

Behavior therapy

3.1 Behavior therapy is a broad term referring to psychotherapy, behavior analytical, or a combination of the two therapies. In its broadest sense, the methods focus on either just behaviors or in combination with thoughts and feelings that might be causing them. Those who practice behavior therapy tend to look more at specific, learned behaviors and how the environment has an impact on those behaviors. Those who practice behavior therapy are called behaviorists. They tend to look for treatment outcomes that are objectively measurable. Behavior therapy does not involve one specific method but it has a wide range of techniques that can be used to treat a person's psychological problems. Behavior therapy breaks down into three disciplines: applied behavior analysis (ABA), cognitive behavior therapy (CBT), and social learning theory. ABA focuses on operant conditioning in the form of positive reinforcement to modify behavior after conducting a Functional behavior assessment (FBA) and CBT focuses on the thoughts and feelings behind mental health conditions with treatment plans in psychotherapy to lessen the issue.

History

Precursors of certain fundamental aspects of behavior therapy have been identified in various ancient philosophical traditions, particularly Stoicism.^[4] For example, Wolpe and Lazarus wrote,

While the modern behavior therapist deliberately applies principles of learning to this therapeutic operations, empirical behavior therapy is probably as old as civilization – if we consider civilization as having started when man first did things to further the well-being of other men. From the time that this became a feature of human life there must have been occasions when a man complained of his ills to another who advised or persuaded him of a course of action. In a broad sense, this could be called behavior therapy whenever the behavior itself was conceived as the therapeutic agent. Ancient writings contain innumerable behavioral prescriptions that accord with this broad conception of behavior therapy.

The first use of the term behavior modification appears to have been by Edward Thorndike in 1911. His article *Provisional Laws of Acquired Behavior or Learning* makes frequent use of the term "modifying behavior". Through early research in the 1940s and the 1950s the term was used by Joseph Wolpe's research group. The experimental tradition in clinical psychology used it to refer to psycho-therapeutic techniques derived from empirical research. It has since come to refer mainly to techniques for increasing adaptive behavior through reinforcement and decreasing

maladaptive behavior through extinction or punishment (with emphasis on the former). Two related terms are behavior therapy and applied behavior analysis. Emphasizing the empirical roots of behavior modification, some authors consider it to be broader in scope and to subsume the other two categories of behavior change methods. Since techniques derived from behavioral psychology tend to be the most effective in altering behavior, most practitioners consider behavior modification along with behavior therapy and applied behavior analysis to be founded in behaviorism. While behavior modification and applied behavior analysis typically uses interventions based on the same behavioral principles, many behavior modifiers who are not applied behavior analysts tend to use packages of interventions and do not conduct functional assessments before intervening.

Possibly the first occurrence of the term "behavior therapy" was in a 1953 research project by B.F. Skinner, Ogden Lindsley, Nathan H. Azrin and Harry C. Solomon. The paper talked about operant conditioning and how it could be used to help improve the functioning of people who were diagnosed with chronic schizophrenia. Early pioneers in behaviour therapy include Joseph Wolpe and Hans Eysenck.

In general, behaviour therapy is seen as having three distinct points of origin: South Africa (Wolpe's group), The United States (Skinner), and the United Kingdom (Rachman and Eysenck). Each had its own distinct approach to viewing behaviour problems. Eysenck in particular viewed behaviour problems as an interplay between personality characteristics, environment, and behaviour. Skinner's group in the United States took more of an operant conditioning focus.

The operant focus created a functional approach to assessment and interventions focused on contingency management such as the token economy and behavioural activation. Skinner's student Ogden Lindsley is credited with forming a movement called precision teaching, which developed a particular type of graphing program called the standard celeration chart to monitor the progress of clients. Skinner became interested in the individualising of programs for improved learning in those with or without disabilities and worked with Fred S. Keller to develop programmed instruction. Programmed instruction had some clinical success in aphasia rehabilitation.

Gerald Patterson used programme instruction to develop his parenting text for children with conduct problems. (see Parent Management Training). With age, respondent conditioning appears to slow but operant conditioning remains relatively stable. While the concept had its share of advocates and critics in the

west, its introduction in the Asian setting, particularly in India in the early 1970s and its grand success were testament to the famous Indian psychologist H. Narayan Murthy's enduring commitment to the principles of Behavioural Therapy and Biofeedback.

While many behaviour therapists remain staunchly committed to the basic operant and respondent paradigm, in the second half of the 20th century, many therapists coupled behaviour therapy with the cognitive therapy of Aaron Beck and Albert Ellis, to form cognitive behavioural therapy. In some areas the cognitive component had an additive effect (for example, evidence suggests that cognitive interventions improve the result of social phobia treatment. but in other areas it did not enhance the treatment, which led to the pursuit of Third Generation Behaviour Therapies. Third generation behaviour therapy uses basic principles of operant and respondent psychology but couples them with functional analysis and a clinical formulation/case conceptualisation of verbal behaviour more inline with view of the behaviour analysts. Some research supports these therapies as being more effective in some cases than cognitive therapy, but overall the question is still in need of answers.

Scientific basis

The behavioral approach to therapy assumes that behavior that is associated with psychological problems develops through the same processes of learning that affects the development of other behaviors. Therefore behaviorists see personality problems in the way that personality was developed. They do not look at behavior disorders as something a person has but that it reflects how learning has influenced certain people to behave in a certain way in certain situations. Understanding how the process of learning takes place comes from research that has been done on operant and classical conditioning.

Behaviour therapy is based upon the principles of classical conditioning developed by Ivan Pavlov and operant conditioning developed by B.F. Skinner. Classical conditioning happens when a neutral stimulus comes right before another stimulus that triggers a reflexive response. The idea is that if the neutral stimulus and whatever other stimulus that triggers a response is paired together often enough that the neutral stimulus will produce the reflexive response. Operant conditioning has to do with rewards and punishments and how they can either strengthen or weaken certain behaviors. There has been a good deal of confusion on how these two conditionings differ and whether the various techniques of behaviour therapy have any common scientific base.

Contingency management programs are a direct product of research from operant conditioning. These programs have been highly successful with those suffering from panic disorders, anxiety disorders, and phobias.

Systematic desensitisation and exposure and response prevention both evolved from respondent conditioning and have also received considerable research.

3.2 Tests

Behavior avoidance test (BAT) is a behavioral procedure in which the therapist measures how long the client can tolerate an anxiety-inducing stimulus. The BAT falls under the exposure-based methods of Behavior Therapy. Exposure-based methods of behavioral therapy are well suited to the treatment of phobias, which include intense and unreasonable fears (e.g., of spiders, blood, public speaking). The therapist needs some type of behavioral assessment to record the continuing progress of a client undergoing an exposure-based treatment for phobia. The simplest possible assessment approach for this is the BAT. The BAT approach is predicted on the reasonable assumption that the client's fear is the main determinant of behavior in the testing situation. BAT can be conducted visual, virtually, or physically, depending on the clients' maladaptive behavior. Its application is not limited to phobias, it is applied to various disorders such as Post-Traumatic Stress Disorder (PTSD) and Obsessive-Compulsive Disorder (OCD).

Assessment

Behavior therapists complete a functional analysis or a functional assessment that looks at four important areas: stimulus, organism, response and consequences.^[25] The stimulus is the condition or environmental trigger that causes behavior.^[26] An organism involves the internal responses of a person, like physiological responses, emotions and cognition. A response is the behavior that a person exhibits and the consequences are the result of the behavior. These four things are incorporated into an assessment done by the behavior therapist.

Most behavior therapists use objective assessment methods like structured interviews, objective psychological tests or different behavioral rating forms. These types of assessments are used so that the behavior therapist can determine exactly what a client's problem may be and establish a baseline for any maladaptive responses that the client may have. By having this baseline, as therapy continues this same measure can be used to check a client's progress, which can help determine if the therapy is working. Behavior therapists do not typically ask the why questions but tend to be more focused on the how, when, where and what

questions. Traditional tests like the Rorschach inkblot test or personality tests like the MMPI (Minnesota Multiphasic Personality Inventory) are traditionally used for behavioral assessment because they are based on the personality trait theory where it assumes that a person's answer to these methods can predict behavior. Behavior assessment is more focused on the observations of a person's behavior in their natural environment.

Behavioral Assessment specifically attempts to find out what the environmental and self-imposed variables are. These variables are the things that are allowing a person to maintain their maladaptive feelings, thoughts and behaviors. In a behavioral assessment "person variables" are also considered. These "person variables" come from a person's social learning history and they effect the way in which the environment affects that person's behavior. An example of a person variable would be behavioral competence. Behavioral competence looks at whether a person has the appropriate skills and behaviors that are necessary when performing a specific response to a certain situation or stimuli.

When making a behavioral assessment the behavior therapist wants to answer two questions: (1) what are the different factors (environmental or psychological) that are maintaining the maladaptive behavior and (2) what type of behavior therapy or technique that can help the individual improve most effectively. The first question involves looking at all aspects of a person, which can be summed up by the acronym BASIC ID. This acronym stands for behavior, affective responses, sensory reactions, imagery, cognitive processes, interpersonal relationships and drug use.

3.3 Clinical applications

Behaviour therapy based its core interventions on functional analysis. Just a few of the many problems that behaviour therapy have functionally analysed include intimacy in couples relationships, forgiveness in couples, chronic pain, stress-related behaviour problems of being an adult child of an alcoholic, anorexia, chronic distress, substance abuse, depression, anxiety, insomnia and obesity.

Functional analysis has even been applied to problems that therapists commonly encounter like client resistance, partially engaged clients and involuntary clients. Applications to these problems have left clinicians with considerable tools for enhancing therapeutic effectiveness. One way to enhance therapeutic effectiveness is to use positive reinforcement or operant conditioning. Although behavior therapy is based on the general learning model, it can be applied in a lot of

different treatment packages that can be specifically developed to deal with problematic behaviors. Some of the more well known types of treatments are: Relaxation training, systematic desensitization, virtual reality exposure, exposure and response prevention techniques, social skills training, modeling, behavioral rehearsal and homework, and aversion therapy and punishment.

Relaxation training involves clients learning to lower arousal to reduce their stress by tensing and releasing certain muscle groups throughout their body. Systematic desensitization is a treatment in which the client slowly substitutes a new learned response for a maladaptive response by moving up a hierarchy of situations involving fear. Systematic desensitization is based in part on counter conditioning. Counter conditioning is learning new ways to change one response for another and in the case of desensitization it is substituting that maladaptive behavior for a more relaxing behavior. Exposure and response prevention techniques is also known as flooding and response prevention. Flooding and response prevention is the general technique in which you expose an individual to anxiety-provoking stimuli while keeping them from having any avoidance responses or keeping them from freaking out.

Virtual reality therapy provides realistic, computer-based simulations of troublesome situations. The modeling process involves a person being subjected to watching other individuals who demonstrate behavior that is considered adaptive and that should be adopted by the client. This exposure involves not only the cues of the “model person” as well as the situations of a certain behavior that way the relationship can be seen between the appropriateness of a certain behavior and situation in which that behavior occurs is demonstrated. With the behavioral rehearsal and homework treatment a client gets a desired behavior during a therapy session and then they practice and record that behavior between their sessions. Aversion therapy and punishment is a technique in which an aversive (painful or unpleasant) stimulus is used to decrease unwanted behaviors from occurring. It is concerned with two procedures: 1) the procedures are used to decrease the likelihood of the frequency of a certain behavior and 2) procedures that will reduce the attractiveness of certain behaviors and the stimuli that elicit them. The punishment side of aversion therapy is when an aversive stimulus is presented at the same time that a negative stimulus and then they are stopped at the same time when a positive stimulus or response is presented. Examples of the type of negative stimulus or punishment that can be used is shock therapy treatments, aversive drug treatments as well as response cost contingent punishment which involves taking away a reward.