focuses on the mind, and medical and biological methods, which focus on the brain and body.

Psychological Therapies: Healing the Mind through Interaction

- Psychodynamic therapies, including psychoanalysis, emphasize helping clients gain insight into their unconscious conflicts.
- Behavior therapy applies learning principles to specific behavior problems; cognitive therapy aims at challenging irrational thoughts. Cognitive behavior therapy (CBT) merges these approaches.
- Humanistic approaches (e.g., person-centered therapy) and existential approaches (e.g., Gestalt therapy) focus on helping people to develop a sense of personal worth.
- Group therapies target couples, families, or groups of clients brought together for the purpose of therapy.

Medical and Biological Treatments: Healing the Mind through the Brain

- Medications have been developed to treat many psychological disorders, including antipsychotic medications (used to treat schizophrenia and psychotic disorders), antianxiety medications (used to treat anxiety disorders), and antidepressants (used to treat depression and related disorders).
- Medications are often combined with psychotherapy.
- Other biomedical treatments include electroconvulsive therapy (ECT), transcranial magnetic stimulation (TMS), and psychosurgery—this last used in extreme cases, when other methods of treatment have been exhausted.

Treatment Effectiveness: For Better or for Worse

- Observing improvement during treatment does not necessarily mean that the treatment was effective; it might instead reflect natural improvement, nonspecific treatment effects (e.g., the placebo effect), and reconstructive memory processes.
- Treatment studies focus on both treatment outcomes and processes, using scientific research methods such as double-blind techniques and placebo controls.
- Treatments for psychological disorders are generally more effective than no treatment at all, but some are more effective than others for certain disorders, and both medication and psychotherapy have dangers that ethical practitioners must consider carefully.

Key Terms

psychotherapy (p. 402)
eclectic psychotherapy (p. 402)
psychodynamic psychotherapies (p. 402)
resistance (p. 403)
transference (p. 403)
interpersonal psychotherapy (IPT) (p. 404)
behavior therapy (p. 404)
token economy (p. 405)
exposure therapy (p. 405)
systematic desensitization (p. 405)
cognitive therapy (p. 405)
cognitive restructuring (p. 406)

mindfulness mediation (p. 406)
cognitive behavioral therapy (CBT) (p. 406)
person-centered therapy (p. 408)
Gestalt therapy (p. 408)
group therapy (p. 409)
antipsychotic drugs (p. 412)
psychopharmacology (p. 412)
antianxiety medications (p. 413)
antidepressants (p. 413)
electroconvulsive therapy (ECT) (p. 417)
transcranial magnetic stimulation (TMS) (p. 417)
psychosurgery (p. 418)
placebo (p. 419)
iatrogenic illness (p. 422)

Critical Thinking Questions

1. Psychodynamic psychotherapies focus on exploring childhood events to understand current psychological problems. In contrast, behavioral therapy assumes that disordered behavior is learned and that symptom relief is achieved through changing behaviors, sometimes through conditioning principles, while cognitive therapies use cognitive restructuring to teach clients to replace negative thinking with more realistic and positive beliefs.

   Suppose a young man comes to visit a therapist, reporting that he's been extremely depressed since the death of his mother, who raised him single-handedly after his father died. It's been over a year since her death, but the man is still experiencing extreme sadness and hopelessness, as well as loss of appetite and trouble sleeping.

   How might a psychologist who follows each of the above systems begin therapy?

2. Some antidepressant medications, called benzodiazepines, work by facilitating the action of the neurotransmitter GABA, which inhibits certain types of neurons in the brain.

   Back in Chapter 8, you read about a widely used, legally available psychoactive drug that also increases GABA. What was it? How are the effects of this drug similar to those of the benzodiazepines?

3. Treatment illusions are mindbugs in which an individual's improvement is mistakenly attributed to a treatment for a mental disorder.

   Suppose you experience a severe panic attack every time you walk into your organic chemistry class; the symptoms are so bad that you can't concentrate on the lesson, and you're sure you'll fail the class. You visit a psychiatrist, who prescribes an antianxiety medication. The next time you attend the class, you feel much calmer and more confident. Possibly, the medication is causing chemical changes in your brain that are resulting in a reduction of anxiety. But name three other ways in which treatment illusions could be responsible for your reduction in symptoms.

Answers to Summary Quizzes

Summary Quiz 13.1
1. d; 2. b; 3. c

Summary Quiz 13.2
4. d; 5. c; 6. b; 7. a

Summary Quiz 13.3
8. c; 9. b; 10. a; 11. d

Summary Quiz 13.4
12. b; 13. d; 14. c