The Past and Future of Cognitive Therapy

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The author describes his personal odyssey in cognitive-behavioral therapy (CBT). He shares his earliest clinical experience responsible for the evolution of CBT and reviews the application of CBT to depression, anxiety, personality disorders, and schizophrenia. According to the author, the future of CBT will be tested with severe psychiatric disorders such as schizophrenia, bipolar disorder, and severe personality disorders; in the treatment of children and adolescents; and within the practice of primary care.


I started off my psychiatric career doing psychoanalysis, and it was only in the course of time that I drifted into a whole new area. What started me in the current direction was something that occurred when I was seeing a patient named Lucy. She was on the couch, and we were doing classical analysis. She was presumably following the "fundamental rule" that the patient must report everything that comes into her mind. During this session, she was regaling me with descriptions of her various sexual adventures. At the end of the session, I did what I usually do. I asked her, "Now, how have you been feeling during this session?" She said, "I've been feeling terribly anxious, doctor."

Her diagnosis was what was called in those days anxiety neurosis and depressive neurosis, so it was not surprising that she was feeling anxious. I said, "It's very clear why you are feeling anxious. You have these sexual impulses which are threatening to burst forth. Since your sexual impulses are unacceptable, they cue off anxiety." I said, "Does that sound right?" She said, "Oh, yes. You're right on target." I said, "Do you feel better now that you know this?" She responded, "No, I feel worse." I replied, "Thank you for being so frank, but can you tell me a little bit more about this?" She responded, "Well, actually, I thought that maybe I was boring you, and now that you said that, I think I really was boring you." I asked, "What made you think that you were boring me?" She replied, "I was thinking that all

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during the session." I said, "You had a thought, 'I am boring Dr. Beck,' and you didn't say it?" She replied, "No, I never thought to say that." I said, "You had that thought just this one time, right?" She responded, "Oh, no, I always have that thought." I said, "Oh? That's really strange. How come you never reported this before?" She responded, "It just never occurred to me that this would be the sort of thing that you'd be interested in." I asked, "Did you have any feeling when you had this thought?" She replied, "Well, this is what has really made me anxious." I asked, "Do you ever get this thought when you're not in the session?" She said, "Oh, I get it with everybody. I'm always very anxious because I think that I'm boring people."

It occurred to me that perhaps I had misconstrued the case and that she had the basic problem of having to make an impression on people and being rejected by them, and one of her compensations was to try to entertain them. According to the present DSM-IV diagnosis (which was not available to us then), she would also have a histrionic personality disorder.

**The Development of Cognitive Therapy**

I became very much interested in unreported thoughts of this kind, and I started asking other patients about this when they were free associating. Periodically I would ask, "What other thoughts are you having right now?" They would come up with other thoughts that had to do with me, typical transference thoughts according to psychoanalysis, but not what the patients had been previously reporting. I thought, "There is a whole level of mentation going on that isn't being tapped through our classical methods." Consequently, I asked the patients many times during the session, "What are you thinking right now?" and often what they were thinking "right now" had to do with the kind of impression they were making on me or what they thought my attitude was toward them. They were also experiencing the kind of emotion that you would expect to go with a particular thought. If a patient had the thought, "Dr. Beck isn't paying attention," then the affect would be anger. If the patient's thought was, "I'm not getting anywhere in the therapy...I'm only getting worse," then the affect would be sadness. This observation gave me a clue that something crucial was going on that I had been missing.

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**Internal Communication**

I started examining my own automatic thoughts the very next day when I was trying to drive out of a parking lot onto a very busy street. I started the car forward and all of a sudden I felt anxious and I stopped. I had the thought, "Jerk, you're afraid to go out into the traffic," and I felt bad. Then I started forward again and I had the thought, "By gosh, you're going to get killed if you go into this busy street," and I felt anxious and stopped. I finally drove the car out after an alternating sequence of anxiety-producing and self-critical thoughts. It occurred to me that people must have a great many such thoughts that they simply are not reporting. This is when I arrived at the concept of the internal communication system.

People have automatic thoughts that they use to broadcast ideas to themselves, but these are not the kinds of ideas that they would mention to other people. This kind of internal system has to do with self-evaluation, thinking about what other people think of you, self-monitoring, self-predictions, and so on. Unless one specifically made a "biopsy," bored in at that very moment of the thought, one would miss it. Many times I could elicit this kind of thinking once I switched over to face-to-face interviews. For example, I would say something really "brilliant" to a patient and the patient would get a very sad expression on his face. I would ask, "What were you thinking right then?" The patient would say, "Oh, I just thought I must be pretty dumb if I hadn't thought of that," or something to that effect. I would say, "That's very interesting that you are comparing yourself with me and you are..."
putting yourself down.” Then I would emphasize, “Every time you get a thought that makes these invidious comparisons, be sure and report it.”

This patient did become sensitized to this procedure, and therefore I could get a whole new database to which I had never had access before. This could be very helpful in understanding the patient and also in trying to create some type of treatment strategy. For a long time I would give out wrist clickers and have the patients click off their thoughts during the course of the day. Since most of my practice at that time was with depressed patients, I would have them click every time they had a negative thought. At the end of the day they might have as many as a hundred. The patient was able to examine these thoughts and evaluate them. Since the thoughts occurred automatically, without prior reflection, and were accepted by the patient as valid, I called them automatic thoughts.

When Lucy was having these automatic thoughts in the course of the day, there was a definite bias in her thinking directed against herself. If she was in any situation in which she felt she was not making a good impression, she would get the thoughts, “Those people don’t like me. They’re rejecting me. I look foolish. I look stupid,” and so on. There was a pervasive current through all her thinking that had to do with her negative self-concept.

**Erroneous Thinking**

I also noticed that patients tended to make various thinking errors. One of the thinking errors was something I called **arbitrary inference.** Lucy told the following story: “I really felt very discouraged yesterday, and I came to the conclusion that you’re wrong when you say that I do have the capacity to have people like me, because nobody called me yesterday.” I said, “That’s a very good automatic thought, ‘Nobody called me yesterday.’ What was the meaning of that?” She said, “The meaning is that nobody likes me and that therefore I must be unlovable.” I asked, “Who are the people whom you would have expected to call you?” She said, “Well, there was Doris, there was Dolores, and there was Cynthia.” I said, “The fact that they didn’t call you meant that they didn’t like you?” She said, “That’s right.” I said, “Now, can we think of some alternative explanations for why they might not have called you?”

This approach was something new that had occurred to me in the course of my work: depressed patients consistently jump to erroneous conclusions. She said, “Well, come to think of it, Doris is out of town, Dolores said she wasn’t feeling well, and Cynthia is more depressed than I am. I should be calling her.” What was interesting was that immediately after she made this alternative construction of the situation, her affect changed and she felt better.

**Cognitive Primacy**

This observation led to my next concept, something I call cognitive **primacy or biased processing.** One’s feelings are dictated, to a very large extent, by the way one interprets experiences. When Lucy was interpreting situations negatively, she felt worse. When she switched over to a more realistic interpretation, she felt better. Not only her affect was influenced, but also her behavior. She became more animated. She started thinking about all the good things she could do during the day. It was very obvious that each time she was able to evaluate a negative thought and determined what seemed to be incorrect, unlikely, or implausible, she was able to introduce proper correction. She then felt better and was able to behave more adaptively.

I then moved my formulations over to the notion of cognitive primacy. At this point I still considered myself an analyst, and when I gave my talks to analytic groups I would say, “This is real, pure Freudian analysis because Freud developed the whole idea of the primary process early on. During that phase of his theory, he believed that thinking was the really critical area in psychopathology. Later on, Freud
moved to a motivation model: impulses emerging from the id, from the unconscious, were pressing to burst out into consciousness and then were defended against by defense mechanisms."

In the cognitive model, though, I was able to dispense with the unwieldy concept of the defense mechanisms. According to the cognitive model, people see things the way they do because this is the direction that their cognitive processing takes them. They may see things accurately when their cognitive processing is right on target. If they have some type of mental disorder, the cognitive apparatus is skewed in one direction or another. In the manic patient, for example, it is skewed in an exaggerated positive direction. In the depressive patient, it is skewed the other way. When I presented this material before the local analytic society, I said, "This is really psychoanalysis," and they said, "No, this is no longer analysis. You'd better stop calling yourself an analyst."

I had to find a new name for this approach. At that time I was attracted to behavior therapy, so I thought I would call myself a behavior therapist. I ended up with the idea of calling my approach cognitive therapy, because it was based on the cognitive model of psychopathology.

I mentioned earlier that I would have my patients use the clickers and report their automatic thoughts to me. It turned out that there were very specific themes or content in the automatic thoughts that corresponded to the various syndromes. Each syndrome, whether it is obsessive-compulsive disorder, delusional disorder, histrionic personality disorder, depression, anxiety, or hypochondriasis, would have its own specific content in the automatic thoughts. That is, a patient with any one of these disorders would be interpreting his or her experience, or misinterpreting it, in a unique and specific fashion. A depressed patient would interpret a situation such as somebody leaving by saying, "He left because I'm unlovable." The anxious patient would think, "Maybe I am boring—and I may bore others in the future." The paranoid patient would say, "He is really abusing me because he is hostile to me. I'll fix him."

As I continued with my work, I found that these cognitions were being driven by certain identifiable beliefs. The depressed patient's belief would be something like this: "People generally don't like me, and therefore if I am in any situation with other people, they are going to reject me." The anxious patient would have the belief, "People may or may not like me, but if I'm in a situation with other people, there is a danger that they will reject me." The person feels anxious because he or she perceives danger. The depressed perceive every situation in the past as being a loss in some way. The paranoid patient would have the belief, "If people reject me, it just shows what a rotten world we live in and what a bunch of rotters there are."

As therapy continued, it became important not only to get people to correct their automatic thoughts, but also to have them start examining their beliefs. This was a major advance because people can have an infinite number of automatic thoughts and they could spend the rest of their life trying to correct them all. If they could get down a little bit deeper to what was really constructing these thoughts, then we could get a much broader base for the therapy.

While we were working with patients, it occurred to us that not only did patients have different disorders, but people had different personalities that color these disorders. One of my experiences indicated to me that a particular way of looking at people's personalities would be very helpful when doing therapy. A young couple came in to see me for crisis intervention. They had just been married for a few weeks and were really at each other's throats. They thought maybe they should split. I asked, "Will you tell me what's behind this? What's happening?" The husband and wife then told me the following story, each one filling in from his or her own standpoint. They reenacted an actual scenario: The husband
says to his wife, "Dear, Bob [a colleague] is in town tonight, and I really need to go out and see him." The wife says, "You know I have a really bad cold, and I wish you'd stay home." The husband says, "Yes, but I really have to go." The wife says, "Why don't you just stay home with me this time?" He says, "Gosh, I can't do that." He rushes out of the house and slams the door, and she then says, "Good riddance. I'll find somebody else to stay with me."

The next day they called me. I asked them to roleplay this scenario again, but this time to tell me their automatic thoughts. The husband had the automatic thought when the wife was telling him to stay home, "If she wants to keep me home over such a small thing as this, what will it be like when something big happens?" The wife had the thought, "If he won't do such a small favor as this, how will he act when something big happens?" It became clear to me that there was a personality clash here, two different personalities at odds. He was a very autonomous, mobile person who prided himself on achievement, on being his own person, on being able to do whatever he wanted. She was much more sociophilic or sociotropic; her main pleasure in life was having interchanges with other people, solving problems with them and leaning on them for emotional support. He would solve problems by himself; she would solve problems with other people. These two quite different personality styles clashed.

Fortunately, this couple's styles were not so deeply imbedded that they could not eventually work it out. They accomplished this through a reverse roleplay, empathizing with the other person's feelings and attitudes and not taking everything personally; seeing that many of the things that seemed so noxious in the behavior of the other person were simply an outgrowth of a different personality makeup.

Sociotropy and Autonomy

This observation had some very important therapeutic implications. We developed a scale called the Sociotropy-Autonomy Scale and completed a study in which we divided patients into two groups. One group was composed of people who scored high on sociotropy, and the other group scored high on autonomy. Half of these subjects were put into group therapy and half into individual therapy. Not surprisingly, the sociotropic people did better in group therapy and the autonomous people did better in individual therapy.

Other work has examined depressed patients who had been on imipramine or placebo. When administered the Sociotropy-Autonomy Scale prior to their starting the pharmacotherapy or placebo, those who received the placebo and were sociotropic did very well. Those who received the pharmacotherapy and were either autonomous or sociotropic also did very well. The autonomous people who received the placebo, however, did very poorly. So there was something about receiving a pill that was very meaningful to the sociotropic people. Since they did not know that it was a placebo, an inert pill, probably some degree of suggestibility made the sociotropic people respond to it.

When DSM-III-R came out, we found that we could make a beliefs profile for each of the personality disorders. This profile has actually been confirmed. The borderline personality disorder patients scored highest on more of the beliefs than did the others. In a refined analysis, we found that these patients endorse certain specific items much more strongly than other patients. The items are "Being controlled by other people is intolerable"; "I can't trust other people"; and "If somebody leaves me, I'm afraid they'll never come back."

Feelings in Panic Disorder and Social Phobia

More recently, we have been looking not so much at thinking as at feelings. One of the main problems in the case of panic disorder is that patients get fixated on the anxiety, which becomes the most prominent motivating force
in their life. When fixated this way, they go into something like a hypnotic trance. When
the panic patient is having a panic attack, he or she has the thought, “This is terrible. I’m
dying (or having an epileptic attack or fainting or losing control) right now.” Panic-disordered
patients will say that having a panic attack is absolutely the worst experience that they have
ever had.

Some of the simplistic methods that we have used with the panic disorders are not
curative, but they are symptom relieving. One method is distraction. I will ask the patient who
is having a panic attack induced in the office, “How many fingers do you see right now?” or
“What’s my name?” As soon as they get distracted, they can stop the panic attack. This
technique does not have long-term effects, since the panic attacks will recur. We have to
give patients to reconstrue what’s going on and to see that their beliefs that they are dying and
so on are not based on any evidence.

The same observation is true of social phobias. The major work on social phobias
is being done in Oxford right now. It is interesting that people with social phobias do
not focus on other people’s faces. They have some kind of internal image they are projecting
onto other people. Behavioral and cognitive avoidance are also very important. Michael Gelder has referred to them under the rubric of the “safety behaviors” that people engage in.

Many years ago, I used to teach a course to the psychiatric residents on theories of
psychopathology and systems of psychotherapy. In those days, I covered all of the sys-
tems: behavior therapy, Gestalt therapy, Rogerian therapy, and psychoanalysis. This
was before I had developed cognitive therapy. I set up some standards that I thought
any system of psychotherapy should try to fulfill. These are 1) a coherent theory of
personality and psychopathology, 2) empirical data to support it, 3) operationalized therapy
that interlocks with the theory, and 4) empirical data to support the effectiveness of the
therapy.

DEFINING THE
COGNITIVE MODEL

Recently a taxi driver asked me what I was
going to do at the conference he was taking me
to, and I answered that I was going to discuss
cognitive therapy. He asked, “What’s that?”
and I said, “It has to do with the way people
talk to themselves.” He said, “Oh, I thought
that’s why they go to a psychiatrist in the first
place.” I said, “Well, yes, but we teach them
how to answer themselves.” That would be a
simple definition of cognitive therapy.

When I first was working in this area, I
defined cognitive therapy in terms of the
strategies that we used. Later I decided that
was incorrect because we use a wide variety
of strategies. What is the common denomina-
tor? How do we select strategies in a mean-
ingful way? I redefined cognitive therapy in
terms of the cognitive model. The cognitive
model has now been set up in terms of psy-
chopathology in general and then for each of
the disorders.

What is the cognitive model? In very sim-
plified terms, the cognitive model states that
dysfunctional disorders, psychiatric disorders,
and psychological or behavioral disorders are
characterized by dysfunctional thinking, and
that the dysfunctional thinking accounts for
the affective and behavioral symptoms. Many
of the studies now show that irrespective of
the intervention that is used, be it pharma-
cotherapy, analytic therapy, interpersonal
therapy, or cognitive therapy, when patients
get better there is an improvement in the way
they think. There is an improvement in their
attitudes, as measured, for example, by the
Dysfunctional Attitude Scale, or in their auto-
matic thoughts.

One of the myths about cognitive therapy
is that emotions are not important in it. I have
always thought that emotions are important
and that the therapist’s relationship with the
patient is very important. Interpersonal rela-
tions are also critical. I have always thought that
cognitions do not cause depression; they are a
part of depression. Environmental events are

JOURNAL OF PSYCHOTHERAPY PRACTICE AND RESEARCH
important, and simple rational reasoning is not enough to change dysfunctional thinking.

The model of depression, which we have described in our book, centers on the cognitive triad, which is supposed to be at the core of depression (irrespective of the cause of depression): the negative view of the self, experience, and the future. Twelve years ago, Don Ernst, then a graduate student at the University of Pennsylvania, reviewed all of the studies of the cognitive model of depression. There were 180 studies and about 220 comparisons. According to his review, 200 of the experiments supported the cognitive model. Twenty either did not support it or were contrary to it (unpublished study, 1985).

**Strategies in Cognitive Therapy**

Strategies, too, have been covered in our various books. We use a wide variety of techniques, including the experiential techniques and what can be called "conversational" methods. Here is a vignette to illustrate the conversational strategy.

One of my colleagues came into my office about 15 years ago, and he looked really bad. He said, "Tim, I know that you are supposed to be an authority on suicide. What do you think about rational suicide?" I replied, "Do you want to tell me why you are asking?" He said, "I don't want you to do anything about this and I don't want any therapy from you. I just want to know if you think I have grounds for rational suicide." I said, "Well, tell me about it." Briefly, he had been on a sabbatical. He had gotten very, very anxious. He was given chlorpromazine for his anxiety. After that, he got into a state where he wasn't thinking very well or moving very well, and he came to the conclusion that his brain was deteriorating. He went to see a neurologist, who said he had some soft neurological signs, but no illness. The neurologist suggested that maybe he was depressed. My colleague said, "No, I'm not. My brain is deteriorating and I just can't do anything."

Having told me all this, my colleague then said to me, "Now, don't you think, Tim, that is a good enough reason to kill myself?" I said, "Well, I have to know more about it. Can you tell me just why this thought is coming up at this particular moment? You have had this idea about brain deterioration now for several months." He said, "I'm giving a major lecture in the psychobiology of schizophrenia, and I know I'm just going to make a fool of myself. I can't possibly prepare the material. I don't know what to say, what to do. It just occurred to me that rather than wait and bug out at the last minute, I might as well wipe it out now, since, obviously, things are not going to get better. They will only get worse."

Putting on my naive cap, I said, "Gee, the psychobiology of schizophrenia. I think I know something about that, but I don't know if I know everything." He said, "Well, what do you know about it?" I said, "I know about the work that the groups are doing on the family aspects, that this is kind of a family problem." He said, "Tim, you believe that?" I said, "Sure. It's in the literature." He said, "Oh, Tim. How naive can you be? That stuff has been discredited." I said, "It really has? What's wrong with it?"

He started listing factors in schizophrenia: a, b, c, d. Meanwhile, I took out a big pad and started writing this down. I said, "What about the work at Yale, where they do find that if the child with schizophrenia has thinking disorder, the parent also does? It seems to me that's really pretty conclusive." He said, "You don't read the literature. Didn't you know if they test a sibling, the parents don't show the thinking disorder? It all has to do with test anxiety." I said, "Is that really true? Well, golly. What about the biology? Certainly, the serotonin hypothesis has shown itself." He said, "No, no. Let me tell you a little bit about dopamine and serotonin." Then he talked for about 25 minutes. Meanwhile, I took notes. At the end of the time, I said, "Well, I guess you want to go now?" He said, "Yes." I handed him the pad full of notes. I heard that two weeks later he gave a brilliant lecture. I never saw him again professionally.
This is what I call conversational technique, operating from the cognitive model. I think you can infer what I was thinking, what it was that had to be done with somebody who didn't want to have therapy. I didn't give him therapy, I just asked some innocent questions to prime the more mature aspects of his personality. Once he discovered that he could indeed function, the psychological basis for his depression disappeared.

**THE FUTURE OF COGNITIVE THERAPY**

I think that in the 21st century, psychotherapy will flourish. I don't think that pharmacotherapy is going to take over the field completely. There is no question that there have been brilliant findings in the biology of the various disorders and also in the development of many effective drugs. However, pharmacotherapy is not a panacea, and my own prediction is that it will not become a panacea. At least at the present time, only about 60% to 70% of patients, at best, get better with medication. Maybe, with very skilled psychotherapy, some of the other 30% might respond. One might say, "But the bad responders to pharmacotherapy are also going to be the bad responders to psychotherapy." However, I think there is an area there where psychotherapy can sharpen its tools and can pick up the nonresponders, the refractory cases. In fact, this is being done in Britain with cases of refractory schizophrenia.

One of the major areas for psychotherapy in the future is going to be treating very serious disorders, such as the rapid-cycling bipolar or the general bipolar disorders, schizophrenia, and various other serious disorders that are not totally controlled by drugs. An interesting study in which patients with acute schizophrenia were assigned either to treatment as usual or to cognitive therapy was done in Britain recently. It turned out that the schizophrenic patients treated with cognitive therapy required only half as much time in the hospital as those who received conventional treatment.

A number of studies are now going on in Britain with patients with chronic schizophrenia and also with bipolar patients.

Another feature of psychotherapy is that it is all-purpose. A patient comes in with a combination, say, of personality disorder, panic disorder, depression, anxiety, and paranoid attitudes. You do not have to give specific drugs for each of these conditions. You can use an all-embracing, all-purpose psychotherapy to help the patient deal with all of these problems. In fact, you may find some common denominator that is driving each one of these comorbid conditions. It may be that the patient's basic problem is that he sees himself as helpless. In response to the belief, "I am helpless," the overcompensation is to become overly aggressive, to perceive other people who are responding to the aggression as persecutors. The patient starts to feel anxious about this, and the anxiety starts to escalate. His helpless feeling comes into his thought, "I can't control this anxiety," and then he has a full-blown panic attack.

There are ways of dealing with each of these comorbid disorders psychotherapeutically, provided you have the right type of model. Some of the personality disorders are improved with some of the medications, but I do not believe that the really severe personality disorders can be affected by anything but serious, strenuous, long-term therapy.

Children and adolescents, I think, will do better with psychotherapy than with drugs. As yet, there have been no solid studies that have finally demonstrated that drugs have been effective with adolescent depression. However, there have been studies showing that cognitive therapy has been effective with adolescent depression. So there is real hope.

Prevention is very important. We found in our own study of suicidal patients that those who received effective therapy were much less likely to commit suicide than those whose therapy, retrospectively, was considered ineffective. Work done by Seligman and his group shows that early identification of potentially depressive children in school or in college can forestall later depression.
At the present time at least, cognitive therapy and other psychotherapies (I am not limiting this to cognitive therapy), are more effective than drugs for certain disorders, such as panic, cocaine abuse, and youth depression. One ongoing study, in particular, is very encouraging: there is a group of psychologists and corrections officers in the United States and Canada who have started to use cognitive programs with prisoners. The recidivism rate over a year in offenders who have received a specific cognitive-behavioral program is one-half as high as for those who just received the standard prison treatment.6

One last word about the future. I think the therapies have a role in treating the typical kinds of cases we are all seeing now, but they also have a very special role in family practice.

Some time ago, we established a liaison with a health maintenance organization in Philadelphia. We put our therapists right in the office of the family care physician. As soon as a patient comes in who looks the least bit depressed, they give the patient a depression scale or an anxiety scale to complete. Or if the primary care doctor says, "I think this patient has emotional problems, and she is always coming in here or bothering me with telephone calls. Why don’t you take a look at her?", the therapist sees the patient right away. Amazingly, at the primary care level, patients who would ordinarily take at least 10 or 12 visits to get better were getting better in 3 or 4 visits. I think that is where a lot of therapeutic skill can be applied in the future. We will have to wait and see.

REFERENCES