

CHAPTER 19

METHODS OF THERAPY

Chapter at a Glance

SECTION 1: What Therapy Is and Does

- The various methods of psychotherapy seek to help troubled individuals.
- There are a variety of methods and types of professionals involved in psychotherapy.
- Individual therapy and group therapy both have advantages.

SECTION 2: The Psychoanalytic and Humanistic Approaches

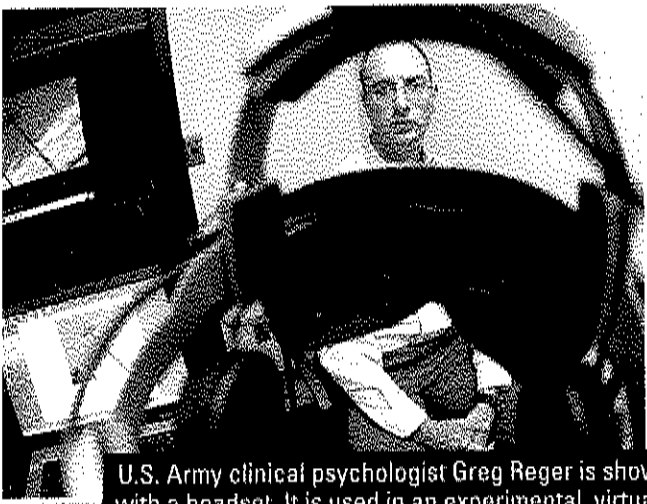
- Psychoanalysis is a method of therapy that was developed by Sigmund Freud.
- Some of the techniques of psychoanalysis include free association, dream analysis, and transference.
- The primary goal of humanistic therapy is to help individuals reach their full potential.

SECTION 3: Cognitive Therapy and Behavior Therapy

- The aim of cognitive therapy is to help people learn to think about their problems in more productive ways.
- The goal of behavior therapy is to help people develop more adaptive behavior.

SECTION 4: Biological Therapy

- Biological therapy relies on medication, electric shock, and surgery to help people deal with psychological disorders.
- Because these treatments are medical in nature, they must be administered by a physician.
- Electroconvulsive therapy and psychosurgery are both controversial procedures.



U.S. Army clinical psychologist Greg Reger is shown with a headset. It is used in an experimental virtual-reality computer simulation designed to treat soldiers suffering from post-traumatic stress disorder (PTSD).

induced by combat in Iraq. Symptoms experienced by the soldiers include nightmares, flashbacks, obsessive thoughts, detachment, and anger. Some soldiers completely withdraw from society.

During the treatment, the soldier attempts to deal with PTSD by means of a computer-simulated environment. He or she wears a helmet with video goggles and earphones. A modified version of a popular war video game is also part of the program. Sights, sounds, and smells are created to help manage the painful memories of combat in Iraq.

The U.S. Department of Defense is testing Virtual Iraq as one of three virtual reality programs it is developing for the treatment of post-traumatic stress disorder. If the virtual reality therapy proves itself in clinical tests, it will likely become widely used in the treatment of PTSD in returning Iraqi war veterans. This approach to treatment for PTSD may also be useful for soldiers returning from Afghanistan. In this chapter you will learn more about different kinds of therapy.

What do you think?

1. Why might virtual therapy have some limitations to its usefulness?
2. Why might people be more willing to face their fears in a virtual setting than in a real one?

What Therapy Is and Does

Before You Read

Main Idea

Therapy falls into two basic categories: psychologically based therapy and biologically based therapy. Both forms of therapy can help people increase awareness and change behavior.

Reading Focus

1. What are the main goals of psychotherapy?
2. What are the three main categories of professionals who practice psychotherapy?
3. How do individual and group therapy compare?

Vocabulary

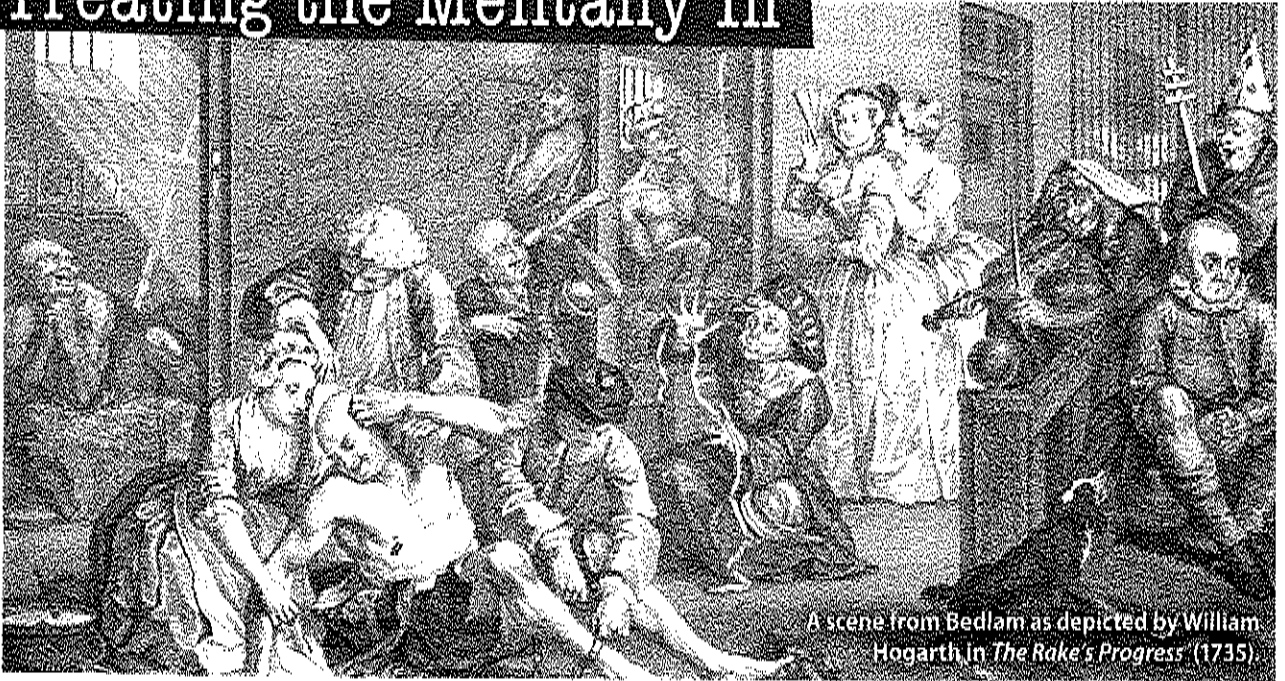
psychotherapy
self-help group

TAKING NOTES

Use a graphic organizer like this one to take notes on the various types of mental health professionals.

Types of Mental Health Professionals	

Treating the Mentally Ill



A scene from Bedlam as depicted by William Hogarth in *The Rake's Progress* (1735).

PSYCHOLOGY CLOSE UP

How did the name of a hospital become a synonym for uproar and disorder? Bedlam was the

byname for the first hospital for people with mental illnesses established in England. It was founded in 1247 as a priory (a monastery or convent). The founder was Simon FitzMary, a former sheriff of London. St. Mary of Bethlehem (also called Bethlem) was first mentioned as a hospital in 1330. Patients resided there by 1403.

In 1547, Henry VIII gave Bethlem Hospital and its revenues to the City of London as a hospital for the mentally

ill. Eventually it became notorious for the brutal treatment of its residents. Visitors would come on holiday outings to mock the appearance and behavior of the patients. Residents endured unsanitary conditions and beatings, as well as other harsh treatment. Eventually the word *bedlam* came to be used for all asylums and is still used to describe an uproar.

Today, the treatment of people with psychological disorders has improved. Sophisticated methods of therapy help individuals with psychological problems to function in society rather than be separated from society. ■

Achieving the Goals of Psychotherapy

Methods for treating psychological problems and disorders fall into two general categories: psychological methods, or methods of psychotherapy, and biological methods. The methods of psychotherapy aim to change the thought processes, feelings, or behavior of the individual. These methods are based on psychological principles. In contrast, biological therapies attempt to alleviate psychological problems by affecting the nervous system in some way. This chapter examines different methods of therapy for psychological problems. Often therapists blend these methods.

Therapy is a general term for the variety of approaches that mental health professionals use to treat psychological problems and disorders. Psychologically based therapy, known as **psychotherapy**, involves verbal interactions between a trained professional and a person (the client or patient) who is seeking help for a psychological problem. Biologically based therapies involve the use of drugs or other medical procedures to treat psychological disorders.

Although the various methods of psychotherapy use different approaches, they all seek to help troubled individuals. They do this by giving individuals hope for recovery; helping individuals gain insights or new perspectives on their problems; and providing the individual with a caring, trusting relationship with a mental health professional.

Providing hope for recovery is very important because most people who seek therapy have problems they believe they cannot handle alone. They may have low self-esteem and lack the confidence to recognize that their situation can improve. Just the belief that therapy will help them is enough to put many people on the road to recovery. This reaction is similar to the placebo effect, about which you learned earlier.

Helping the individual gain insight or a new perspective is important because many psychological problems are the result of negative outlooks and misinterpretations. For example, someone who is depressed is likely to have poor self-esteem. This person may be able to see only the negative side of every situation and may feel responsible for that nega-

tivity. Changing this individual's outlook and perceptions may help to relieve the depressed mood and to improve his or her self-esteem.

Providing a caring, trusting relationship is important because people with psychological problems often feel isolated, afraid, and distrustful of others. Psychotherapy encourages individuals to talk freely about their feelings and problems. Therefore, a trusting relationship with the therapist is essential to the process. Establishing such a relationship between client and therapist is a key goal of psychotherapy.

In addition to providing hope, a new perspective, and a trusting relationship, all psychotherapy methods share the goal of bringing about changes in individuals seeking help. In the case of an individual who is depressed, for example, the psychotherapist tries to help the client develop a more positive outlook and higher self-esteem. In the case of a person experiencing a phobia, the psychotherapist helps the individual become desensitized, or less likely to react, to the object of fear.

The most commonly used methods of psychotherapy are psychoanalysis, humanistic therapy, cognitive therapy, and behavior therapy. The chart on the next page summarizes the main features of these methods.

Each method of psychotherapy has a different goal and different ways of achieving that goal. Some psychotherapists use just one method. Others use an **eclectic** approach; that is, they choose from a variety of methods, depending on what works best for the individual client. Which method is the most effective often depends on the nature of the psychological problem.

This raises the issue of the effectiveness of psychotherapy in general. Although some people find that psychotherapy does not help them, many people seem to benefit from it. However, it is difficult to know how those who benefit would have done in the absence of treatment.

Some people feel better about themselves as time goes on, even without treatment; others find solutions to their problems on their own, without benefit of therapy. Nonetheless, research on the effectiveness of psychotherapy is encouraging.

Reading Check **Find the Main Idea** What is one of the key goals of psychotherapy?

ACADEMIC VOCABULARY

eclectic selecting elements from a variety of sources, systems, or styles

Methods of Psychotherapy

The main goals of commonly used methods of psychotherapy are shown below.

Psychoanalysis to replace avoidant behavior with coping behavior; to reduce inappropriate feelings of anxiety and guilt

Humanistic Therapy to remove obstacles in the path of self-actualization

Cognitive Therapy to replace self-defeating attitudes and beliefs with rational, self-enhancing attitudes and beliefs

Behavior Therapy to replace self-defeating behavior with adaptive, self-enhancing behavior

Skills Focus INTERPRETING CHARTS

What goal might all these methods of psychotherapy have in common?

Psychotherapy in Practice

Many types of professionals are involved in the treatment of psychological problems and disorders. However, it is primarily psychologists, psychiatrists, and social workers who practice psychotherapy.

Types of Mental Health Professionals

Counseling psychologists generally treat people with less serious psychological problems, such as adjustment problems. These psychologists often work in schools and other educational institutions, where they counsel people about their personal problems.

Clinical psychologists help people with psychological problems adjust to the demands of life. Their clients' problems may range from anxiety to loss of motivation. Many clinical psychologists work in hospitals or clinics, while others work in community mental health centers or in private practice.

Psychiatrists are medical doctors, and many have private practices. Because they are

physicians, psychiatrists are the only mental health professionals in most states who can prescribe medication and administer other types of biological therapy. Other professionals who think their clients might benefit from medication must consult with a psychiatrist. A psychologist or social worker, for example, might refer a client to a psychiatrist.

Other professionals who help people with psychological problems include psychiatric social workers and psychiatric nurses. Both have special training in psychology and usually work with other medical or mental health professionals. Psychiatric social workers may work in community mental health clinics, general hospitals, and hospitals for the mentally ill. They may also practice psychotherapy in a private office where they counsel individual clients as well as families.

Teachers, guidance counselors, clergy, and family doctors may also help individuals with problems. Such professionals may have little formal training in psychology. However, they are often the people that troubled individuals turn to first for help. A student, for example, might go to a teacher for advice on dealing with test anxiety, or ask a guidance counselor for help in making a career decision.

Selecting the Right Professional Those seeking help for a psychological problem should familiarize themselves with the various practitioners and the type of treatment each offers. One way that people can gain that information is to ask questions.

- What is the professional's field? For example, people with psychological problems should see people who belong to a profession, such as psychology, psychiatry, medicine, social work, or nursing.
- What degrees does the professional hold? Psychiatrists have medical degrees; psychologists usually have doctoral degrees; and social workers usually have master's degrees. The appropriate degrees ensure the professional is trained to help people.
- Is the professional licensed by the state? All states require licensing of psychologists and psychiatrists. Some states also require the licensing of social workers and nurses. To be issued a state license, professionals must pass exams or demonstrate expertise in other ways.

- What are the therapist's plans for treatment, and how long will treatment likely take? There is variation in the nature and duration of treatment for different methods of psychotherapy. The individual should know in advance what to expect from the treatment method.
- What is the estimated cost of treatment? Psychotherapy can be expensive, and it is not always covered by health insurance plans. Although cost should not have to be the deciding factor in choosing a therapist, for some people it must be, simply because they cannot afford to go into debt to receive treatment.

Reading Check Identify Supporting Details Why must psychiatrists also be physicians?

Individual Versus Group Therapy

Therapists use methods of psychotherapy with individuals or groups. Frequently, people who seek help for psychological problems have a choice between individual and group therapy. To make the best choice, it is important to be aware of the advantages of each type.

Advantages of Individual Therapy Some people do better with individual therapy because they need more personal attention than they would receive as part of a group. Moreover, some people feel uncomfortable talking about their problems in front of other people. These individuals are likely to talk more openly and freely if they are alone with their therapist.

Advantages of Group Therapy Group therapy can, however, have certain advantages over individual therapy. In fact, many people who begin seeing a therapist individually eventually switch to group therapy.

One advantage of group therapy is that it helps individuals realize that they are not alone. People can see other group members struggling with problems similar to their own. In this way, members of the group can often benefit from the insights gained by other group members who have gone through similar struggles.

Group members can support each other because they have had similar experiences—they have “been there” themselves. Group

therapy also gives individuals a chance to practice coping and other social skills in a supportive environment.

One of the most significant advantages of group therapy is that it shows individuals that therapy can work to help them with their problems. People see other members of the group recovering, and this gives them hope of recovery for themselves.

From a practical standpoint, group therapy enables the therapist to work with several people at once. In addition, it often allows a therapist to immediately see people who might otherwise have to be placed on a waiting list to receive individual help. It is also more affordable for clients because they share the cost of the therapist's time and do not have to bear the full cost of the session.

Types of Group Therapy There are several types of group therapy, including couples therapy, family therapy, and therapy for people who share similar problems. These problems might include an eating disorder, a substance-abuse issue, money problems, or the grief created by the loss of a loved one. Couples therapy tries to help two people improve or find more satisfaction in their relationship with each other.

TYPES OF PROFESSIONAL THERAPISTS

Quick Facts

Several types of professionals practice psychotherapy. Five are listed here, along with their training, examples of their workplaces, and typical therapeutic activities.

Counseling Psychologist, Ph.D., Psy.D., or Ed.D.

Educational institutions such as colleges and high schools, or in businesses; refers clients with serious problems to clinical psychologist

Clinical Psychologist, Ph.D., Psy.D., or Ed.D.

Works in hospitals and clinics; assists and treats people with psychological problems

Psychiatrist, M.D.

Able to prescribe medicine and perform operations

Psychiatric Social Worker, M.S.W.

Counsels people with everyday personal and family problems

Psychiatric Nurse, R.N.

Dispenses medicine and acts as a contact person between counseling sessions

Couples therapy helps people communicate more effectively by helping them learn new ways to listen to each other and to express their feelings. Such therapy also helps couples discover ways to resolve conflicts and handle intense emotions.

Family therapy aims to help troubled families by improving communication and relations among family members. It also seeks to promote the family's emotional growth.

Family therapy is based on the assumption that the lives of family members are intertwined. Therefore, the family as a whole is likely to suffer when one member has a problem that goes untreated. Inevitably, such an untreated problem will affect other members of the family. Children, for example, might begin to display symptoms that come to the notice of teachers and other students in their school.

For example, a parent may be addicted to alcohol and become abusive when intoxicated. The abuse may lead to low self-esteem, anxiety, and depression in other family members. Or a family might seek family therapy to help them cope with a family member's schizophrenia. Others might seek family therapy to help them adjust to a divorce.

Self-help groups are composed of people who share the same problem, such as overeating, drug addiction, or compulsive gambling.

Members of a self-help group meet regularly—often without a therapist—to discuss their problems, share solutions, and give and receive support.

Again, take the problem of alcoholism. There are a variety of treatment options for alcoholics. Treatment programs include both inpatient and outpatient care. Inpatient centers provide a sheltered place to go through withdrawal while getting counseling.

One of the best-known self-help groups is Alcoholics Anonymous (AA). AA has served as a developmental model for many other self-help programs. The AA method for recovery involves 12 steps. Through regular meetings and shared experiences, AA members bring themselves and each other closer to a life that is free of alcohol and full of emotional, physical, social, and spiritual well-being.

Al-Anon and Alateen are programs that provide treatment and support for the families of alcoholics. Al-Anon is designed to help family members talk about and share advice on the problem of living with an alcoholic. Alateen is specifically designed to help teenagers cope with this situation. There are local chapters of AA, Al-Anon, and Alateen in just about every community in the United States.

Reading Check Identify What are the advantages of a self-help group?

SECTION 1 Assessment

Reviewing Main Ideas and Vocabulary

1. **Identify** Which method of therapy attempts to remove obstacles in the path of self-actualization?
2. **Recall** Which therapy involves verbal interactions between a trained professional and a client who is seeking help for a psychological problem?
3. **Describe** Which mental health professional may prescribe medications?

Thinking Critically

4. **Summarize** What is the goal of couples therapy?
5. **Draw Conclusions** What questions should one ask when selecting a psychotherapist?

6. **Evaluate** Using your notes and a graphic organizer like the one below, explain the advantages and disadvantages of each type of psychotherapy



FOCUS ON WRITING

7. **Expository** Write a paragraph in which you explain which method of psychotherapy you think would be most useful for most people, and why.

The Psychoanalytic and Humanistic Approaches

Before You Read

Main Idea

Psychoanalysis and humanistic therapy are two important methods of treatment.

Reading Focus

1. How did Freud view the role of psychoanalysis?
2. What are some of the methods of psychoanalysis?
3. What is the goal of humanistic therapy?

Vocabulary

free association
resistance
dream analysis
manifest content
latent content
transference
humanistic therapy
person-centered therapy
nondirective therapy
active listening

TAKING NOTES

Use a graphic organizer like this one to take notes on the methods of psychoanalysis.

Methods of Psychoanalysis	
Free Association	
Dream Analysis	
Transference	

LOOKING FOR

Hidden Meanings

PSYCHOLOGY CLOSE UP

What do dreams mean? Have you ever had a recurring dream, one that kept coming back to haunt your sleep,

maybe a couple of times a week or even nightly? For example, a six-year-old boy reported a recurring dream in which he was standing at one end of a dark corridor. From the other end, silhouetted against a bright light, a tall dark figure approached him. The man who walked toward him had only one arm, and in his hand he carried a shovel. The boy stood paralyzed, unable to move. Then just before the dark figure reached him, and before the boy could see his face, the boy floated up to the ceiling. Although the dark figure grabbed for him in an attempt to pluck him down from the ceiling, the boy bobbed up and out of reach.

You may have had a recurring dream, too. A very common one is the final exam dream, in which you arrive for an important test, only to find that you are not prepared. Perhaps you studied the wrong material, or you brought the wrong supplies, or you are not appropriately dressed or not dressed at all.

In some methods of therapy, dreams may provide a way into unconscious hopes and fears. Some psychologists think that dreams express both apparent and hidden fears and desires. ■



Freud and Psychoanalysis

Psychoanalysis, the model of therapy developed by Sigmund Freud, literally means “analysis of the psyche (mind).” Psychoanalysis was the first formal method of psychotherapy used in Western countries. For many years, it was the only method used. In recent decades, however, it has become less popular.

Freud believed that most psychological problems originate in early childhood experiences and inner conflicts. These conflicts can cause people to develop unconscious sexual and aggressive urges that, in turn, cause anxiety. For Freud, guilt occurs when the urges enter conscious thought or when the individual acts upon them. Guilt also leads to more anxiety.

Psychoanalysts try to reduce anxiety and guilt by helping clients become aware of the unconscious thoughts and feelings that are believed to be at the root of their problems. Psychoanalysts call this self-awareness *insight*. Once insight has been gained, clients can use the knowledge to resolve problems.

Reading Check Find the Main Idea For Freud, what was the source of most psychological problems?

Methods of Psychoanalysis

Some of the techniques psychoanalysts use to help clients gain insight include free association, dream analysis, and transference.

Free Association The primary technique of psychoanalysis is **free association**. In free association, the analyst asks the client to relax and then to say whatever comes to mind. Free association developed from Freud’s early use of hypnosis to tap into his clients’ unconscious thoughts and feelings. The use of free association instead of hypnosis enables the client to participate more actively in the analysis.

The topic of the free association might be a memory, dream, fantasy, or recent event. The assumption is that, as long as the client associates freely, unconscious thoughts and feelings will “break through” and show up in what the client says. The client is encouraged to say whatever comes to mind, no matter how trivial, embarrassing, or painful the ideas may seem. In fact, psychoanalysts believe that the more hesitant the patient is to say something,

the more likely it is that the hesitancy reflects an unconscious thought or feeling.

Resistance is the term psychoanalysts use to refer to a client’s reluctance to discuss issues raised during free association. Therapists using free association think that resistance reflects a defense mechanism, such as the repression or denial of painful feelings.

The role of the analyst in free association is to point out the types of things the client is saying—or resisting saying—and to help the client interpret the meaning of the utterances or lack thereof. Psychoanalysts believe that free association allows the client to express troubling thoughts and feelings in a safe environment where those thoughts and feelings may be explored. Through such means, clients gain insight into their problems.

Dream Analysis Freud believed that dreams express unconscious thoughts and feelings. He called them the “royal road into the unconscious.” In a technique called **dream analysis**, the analyst interprets the content of dreams to unlock these thoughts and feelings.

Freud also distinguished between the manifest and latent content of dreams. **Manifest content** refers to the actual content of the dream as it is remembered by the client. **Latent content** refers to the hidden meaning in the dream, which the therapist interprets from the manifest content. For example, a client may dream about falling from a mountain and being unable to grab anything to break his fall (manifest content). The therapist might interpret the dream to mean that the client has repressed feelings that his life is out of control (latent content).

Transference As analysis proceeds, many clients begin to view their relationship with their analyst as being similar to one they have or had with another important person in their lives, often a parent. They experience similar feelings toward the analyst and expect the analyst to feel and behave as the other person did. In other words, the client is transferring feelings and expectations from one person to another. This process is called **transference**.

Psychoanalysts make use of transference to help the client express and analyze unconscious feelings he or she has toward that other important person. In fact, establishing a transference relationship is a major goal of

ACADEMIC VOCABULARY

repressed
excluded from the
conscious mind

Free Association

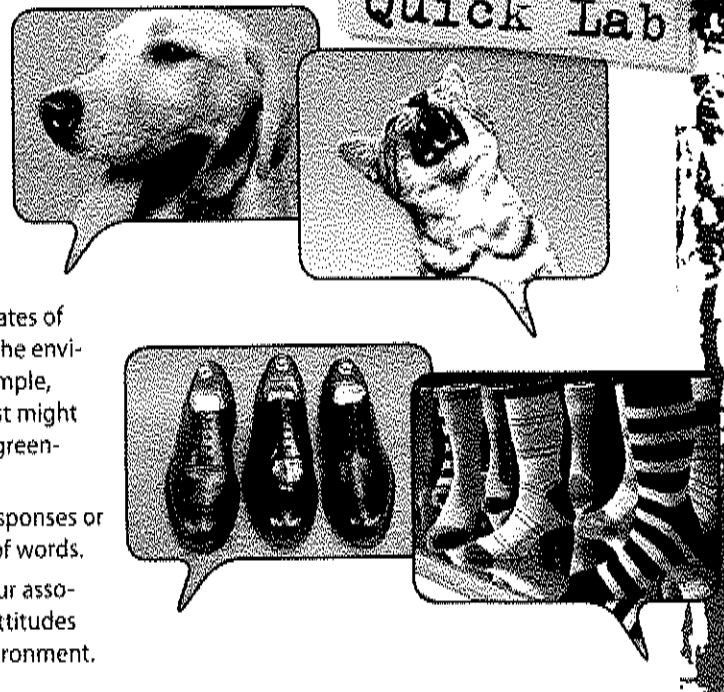
In free association, the analyst tells the client to relax and say whatever pops into his or her mind. If someone says the word "dog" to you, "cat" might pop into your mind, or "shoe" might call up "sock."

PROCEDURE

1. Pair off with another student.
2. Make up a list of words that deal with an important topic such as the environment or political elections.
3. One of you reads each word while the other comes up with a one-word response.

ANALYSIS

1. Make a list with your classmates of words that have to do with the environment or politics. For example, for the environment, your list might include "global warming," "greenhouse gases," and so forth.
2. Make another list of their responses or associations to the first list of words.
3. As a group, discuss what your associations reveal about your attitudes toward politics and the environment.



psychoanalysis. Psychoanalysts believe that transference exposes unresolved problems in earlier relationships. The client can then work through these problems, with the help of the analyst, in order to solve similar problems in current relationships.

Evaluation of Psychoanalysis Many psychologists believe that Freud placed too much emphasis on sexual and aggressive urges. Some argue that he underestimated the importance of conscious ideas and changes in behavior. Despite these criticisms, however, a classic review of dozens of studies concluded that people who had received psychoanalysis showed greater well-being than 70 to 75 percent of those who had not received treatment. Psychoanalysis has proved especially useful in the treatment of anxiety, mild depression, and difficulty in handling social relationships. However, it is generally not useful for the treatment of major depression, bipolar disorder, or schizophrenia.

The techniques of traditional psychoanalysis often require clients to meet with their analyst four or five times a week, for a period of months or years. For some clients, this provides a supportive, long-term relationship that fosters emotional growth and insight. For others, however, the cost of therapy in time, money, and emotional distress is too great to make psychoanalysis a real option.

Psychoanalysis does not work for everyone. For example, it is not the most effective type of psychotherapy for individuals who are less verbal. Nor does it work as well for people who are too seriously disturbed to gain insight into their problems.

Brief Psychoanalysis Over the past several decades, shorter terms of psychoanalysis have become more common. In traditional psychoanalysis, a client and therapist may meet almost daily over the course of several years. By contrast, in brief psychoanalysis, client and analyst typically meet just 10 to 20 times over the course of a few months to a year. The shorter treatment makes brief psychoanalysis available to a wider range of people.

The techniques used in brief psychoanalysis are generally the same techniques that are used in traditional psychoanalysis. The primary difference between the two approaches is that brief psychoanalysis has a more limited focus. Whereas traditional psychoanalysis examines the client's entire personality, brief psychoanalysis concentrates on fixing a specific problem. For brief psychoanalysis to be effective, clients usually must be motivated and actively involved in applying the insights in therapy to the events in their lives.

Reading Check Summarize What main goal do the techniques of psychoanalysis serve?

Humanistic Therapy

The primary goal of **humanistic therapy** is to help individuals reach their full potential. It does this by helping individuals develop self-awareness and self-acceptance. The method assumes that most people are basically good and have a tendency to strive for self-actualization—that is, to become all that they are capable of being. The method also assumes that people with psychological problems just need help tapping their inner resources so they can grow and reach their potential. Person-centered therapy is the most widely used method of humanistic therapy.

Person-Centered Therapy The psychologist Carl Rogers developed **person-centered therapy** in the early 1950s. According to Rogers, psychological problems arise when people act as others want or expect them to act. The role of person-centered therapy is to help clients find their true selves and realize their unique potential.

Person-centered therapy is sometimes called client-centered therapy. The use of the term *client* instead of *patient* reflects the status given to individuals seeking help. Clients are seen as equals in a working relationship with the therapist. Clients are encouraged to take the lead in therapy, talking openly about whatever may be troubling them. This method is called **nondirective therapy** because it is not directed by the therapist.

Active listening is a widely used communication technique in which the listener repeats, rephrases, and asks for clarification of the speaker's statements. The goal is to convey to the speaker that words are heard and thoughts and feelings are understood. The therapist remains nonjudgmental and supportive, regardless of what the client says, providing what Rogers calls *unconditional positive regard*. The support of the therapist helps the client accept himself or herself and his or her true feelings. Self-esteem also rises, giving the client confidence.

Person-centered therapy is practiced widely by school and college counselors. It helps students deal with anxiety, depression, and other psychological problems and helps students make decisions. Counselors provide a supportive atmosphere in which students feel free to explore and make their own choices.

Evaluation of Humanistic Therapy In a review of several studies, nearly three-fourths of people obtaining person-centered therapy showed greater well-being, on average, than people who did not receive therapy. Like psychoanalysis, person-centered therapy seems to be most helpful for highly motivated people. Humanistic therapy works best for people who experience anxiety, mild depression, or problems in their social relationships.

Reading Check Summarize What is nondirective therapy?

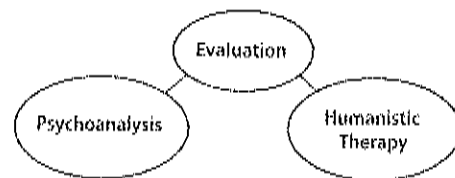
SECTION 2 Assessment

Reviewing Main Ideas and Vocabulary

1. **Recall** What is another term for a client's self-awareness achieved in psychoanalysis?
2. **Define** What is dream analysis?
3. **Describe** What is the goal of active listening?

Thinking Critically

4. **Infer** According to psychoanalytic theory, what effect do unconscious thoughts and feelings have on a person's ability to form meaningful personal relationships?
5. **Analyze** What role does the therapist play in person-centered therapy?
6. **Evaluate** Using your notes and a graphic organizer like the one below, evaluate psychoanalysis and humanistic therapy.



FOCUS ON WRITING

7. **Descriptive** Write a paragraph in which you describe a dream that you think reveals both an apparent meaning and a hidden meaning.

Public Therapy

The quotes at the right are from just a few of the troubled guests who have appeared on *Dr. Phil*, a TV talk show hosted by psychologist Phil McGraw, Ph.D. Many other guests have willingly paraded symptoms of their mood, anxiety, and personality disorders before a sometimes jeering, cheering, or laughing audience.

On *Celebrity Rehab*, drugged-out and alcoholic semi-celebrities told Dr. Drew Pinsky—and the American public—not just about their addictions, but also about the traumas that they blamed for the addictions. On his radio show, “Dr. Drew” and his co-host use the weird problems of their callers for comedy effect.

Amateurs with no qualifications have also found remarkable success offering public therapy in the most unlikely settings. Sitting on a street corner next to a sign that reads “Talk to Me,” a couple have invited discussion of everything from drug addiction to failing marriages with thousands of strangers. A woman with no credentials as a counselor

opened a New York stage show in which she conducted 13-minute “therapy” sessions with volunteers from the audience. In Milwaukee, a couple set up a counseling service in the restrooms of nightclubs. Some clubbers skipped the dance floor and went straight to the restroom for advice.

What is going on here? Why has psychological therapy, which traditionally has been a private matter between patient and therapist, become so public? Why are people not just willing, but eager to discuss their problems, including serious psychological disorders, in front of anyone? Why do they accept advice from strangers? Has the openness about highly personal disorders gone too far?

A psychologist who has appeared on various TV talk shows observed that these public displays are intended to entertain, and in so doing they sometimes exploit people with serious problems. He makes the further point that people who are seriously

In my mind at the time, if I got to the roof, Hollywood would send a helicopter to rescue me.

I introduce myself as Tiffany, but you can call me Princess. I love all eyes on me.

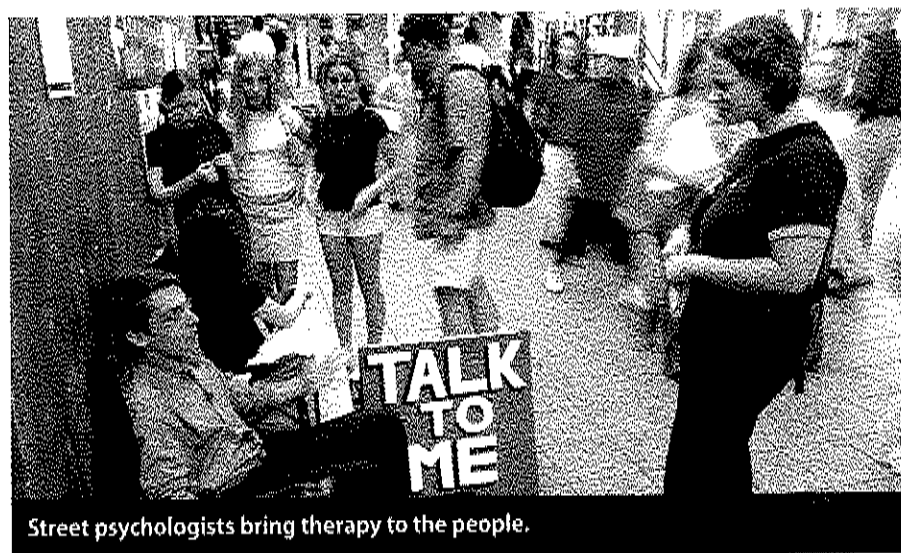
interested in exploring their problems should seek help in therapy. But if they're only interested in exhibitionism or revenge, they are more likely to go on a talk show. He also cited the lure of celebrity, no matter how brief, as a reason why people beg producers to allow them to appear on these shows.

One reason for the public display of personal burdens may be the way that modern society, despite all its electronic networks, has actually isolated many people. Those who spend all their free time on their computers or cell phones texting their friends may not engage in an actual face-to-face conversation for days at a time. It is no wonder, then, that the street-corner “therapists” feel that people come to them for “plain old-fashioned conversation.”

Perhaps another reason people accept “therapy” from strangers is the popularity of the self-help movement. These people may see the glut of self-help books as an indication that anyone can offer valid therapies, no matter what their qualifications. And advice from a restroom analyst is so much faster and cheaper!

Thinking Critically

1. **Analyze** What are some of the hazards and possible benefits of public therapy?
2. **Discuss** Why do you think therapy has become public for many people?



Street psychologists bring therapy to the people.

Cognitive Therapy and Behavior Therapy

Before You Read

Main Idea

Cognitive therapy and behavior therapy help people develop new ways of thinking and behaving.

Reading Focus

1. What is the aim of cognitive therapy?
2. What is the aim of behavior therapy?

Vocabulary

rational-emotive behavior therapy
aversive conditioning
successive approximations

TAKING NOTES

Use a graphic organizer like this one to take notes on cognitive therapy and behavior therapy.

Two Kinds of Therapy

Cognitive Therapy:

Behavior Therapy:

“Wish I
Could
Be
There”



PSYCHOLOGY CLOSE UP

How do people overcome their phobias? Allen Shawn, son of former *New Yorker* editor William Shawn and brother of playwright and actor Wallace Shawn, has published a memoir about his life titled *Wish I Could Be There*. Shawn has agoraphobia. That is, he is afraid of public spaces and also of isolation. He avoids fields, parking lots, tunnels, unknown roads, subways, elevators, and bridges. Shawn has nonetheless learned to work around his phobias. He is a composer and writer on the faculty of Bennington College in Vermont.

Shawn's memoir demonstrates in great detail how his phobias have harmed and constrained his life. Still, through therapy Shawn has managed to live a productive if not "normal" life. At Roosevelt Hospital in New York, he underwent group treatment in a program that involved weekly meetings. Activities included group discussions, relaxation exercises, working through a handbook, individual sessions with trained helpers, and outings with other people with phobias. Allen Shawn is one of many people for whom therapy is a means to deal with fears and lead a more contented life. ■

Cognitive Therapy

Cognitive therapy and behavior therapy are considered together because both methods share the same goal—to help clients develop new ways of thinking and behaving. Both cognitive and behavior therapists encourage clients to focus on their thoughts and actions. Advocates of these two theories contend that only by modifying self-defeating thoughts and behavior patterns will the client truly be able to solve his or her own problems. Thus, the aim of these therapies is to eliminate troubling emotions or behaviors rather than to help patients gain insight into the underlying cause of their problems, which is a key goal of psychoanalysis and humanistic therapy.

The aim of cognitive therapy is to help people learn to think about their problems in more productive ways. Cognitive psychologists focus on the beliefs, attitudes, and thought processes that create and compound their clients' problems. They believe that some people develop ways of thinking that are illogical or based on faulty assumptions. Such ways of thinking can lead to emotional and behavioral problems for these people.

Cognitive therapists help people change their ways of thinking. These therapists also try to help people develop more realistic and logical ways of thinking. Cognitive psychologists argue that once people have changed their ways of thinking, they become more capable of solving their emotional and behavioral problems.

The two most widely used cognitive therapy methods are rational-emotive therapy and psychiatrist Aaron Beck's model of therapy, sometimes called cognitive restructuring therapy. Both of these methods aim at modifying people's ways of thinking as a means of improving their emotional health. However, the two methods differ somewhat in the aspects of thinking they maintain must be changed and in the approach they take to bringing about those changes.

Rational-Emotive Behavior Therapy First developed by psychologist Albert Ellis in the 1950s, **rational-emotive behavior therapy (REBT)** is based on Ellis's belief that people are basically logical in their thinking and actions. However, the assumptions upon

which they base their thinking or actions are sometimes incorrect. According to Ellis, people may develop emotional problems when they base their behavior on these kinds of faulty assumptions.

People are often unaware of their false assumptions, even though the assumptions influence their conscious thoughts and actions. The role of the therapist in REBT is first to identify and then to challenge the false assumptions. To teach individuals to think more realistically, REBT therapists use techniques such as role-playing and modeling. Role-playing helps individuals see how their assumptions affect their relationships. Therapists use modeling to show individuals other, more realistic assumptions they might adopt.

Individuals in rational-emotive behavior therapy may also receive homework assignments. For example, they may be asked to read relevant literature, listen to tapes of psychotherapy sessions, or carry out experiments designed to test their assumptions. The more faithfully patients complete their homework, the more likely it is that their therapy will succeed.

Beck's Cognitive Therapy Another form of cognitive therapy was introduced in the 1960s by psychiatrist Aaron Beck. In contrast to REBT's focus on faulty assumptions, the focus of Beck's cognitive therapy is on restructuring illogical thought processes. Beck has noted several types of illogical thought processes that may lead to emotional problems. Some of these include the following.

- **Arbitrary inference**, or drawing conclusions for which there is no evidence
- **Selective abstraction**, or drawing conclusions about a situation or event on the basis of a single detail and misinterpreting or ignoring other details that would lead to a different conclusion
- **Overgeneralization**, or drawing a general conclusion from a single experience

Instead of confronting and challenging clients about the errors in their ways of thinking, as the REBT therapist does, the therapist using Beck's approach gently guides clients in testing the logic of their own thought processes and developing more logical ways of thinking.

One technique for doing this is to train clients to observe and record their thoughts in response to the events of daily life. Therapists can later review events with clients and help them see the illogical thought processes that are causing them emotional problems.

Evaluation of Cognitive Therapy Cognitive therapy tends to be a short-term method, making it a realistic option for more people than traditional psychoanalysis. Clients generally meet with their therapist once a week for 15 to 25 weeks.

Studies of cognitive therapy show that modifying irrational beliefs of the type described by Albert Ellis helps people with problems such as anxiety and depression. Modifying self-defeating beliefs of the sort outlined by Aaron Beck also frequently alleviates those conditions. Cognitive therapy also helps people with personality disorders.

Cognitive therapy is helpful for people with major depression who had been considered responsive only to medicine and other kinds of biological therapies. Many studies show that cognitive therapy is as effective or even more effective than antidepressant medication. For one thing, cognitive therapy provides coping skills that reduce the risk of recurrence of depression once treatment ends. A combination of cognitive therapy and antidepressant medication may be superior to either treatment alone in the case of people with persistent depression.

Reading Check Find the Main Idea Other than Beck's model, what is the most widely used cognitive therapy method?

Behavior Therapy

The goal of behavior therapy, which is also called behavior modification, is to help people develop more adaptive behavior. Some people seek behavior therapy to eliminate undesirable behaviors, such as overeating or smoking. Others seek behavior therapy to acquire desirable behaviors, such as skills needed to develop relationships or confront phobias.

Behaviorists believe that both desirable and undesirable behaviors are largely learned and that people with psychological problems have learned unhealthy ways of behaving. The aim of behavior therapy is to teach people

more desirable (or healthier) ways of behaving. To behaviorists, the reasons for the undesirable behavior are unimportant. Changing the behavior is what matters.

Many behavioral techniques fall into two categories: counterconditioning, which helps people to unlearn undesirable behaviors, and operant conditioning, which helps in the learning of desirable behaviors. The choice of behavioral techniques for an individual client depends largely on the nature of the individual's psychological disorder.

Counterconditioning If undesirable behaviors are conditioned, or learned through reinforcement, then presumably they can be unlearned, or counterconditioned. Counterconditioning pairs the stimulus that triggers an unwanted behavior (such as fear of spiders) with a new, more desirable behavior. Counterconditioning techniques include systematic desensitization, modeling, and aversive conditioning.

Systematic desensitization was developed by psychiatrist Joseph Wolpe in the 1950s as a treatment for phobias and other anxiety disorders. The assumption underlying systematic desensitization is that a person cannot feel anxious and relaxed at the same time. The therapist trains the client to relax in the presence of an anxiety-producing situation.

This is done in a systematic way. First, the therapist teaches the client how to relax completely. Once this has been accomplished, the therapist gradually exposes the client to the object or situation that causes the phobic response. For a person who fears spiders, the therapist might first ask the person to simply imagine a spider. If the thought of a spider makes the client feel anxious, the client is told to stop thinking about the spider and relax again. This is done repeatedly until the thought of a spider no longer causes anxiety.

Gradually, the stimulus is increased—the person might be shown pictures of spiders, asked to hold a toy spider, and then asked to handle a real spider. In each case, the person is trained to respond with relaxation until the stimulus no longer provokes anxiety.

Systematic desensitization may be combined with other counterconditioning measures, such as modeling and aversive conditioning. Modeling involves observational

ACADEMIC VOCABULARY

coping skills skills to contend with difficulties successfully

CASE STUDY CONNECTION

Overcoming Fears

Virtual therapy is another more recent technique for learning to deal with irrational fears. Virtual scenes can be created to help people slowly overcome their fears of, for example, spiders.

learning. The client observes and then imitates the therapist or another person coping with the feared object or situation. For the person with a fear of spiders, the therapist might ask the person to observe someone watching a spider make a web. The client would then be encouraged to behave in the same way.

Aversive conditioning is, essentially, the opposite of systematic desensitization. In aversive conditioning, the therapist replaces a positive response to a stimulus with a negative response. For example, for a person who wants to stop smoking, the therapist might replace the pleasant feelings associated with smoking with unpleasant ones. The person might be asked to smoke several cigarettes at once through a device that holds two or more cigarettes. This overexposure to cigarette smoke makes smoking unpleasant. With repetition, the person may come to avoid smoking.

People who learn more desirable behaviors through counterconditioning often experience a boost in their self-esteem as well. Furthermore, by confronting, challenging, and overcoming their fears or bad habits, such people will increase their opportunity to lead less restrictive lives.

Operant Conditioning The behavioral technique of operant conditioning is based on the assumption that behavior that is reinforced tends to be repeated, whereas behavior that is not reinforced tends to be extinguished. Behavioral therapists reinforce desirable behaviors with rewards and at the same time withhold reinforcement for undesirable behaviors. In other words, therapists teach clients in a given situation, or antecedent, to behave in a certain way to achieve a desired

consequence. The rewards for desirable behavior might be praise or treats, for example, depending on the client and the setting.

Operant conditioning has sometimes proved effective in more severe cases, such as schizophrenia and childhood autism, that were previously resistant to other types of treatment. Operant conditioning is often used in institutional settings, such as mental hospitals. In such settings, the therapist may set up a token economy, that is, a system of rewards. When people in these settings begin to demonstrate appropriate behavior, they are rewarded with a plastic coin or token. The tokens can be accumulated and exchanged for real rewards, such as snacks, extra television time, a trip to town, or a private room.

The staff at one mental hospital used operant conditioning to convince withdrawn schizophrenic patients to eat their meals. The more the staff coaxed the patients to eat—sometimes even hand-feeding them—the worse the problem became. The extra attention from the staff was apparently reinforcing the patients' lack of cooperation. The greater the refusal to eat, the more attention the patients received.

The solution was to stop reinforcing the uncooperative behavior and instead reinforce cooperative behavior. Patients who arrived late at the dining hall were locked out, and hospital staff were prevented from helping patients at mealtime. Thus, uncooperative behavior was no longer rewarded with extra attention. Only those who cooperated received food. As a result, the uncooperative patients quickly changed their eating habits.

AVERSIVE VS. OPERANT CONDITIONING

	Goal	Technique	Rationale
Aversive	End harmful behavior	Associate harmful behavior with painful stimulation	Associating a behavior with aversive stimulation makes the behavior offensive
Operant	Encourage adaptive behavior	Reinforce adaptive behavior or avoid reinforcement of maladaptive behavior	Reinforcement increases the frequency of behavior and lack of reinforcement extinguishes behavior

Sometimes people find it difficult to adopt a new behavior all at once, finding it easier to change their behavior gradually. Another method of operant conditioning, called successive approximations, is useful in such situations. The term **successive approximations** refers to a series of behaviors that gradually become more similar to a target behavior. Through reinforcement of behaviors at each stage, the target behavior is finally achieved.

Suppose, for example, a student wants to increase his study time to two hours a day. On the first day, he studies for half an hour and then gives himself a reward. Each night he adds five minutes to his study time and gives himself a reward until he reaches his goal.

The relationship between antecedents, behavior, and consequences can be seen when operant conditioning is used for social skills training. People with severe psychological problems may lack social skills because of isolation and social withdrawal. In fact, lacking the social skills needed for independent living is one of the major symptoms of schizophrenia. A therapist might assist a client by teaching him or her to say "hello" in a friendly way when meeting someone. This technique would help the client function more comfortably in society—that is, it would help the client achieve a desired consequence.

Behavior therapists help people build their social skills by advising clients on their

behavior, modeling effective behaviors, and encouraging clients to practice effective behaviors. Such techniques have proved successful in helping students build social relationships. They have also been used to help people with severe psychological disorders. With social skills training, a person who otherwise would be dependent on others might be able to hold a job and live on her or his own.

Evaluation of Behavior Therapy Behavior therapy tends to be somewhat more effective overall than psychoanalysis or person-centered therapy. It is also a short-term therapy, sometimes bringing about lasting results in just a few months.

Behavior therapy is especially effective for well-defined problems such as phobias, post-traumatic stress disorder, and compulsions. It has helped people overcome depression, social problems, and problems with self-control (as in quitting smoking or drinking). In addition, behavior therapy has proved very useful for managing the care of people living in institutions, including people with schizophrenia or developmental disabilities.

There is a new, integrated approach to treatment called cognitive-behavior therapy. It attempts to change the way a person both thinks and behaves.

Reading Check Summarize What are some of the techniques of counterconditioning?

SECTION 3 Assessment

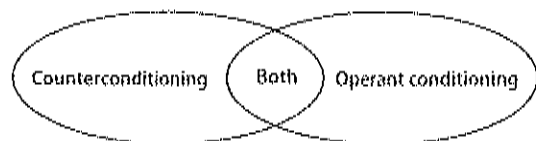
Reviewing Main Ideas and Vocabulary

1. **Describe** What is the focus of Beck's cognitive therapy?
2. **Define** What is aversive conditioning?
3. **Recall** What technique did Joseph Wolpe develop as a treatment for phobias and other anxiety disorders?

Thinking Critically

4. **Explain** What might be an example of behavior and consequences in a behavioral situation?
5. **Summarize** What techniques do cognitive and behavior therapists use to help people?

6. **Compare and Contrast** Using your notes and a graphic organizer like the one below, explain the basic similarities and differences between counterconditioning and operant conditioning.



FOCUS ON WRITING

7. **Descriptive** Describe how one treatment in this section can be used to relieve a certain kind of phobia.

Biological Therapy

Before You Read

Main Idea

Biological therapy relies on methods such as medication, electric shock, and surgery to help people with psychological disorders.

Reading Focus

1. How are the major categories of drugs used in drug therapy?
2. What is electroconvulsive therapy?
3. How would you define psychosurgery?

Vocabulary

anxiety drug
antidepressant drug
lithium
antipsychotic drug
electroconvulsive therapy
psychosurgery
prefrontal lobotomy

TAKING NOTES

Use a graphic organizer like this one to take notes on various kinds of drug therapy.

Drug Therapy
Anxiety:
Antidepressant:
Lithium:
Antipsychotic:

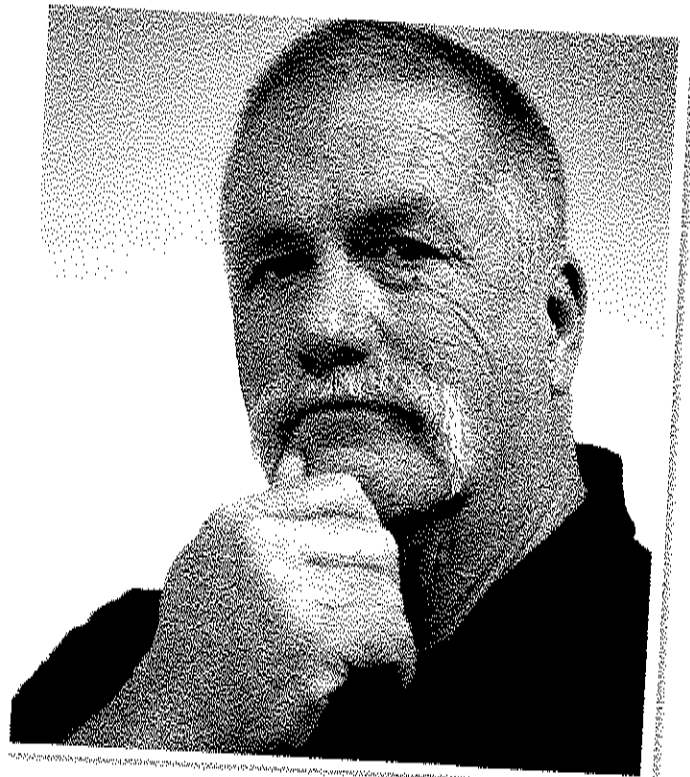
A CRUEL PROCEDURE

PSYCHOLOGY CLOSE UP

Why was an ice pick ever considered a surgical tool?

A lobotomy is a surgical procedure in which nerve pathways linking one or more lobes to the rest of the brain are cut. The method was invented in the 1930s and became widely used during the 1940s and 1950s. Lobotomies were supposed to reduce the agitation and violence of people with serious disorders, but sometimes their use was seriously abused. In 1960, a 12-year-old boy named Howard Dully was lobotomized by Dr. Walter Freeman. Now a bus driver in California, Dully has over the past couple of years attempted to discover what happened to him and why.

Dully's stepmother claimed he was a discipline problem and managed, with the surgeon's collaboration, to convince the boy's father to agree to the surgical procedure. It now seems clear that he was lobotomized for nothing more serious than the normal behavior of a young boy. The psychiatrist who performed the operation, Walter Freeman, thought that mental illness was correlated with emotions and that cutting the brain would cut away overactive feelings or emotions. He performed lobotomies on some 2,500 patients in 23 states. Today this brutal procedure is rarely performed. ■



Dr. Walter Freeman performed a lobotomy on Howard Dully (above) when Dully was only 12 years of age.

Drug Therapy

The methods of psychotherapy described so far rely on verbal interactions between the psychotherapist and the individual seeking help. As you have seen, psychotherapists may give their clients emotional support, advice, and help in understanding and changing their thoughts and behaviors.

Biological therapy, on the other hand, attempts to alleviate psychological problems by affecting the nervous system. Biological therapy relies on methods such as medication, electric shock, and even surgery to help people with psychological disorders. All of these biological methods affect the brain in a variety of ways.

Because these treatments are medical in nature, they must be administered or prescribed by psychiatrists or other physicians. Psychologists do not prescribe drugs or administer biological treatments, but they may help decide whether a certain kind of biological therapy is appropriate for the treatment of a particular individual.

Drug therapy is the most widely used biological treatment for psychological disorders. It works well for several different problems. Four major types of medication are commonly used: antianxiety drugs, antidepressant drugs, lithium, and antipsychotic drugs. All of these medications can be obtained only with a prescription.

Antianxiety Drugs Also called minor tranquilizers, **antianxiety drugs** are used as an outpatient treatment to help people who suffer from anxiety disorders or panic attacks. They are also prescribed for people who are experiencing serious distress or tension in their daily lives.

Antianxiety drugs work by depressing the activity of the nervous system. They lower the heart rate and respiration rate. They also decrease feelings of nervousness and tension. Although antianxiety medications help control the symptoms of anxiety, they are not a permanent cure for anxiety disorders. Thus, most people use them for a short period of time. The longer a person takes an antianxiety medication, the less effective the drug may become. Higher doses may be needed in order to achieve the same effect.

The major side effects of antianxiety medications are feelings of fatigue. It is also possible to become dependent on antianxiety drugs. People who are dependent on these drugs may lose the ability to face the stresses and strains of everyday life without them.

Antidepressant Drugs People who suffer from major depression are often treated with **antidepressant drugs**. Antidepressant drugs are also sometimes used in the treatment of such problems as eating disorders and panic disorders.

Antidepressants work by increasing the amount of one or both of the neurotransmitters. These are norepinephrine (noradrenaline) and serotonin. They tend to be most helpful in reducing the physical symptoms of depression. They increase activity levels and reduce the severity of eating and sleeping problems.

In order to work effectively, antidepressant medications must build up in the body to a certain level. This may take anywhere from several days to a matter of weeks. Severely depressed people who are at risk of suicide are sometimes hospitalized until the medication reaches the level required to improve their depressed mood. This is to prevent them from taking an overdose of the medication, which could be lethal.

In addition, antidepressants sometimes have negative side effects, such as escalated heart rate and excessive weight gain. For these and other reasons, some psychologists believe that antidepressant medications should be reserved for people who fail to respond to psychotherapy.

Mood Stabilizing Drugs Some drugs are prescribed to stabilize patients' mood disorders. One of the most popular is lithium. The ancient Greeks and Romans may have been the first people to use a compound of the metal **lithium** to treat psychological disorders. They discovered that mineral water helped many people with what used to be called manic depression but is now called bipolar disorder. The mineral water may have contained lithium.

Today lithium carbonate is given in tablet form to help people with bipolar disorder. Lithium seems to flatten out their cycles of mania and depression. Scientists do not

understand completely how lithium does this. Lithium is known, however, to affect the functioning of several neurotransmitters.

Lithium may have side effects, such as shakiness, memory impairment, and excessive thirst. Memory problems are reported to be the major reason that people stop using the drug.

Antipsychotic Drugs People who are diagnosed with schizophrenia are likely to be prescribed **antipsychotic drugs**. These drugs are also called major tranquilizers.

Antipsychotic medications are effective for reducing agitation, delusions, and hallucinations. Their use has enabled many thousands of people with schizophrenia to live outside of mental hospitals.

Schizophrenia is associated with high levels of dopamine activity. Antipsychotic medications work by blocking the activity of dopamine in the brain. Unfortunately, prolonged use of these medications can lead to problems in balance and coordination and produce tremors and twitches.

Nonetheless, controlling the symptoms of schizophrenia with medication often allows those with schizophrenia to lead more normal lives. They can live more independently—even hold jobs—and maintain better social relationships. Greater independence and better social relationships increase self-esteem and social support, both of which are likely to have a positive effect on emotional health and the control of schizophrenia.

Reading Check Find the Main Idea What psychological disorder is lithium used to treat?

Electroconvulsive Therapy

Electroconvulsive therapy (ECT), commonly called electric-shock therapy, was introduced as a treatment for psychological disorders in the 1930s by Italian psychiatrists Ugo Cerletti and Lucio Bini. Before ECT is given, anesthesia is administered to render the person unconscious throughout the procedure. Then an electric current is passed through the person's brain. The electric current produces convulsions (violent involuntary contractions of muscles) throughout the body. In some cases, muscle relaxant drugs are given to prevent injury during the convulsions.

Statistically Speaking...



The Homeless and Therapy A large percentage of the homeless population has severe psychological disorders. Some are on antipsychotic drugs that have allowed them to be deinstitutionalized, that is, live outside of mental hospitals.

26% Percentage of the single adult homeless population that suffers from mental illness

5–7% Percentage of homeless people with mental illness who require hospitalization

26–38% Percentage of homeless with addiction disorders

33% Percentage of homeless population with untreated psychiatric illnesses

Skills Focus **INTERPRETING CHARTS** What might have been the effect on society at large of the use of antipsychotic drugs to treat mental patients?

Sources: National Coalition for the Homeless, 2014; Treatment Advocacy Center, 2014

When ECT was introduced, it was used for many psychological disorders, including schizophrenia. Once antipsychotic drugs became available, ECT was used much less often. In fact, in 1990 the American Psychiatric Association recommended that ECT be used primarily for people with major depression who do not respond to antidepressant drugs.

ECT is controversial for many reasons. For one thing, many professionals are distressed by the thought of passing an electric shock through a patient's head and producing convulsions. There are also side effects, including memory problems.

ACADEMIC VOCABULARY

Involuntary against one's will

However, research suggests that for most people, cognitive impairment after ECT tends to be temporary. One study followed up on 10 adolescents who had received ECT an average of three and a half years earlier. Six of the ten had complained of memory impairment immediately after treatment, but only one complained of continued problems at the follow-up.

Psychological tests did not reveal any differences in cognitive functioning between severely depressed adolescents who had received ECT and others who had not. Despite the controversies surrounding ECT, it appears to help many people who do not respond to antidepressant drugs. Nonetheless, it is a drastic treatment that is used only in the most extreme cases.

Reading Check Identify Cause and Effect Why did the use of ECT drop off?

Psychosurgery

Psychosurgery is brain surgery that is performed to treat psychological disorders. The best-known technique, **prefrontal lobotomy**, has been used to reduce the agitation and violence of people with severe psychological disorders.

The method was developed by Portuguese neurologist António Egas Moniz in the 1930s. The procedure involves cutting the nerve

pathways in the brain between the prefrontal lobes and the thalamus. However, the treatment produces several serious side effects, including distractibility, reduced learning ability, overeating, apathy, social withdrawal, seizures, reduced creativity, and occasionally even death. At the beginning of this section, you read about Howard Dully, who had a lobotomy at the age of 12. Since the procedure, he has suffered from feeling different, abnormal, and ashamed.

It is not surprising that prefrontal lobotomy is an even more controversial procedure than ECT. Experts challenged the original rationale behind the surgery, and early success rates were exaggerated by advocates of the procedure. Because of the side effects of the surgery and the availability of antipsychotic drugs, prefrontal lobotomies are now performed only rarely.

Drug therapies, and to a limited extent ECT, seem to be effective for some psychological disorders that do not respond to psychotherapy. It is important to realize, however, that medications and electric shocks cannot help a person develop more rational ways of thinking or solve relationship problems. Changes such as these are likely to require psychotherapy.

Reading Check Summarize What is the best-known technique of psychosurgery?

SECTION 4 Assessment

Reviewing Main Ideas and Vocabulary

- Describe** How are antianxiety drugs used?
- Identify** Which treatment for psychological disorders was introduced in the 1930s by Ugo Cerletti and Lucio Bini?
- Identify Main Ideas** What are some of the side effects of lobotomies?

Thinking Critically

- Explain** What are the three major biological treatments for psychological disorders?
- Draw Conclusions** Why is electroconvulsive therapy a controversial treatment for psychological disorders?

- Categorize** Using your notes and a graphic organizer like the one below, describe the type of biological therapy that might be used for each of the following: panic disorder, bipolar disorder, schizophrenia, and severe depression.

Biological Therapy
Drug Therapy:
ECT:
Psychosurgery:

FOCUS ON WRITING

- Narrative** Have you ever seen a film or television show in which a person has been subjected to ECT? Write a paragraph in which you describe the movie or TV show. If you haven't seen such a show, write a story about what you imagine the procedure to be like.