**On the Verbal Behavior of *Relational Frame Theory*:
A Post-Skinnerian Account of Human
Language and Cognition**

Kurt Salzinger, American Psychological Association

The authors of the provocative subtitle, without embarrassment, set out to produce a revolution in the behavioral study of verbal behavior. I first consider their new definition and then suggest avoiding the definitional problem by describing the properties that characterize verbal behavior, including both those that are like nonverbal behavior and those that are unlike it. Conceding that this book is not an easy read, I nevertheless conclude that we all examine its assertions in detail and in research.

When I first turned to the title of the book, I could not help but think in relational frame terms: Post-Skinnerian ⇔ Anti-Skinnerian ⇔ Anti-behavior-analytic; then I thought Post-Skinnerian ⇔ Provocative title ⇔ Skinnerian. Somehow the title of the book is as provocative as some of Skinner's book titles. But I am getting ahead of myself. There are a lot of interesting words and sentences and relations and ideas in this book. Many of them are familiar, especially after rereading them several times; some of them are new but mainly so on first reading; some of them are provocative, not because they are new but because they are said to be new and revolutionary and one has to do a lot of work to get beyond all of that. But that is a matter of style, and we all ought to fight reacting to that. I should also say that this book reviews a great many studies of verbal behavior, which is useful despite the fact that they are all sifted through RFT strainers.

Let us get into the content of the book itself. The authors of this book do not like Skinner's definition of verbal behavior because, we are told, unlike any other definition in behavior analysis, verbal behavior is the only one that requires another person to define it. Yet, given that the authors make quite a thing of the fact that verbal behavior is unlike other behaviors, it is not clear to me why this particular different approach to verbal behavior should bother them. After all, they also provide a definition of verbal behavior, which in many ways is unlike that of other definitions found in behavior

analysis. Let's look at their definition of verbal behavior (p. 43): "Verbal behavior is the action of framing events relationally.... Both speakers and listeners engage in verbal behavior relationally. When a speaker frames events relationally and produces sequences of stimuli as a result, the speaker is engaging in verbal behavior. In more lay terms, we say that the speaker is speaking with meaning." The authors go on to explain that when a parrot speaks the same words, then no verbal behavior is involved because the parrot does not frame the words. This implies, of course, that unless you've already used each particular word or presumably each set of words without having earlier used it or them as part of an equivalence or relational frame, you are not engaging in verbal behavior. It also implies that when a baby is just starting to emit words, say "glug," when the milk bottle comes into focus, that is not yet verbal behavior. Tacting thus may not be verbal behavior. It is only after tacts become substitutable for one another that one may talk of verbal behavior. But the fact is that young children must start to emit words that at first do not involve them in anything so complicated as equivalence paradigms. In the beginning, you must not only emit the word, you must have the emitted word reinforced. In other words, we cannot do without a simple operant conditioning approach if we are going to gain a complete understanding of verbal behavior.

With all the research that has been done by this time, nobody would want to disagree with the genuine importance of the equivalence paradigm. Stimuli that were not specifically set up to occasion responses do so simply by serving as responses in other contexts. By saying that we have emergent relations coming out of the equivalence paradigm, we are saying that learning of language is efficient and does not

Correspondence should be addressed to Kurt Salzinger, Executive Director for Science, American Psychological Association, 750 First St. NE, Washington, DC 20002-4242 (email: Ksalzinger@apa.org).

require, as cognitive psychologists have been maintaining when they criticized the behavior-analytic approach, specific and unique conditioning of every response to every stimulus. Of course, interesting as this is, it seems to me we ought to remember that we have other examples of response relations existing without specific conditioning as a prerequisite, such as stimulus and response generalization, intermittent reinforcement, plain and simple operant conditioning which results in the formation of both stimulus and response classes (Salzinger, 1967), and rule-governed behavior which also has the power to control behavior by virtue of responses being members of a response class and not requiring each response member to be specifically and separately conditioned.

Before continuing to review this book, I would like to describe the various characteristics of verbal behavior as an alternative to seeking out the one characteristic that distinguishes it from all other behavior. Indeed, it is probably best to simply describe what appear to be some of its special characteristics:

(1) Verbal behavior is easily and rapidly emitted in many different forms, thus making it a good candidate for presenting a great variety of stimuli and for emitting a great variety of responses. This great diversity makes for ease of communication. The variety also allows verbal behavior to provide many discriminative stimuli for finer control. Finally, rapidity and ease of emission means that verbal behavior is ubiquitous and therefore easily converted into conditioned reinforcers—positive and negative.

(2) Verbal behavior is quite stable in part because it is emitted at great speed compared to other behaviors and thus it can endure intermittent reinforcement by which it is controlled. Because verbal behavior is so easily emitted, it can garner reinforcement at an increased rate as well.

(3) Verbal responses can be easily imitated and thus they lend themselves most easily to the equivalence paradigms. Responses and stimuli can be essentially identical. Indeed, one is tempted to say that if anything is unique about verbal behavior it is its stimulus response similarity that distinguishes it from nonverbal behavior and stimuli.

(4) Rule-governed behavior is of course verbal and very important in controlling both other verbal behavior and nonverbal behavior of the

speaker, never mind the verbal and nonverbal behavior of listeners.

(5) Verbal behavior is easily emitted as private responses and therefore private stimuli, thus making it easily used by speakers to generate both public verbal and nonverbal behavior under the control of the speaker (thinker?). Furthermore, the emission of private verbal behavior can be easily adapted to problem solving.

(6) To return to Skinner (1957), verbal behavior has the attribute of requiring reinforcement by other individuals who must have a history of having been conditioned to emit reinforcing responses.

(7) Finally, the equivalence paradigm constitutes an important aspect of verbal behavior, as is amply demonstrated by this book.

But what do we do with the argument of this book, namely that relational responses are overarching response classes? The authors maintain that relational responses are like imitation, which forms a response class with no topographical similarity. Rather, imitation is a relational response class where the subject learns to do the same as what he/she sees. It is a matching task, where a response acting as a stimulus controls the matching response. Rather than pushing a button or pecking at a key, the organism repeats the behavior of the other organism. Viewed that way, we have nothing to get excited about. The question now becomes what is being reinforced in the equivalence paradigm? This book maintains that there is an overarching response class called relation and the form of the relational response is controlled by the context (I like to think of it as a discriminative stimulus) as to how to respond—the same, the opposite, etc. What is reinforced then is the relational response. Sidman's (2000) analogy is at least equally attractive, viz. p. 144): "An equivalence relation can be thought of as a bag that contains ordered pairs of all events that the contingency specifies; the bag can be shaken and the elements mixed without regard to any spatial or temporal relations among them." That leaves unspecified what the mechanism is that seems to transcend spatial and temporal relations. I would like to suggest that it is the same one that works in resurgence and in what we have all experienced as spontaneous recall. Our environment is constantly evoking verbal responses from us, most of which remain subvo-

cal and are not publicly emitted unless other stimuli are present to strengthen their evocation and no stronger stimuli are present to evoke conflicting responses.

But there is the possibility of still other explanations. Although the authors spend a chapter explaining rule-governed behavior by RFT, it seems to me, one can also make the argument that RFT can be explained by rule-governed behavior. Indeed, in formal logic courses, the relations obtained without providing the subjects with rules are the very rules that are taught.

Let me mention other parts of the book. Many of the chapters deal with application of Relational Frame Theory to such problems as developmental psychology, education, social psychology, psychopathology and psychotherapy, and finally religion. This book is not an easy read. The number of areas of psychology to which the theory is applied and the am-

bition of the theory in trying to explain many aspects of language is such that we do need to examine it in detail. Such examination will not be easy but the authors' level of aspiration is great enough for us to give it a chance.

REFERENCES

- Salzinger, K. (1967). The problem of response class in verbal behavior. In K. Salzinger & S. Salzinger (Eds.) *Research in verbal behavior and some neurophysiological implications* (pp. 35–54). New York: Academic Press.
- Sidman, M. (2000). Equivalence relations and the reinforcement contingency. *Journal of the Experimental Analysis of Behavior*, 74, 127–146.
- Skinner, B. F. (1957). *Verbal behavior*. New York: Appleton-Century-Crofts.