HOW CAN WE HELP OUR CHILDREN SUCCEED? INSIGHTS FROM THE PSYCHOLOGICAL LITERATURE

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While we are all familiar with general core psychological concepts that are the foundation for much of what teachers are taught in Education, we sometimes fail to apply these concepts properly in the moment in the classroom. Three such concepts are shaping of behavior, the Pygmalion effect and self-efficacy. This article examines these well-known concepts that have far-reaching implications for the dynamics of the classroom and gives illustrations of their successful application.

"I have written this work not to teach men what they do not know, but to remind them of what they already know and is very evident to them..." -From Path of the Journal by Ramhal, 1707-1746.

Ensuring students' success has received considerable attention from parents, educators and even politicians. As a result of all this attention, in 1993, the American Psychological Association Presidential Task Force on Psychology in Education created its Learner-Centered Psychological Principles: Guidelines for School Redesign and Reform. These were 14 psychological principles consistent with research in teaching and learning that were to promote success in learning. In a previous issue of this journal, Brown (2003) enumerated learner-centered conditions, derived from these principles, which should exist in classrooms.

But even more basic than all of these latest efforts and refinements are three psychological concepts, traditionally taught in every Teacher Education curriculum, which are important in ensuring students' success in learning. These concepts are: shaping of behavior, self-efficacy, and the role of teachers' expectations. In the courses I teach, I have students currently teaching in the K-12 grades, who are familiar with these three psychological concepts but do not appreciate their full significance. As a result, they are unable to apply them in new situations. This article considers how these fundamental three concepts can be used to increase children's success in the classroom.

Concept 1: Shaping of Behavior is an important component of positive reinforcement/behavior modification in the classroom.

It is undisputed that positive reinforcement can be a very successful technique in promoting student learning. But it must be used correctly in order to be effective. Imagine this real-life scenario. The class is a second grade class in a Hebrew Day School where prayers are recited aloud in Hebrew. To help children master the Hebrew text, the teacher gives them coupons when they have their finger on the correct word during prayer recital. The child who has the most coupons at the end of the week gets a prize. So do all those who have at least half the number of coupons that he has. The children who have less than that number do not get a prize. One of the children, David, who did not get a coupon the first week, and also not the second week seems to be doing even more poorly during the third week.

Any idea what is happening?

What is happening is that the second grade teacher is not doing behavior modification correctly. Behavior modification is about *shaping existing* behavior so that is starts to approximate a desired behavior. Behavior modification is not about a teacher's standards. What this means is that the teacher must take an already existing behavior and, at the first indication that behavior is starting to approximate the desired behavior, a reward is given. Thus, the method of shaping is also known as *successive approximations*. In the situation being described above, no shaping is occurring. The only thing that is happening is that since David is a human being, he must have some feelings about not getting coupons or a prize. The most likely feelings he has are feelings of frustration, or anger, or hopelessness, or shame or low self-esteem or some combination of the above. Having these negative feelings will lead to lowered expectations, and to yet poorer performance.

Let us review for a moment the example of the rat in the famous Skinner box. At first the rat is just wandering around the box. The behavior Skinner wanted from the rat is that he presses the lever. Skinner did not wait for the rat to press the lever in order to reinforce him. Any behavior that indicated movement in the desired direction was rewarded. What that means is that if the rat was usually in a certain part of the box and now started to move closer to the lever, that behavior was rewarded. Then if the rat merely touched the lever, instead of pressing it, that behavior was rewarded. So, what Skinner used was a method of shaping, or successive approximations, to the desired behavior.

The implication of Skinner's method for the second grade teacher is the following: If he sees the child improving ever so slightly, that improvement must be acknowledged. So, if now the child is on the correct line, whereas previously he wasn't, that behavior must be rewarded. Also, the teacher must try to find instances when the child' finger is on the correct place so that he can reward those instances. Success breeds success. Having been successful once, the child starts to develop confidence that he can successfully have the correct place again and will try harder to be on the correct place again.

When I teach shaping of behavior in my classes, my students (who are themselves teachers) often object and say: "But that isn't fair. The teacher, in the scenario you describe, is not requiring the same performance by all children for the same reinforcement!" This is very true. *And this is as it should be.* Behavior modification is not about having uniform requirements for all children. What it is about is reinforcing successive approximations to a desired behavior for any and all children. In this way *all* children are able to achieve the reinforcement.

Concept 2. **Bandura's concept of Self-efficacy: Students' concepts of themselves will actually determine their success in the learning task.**

Self-efficacy is a term coined by Albert Bandura (1997), the famous social learning theorist. It denotes an individual's feelings of competence; namely, the belief that s/he is capable of the specific behavior required to produce a desired outcome in a given situation. Bandura makes the point that given a group of children, all of whom have roughly the same abilities, the best way to predict who will accomplish

and who won't is by means of self-efficacy. ***The student's view of himself determines the success he will have: If a student believes he will succeed then he will; if he believes he won't, then he won't!*** Believing in one's success is crucial towards making that success happen.

In the famous "blue eyes brown eyes" experiment, Jane Elliott, an elementary school teacher in the 1960's, told her students that in a particular week the students with one eye color were "superior" and had privileges that the other students didn't have. The "superior" students did better on cognitive tasks during the weeks they were "superior" than during the weeks that they weren't superior. Isn't that remarkable! Thinking you'll do better actually results in your doing better! Think what a powerful technique that is.

But what makes a child believe in his self-efficacy? To a large extent, it is the messages (both explicit and not so explicit) that teachers and parents give him. Every child needs and has the right to be given the message that he will succeed. ***A teacher who doesn't give students that message hinders his ability to succeed.***

Concept 3. **Rosenthal and Jacobson's Pygmalion effect: Teachers' messages and expectations determine the success students have in learning.**

The psychological literature teaches us that what is in a teacher's head about a student, namely, ***the teacher's view of the student, actually determines the progress that the student will make***. Perhaps the most famous study addressing this issue is Rosenthal and Jacobson's (1968) study of the Pygmalion effect. In this study, teachers were told that some children were "bloomers," viz., that they were on the verge of an intellectual growth spurt. A variation of this study was conducted with adult welding students and their welding instructor and the results were comparable. In a review of additional studies, Rosenthal (1985) found that teacher expectations can significantly predict student performance.

Why are teachers' expectations so important? There are many reasons but probably one of the most significant is that teachers' expectations are instrumental in molding a student's self-expectations. And, as we saw in the preceding paragraph, a student's having positive expectations, i.e., feelings of self-efficacy, will in and of itself lead to his increased success.

In light of all this, let's consider a not so uncommon elementary school scenario. Josh is a 1st grader, presently completing first grade, who is not doing well. There is talk both in school and at home about Josh not being promoted to second grade. The parents are concerned about his being held over and Josh hears conversations his parents have with each other voicing their concern. If Josh makes that internal attribution that he is failing because he is stupid, this is further stacking the cards against his doing well in second grade. Even if he has enough self-esteem not to make that internal attribution, at the very least he may make an internal attribution that somehow he must be doing something different from the other children since they are doing well enough to be promoted and he is not. Meanwhile, at the school the prospective second grade teacher, Mrs. Jones, may at the end of the semester be getting the "scoop" from the first grade teacher about what the kids in the class are like in order to know what to expect next year. She hears about Josh and forms an

expectation about him accordingly. *But what's in the teacher's head determines his performance next year!* Mrs. Jones should not be privy to information from the first grade teacher.

One might argue that Mrs. Jones might use the information she has about Josh to help him do better. But that's not what Rosenthal found! The teacher's knowledge of negative information about a child worked only to the child's detriment. Even if Josh is promoted to second grade, the entire situation has greatly undermined his ability to succeed.

The above three principles make very powerful statements about what makes kids (and adults) succeed or fail in learning. If we want students to succeed, we must operationalize positive reinforcement correctly, i.e., we must not stick to a rigid standard but reward any behaviors they demonstrate that show movement in the desired direction. Furthermore, we must give them assignments and exams in which they can experience success. This is not to say that we can't make exams challenging. Indeed they should be challenging. But our recipe for success requires a teacher who is both resourceful and flexible. Teachers need to give exercises/activities that increase in difficulty gradually so that children are able to do them and meet with success. When students experience success, they feel empowered, enabling them to approach future tasks with a "can do" instead of "can't do" attitude. We must also, in our own heads, view our students as capable and achieving and treat them as Carl Rogers (1969) says with "unconditional positive regard." By doing so, we enable them to view themselves as success stories. They will then go on to enact these scripts in real life.

References

APA Task Force on Psychology in Education (1993). *Learner-centered psychological principles: Guidelines for school redesign and reform*. Washington: DC: American Psychological Association and Mid-Continent Regional Educational Laboratory.

Bandura, A. (1997). *Self-efficacy: The exercise of control*. New York: W. H. Freeman.

Brown, D. M. (2003). Learner-centered conditions that ensure students' success in learning. *Education, 124*, 99-103.

Jussim, L. (1986). Self-fulfilling prophecies: A theoretical and integrative review. *Psychological Review, 93*, 429-445.

Rogers, Carl R. (1969). *Freedom to learn*. Columbus, OH: Merrill Publishing.

Rosenthal, R. (1974). *On the social psychology of self-fulfilling prophecy: Further Evidence for Pygmalion effects and their mediating mechanisms*. New York: MSS Modular Publications.

Rosenthal, R. (1985). From unconscious experimenter bias to teacher expectancy effects. In J. B. Dusek, V. C. Hall, & W. J. Meyer (Eds.), *Teacher expectancies* (pp. 37-65). Hillsdale, NJ: Erlbaum.

Rosenthal, R. (1994). Interpersonal expectancy effects: a 30-year perspective. *Current Directions in Psychological Science, 3*, 176-179.

Rosenthal, R. (1995). Critiquing Pygmalion: A 25-year perspective. *Current Directions in Psychological Science, 4*, 171-172.

Rosenthal, R. and Jacobson, L. (1968). Pygmalion in the classroom: *Teacher expectation and pupils' intellectual development*. New York: Holt, Rinehart and Winston.

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