The Impact of Positive Behavior Intervention Training for Teachers On Referral Rates for Misbehavior, Special Education Evaluation and Student Reading Achievement in the Elementary Grades

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Abstract

A professional development program which trained whole school staffs in the use of positive behavioral interventions for the purpose of reducing referral rates of students for misbehavior and special education evaluation. The program focused on training teachers and paraprofessionals in behavior management strategies to increase "high approval teaching," to develop structured and organized classroom environments, to engage in contingent teaching, and to improve the overall school climate. The findings suggest that training whole school staffs is an efficient way to reduce referrals for student misbehavior, to reduce the number of conduct-based referrals for special education evaluation and to impact positively on student achievement vis-à-vis reading performance.   The data demonstrate that increasing on-task behavior in classrooms and reducing misbehavior results in increased student achievement. This work stresses the importance of teaching prosocial and proacademic behaviors to elementary grade students, how these behaviors are critical to school success, and the way in which school principals can provide leadership for this work.
Keywords: contingent teaching, pro-social behaviors, pro-academic behaviors, reciprocity of approval.

Introduction

The relationship between behavior management and student achievement has long been documented in the literature. Pre-service teacher education programs especially in the elementary grades must recognize the importance of training teachers in positive behavior intervention techniques as a way to maximize student social and academic learning. All too often, novice teachers arrive at busy, urban schools lacking the techniques they need to create positive learning environments that can best meet the diverse needs of elementary level learners. Both pre-service teachers and novice in-service teachers lack the years of experience which over time informs classroom management generally and behavior intervention more specifically. As a consequence, while they may know some behavior management techniques, they clearly have not had adequate training in how to implement these techniques nor how to maintain or generalize prosocial or proacademic behaviors in students after they begin to emerge in response to intervention.

What is key for classroom teachers in elementary school settings is that teachers understand both deficit and excessive behaviors relative to developmental norms and can design whole class and individual interventions that will seek to increase deficit behaviors and decrease excessive behaviors using high frequency social approval and tangible reinforcers during behavior acquisition.   Positive classroom climate and classroom organization including structure and routines are essential for at-risk children to learn how to function in school. The importance of the classroom environment has been noted by Polloway, Patton and Serna (2001), who maintain that classroom organization and management are essential "precursors to teaching." Without this basic learning, the likelihood is that many young children, who may already come from chaotic and disorganized homes, will not have the opportunity to learn behaviors which will optimize their performance in school over time.

Hence this article will address how positive behavioral intervention training can be of great importance in providing elementary school teachers with myriad techniques that can literally change

school outcomes for significant numbers of children who are often referred to special education because they have not developed the prosocial and proacademic behaviors necessary for school success.

The long-term causal relationship between teachers' abilities to manage students' behavior and teachers' referrals of misbehaving students for special education was evident in a series of studies conducted in the same schools where the behavior training program being described here was conducted. In fact, these studies, conducted over a multi-year period, alerted the school district administration to the problem and to request the behavioral intervention training.

These studies highlighted a couple of important facts. Whereas virtually all teacher referrals were based in some part on poor academic performance, about half also included misbehavior as a reason for referral. Moreover, in these schools the statistical probability of a teacher-referred students having a disability and being found eligible to receive special education services was about 90% (Gottlieb, Gottlieb & Trongone, 1991). Teacher referrals were not evenly distributed. One-eighth of the teachers made two-thirds of all referrals (Gottlieb & Weinberg, 2000). Thus, the motivation for the district administrators and the principals was the prospect that if high-referring teachers were taught and subsequently used effective behavior management strategies, there would be a substantial reduction in the special education population in the district's schools.

Changing Cycles of Mutually Aversive Interactions between Teachers and Students

In order to implement positive intervention strategies, teachers need to understand how behavior is both interactional and transactional. In other words, what the teacher does or says to students impacts the students directly and in turn, what the students do or say in response impacts the teacher directly, putting in motion a cycle of interaction that can either be mutually positive or mutually aversive. All too often, teachers fail to recognize how their own behaviors contribute to students' misbehaviors and how this impacts negatively on student learning. Polirstok and Greer (1977) were able to document how teacher-student interactions could be mutually positive or mutually aversive. "High approval" teaching was a critical variable in increasing the appropriateness of student behaviors as well as strengthening student achievement in response to teacher approval. This reciprocity of approval phenomenon was also documented in subsequent studies by these researchers examining the relationship between tutors and tutees (Polirstok & Greer, 1986; Greer & Polirstok, 1982). The converse has been documented as well. When the teaching in classrooms is "high disapproval" (extremely negative and critical), then student responses to this teaching are typically characterized by increased verbal/physical aggression, often escalating in severity in response to the frequency and magnitude of teacher disapproval. Helping teachers to learn how to be structured, organized, and high approval is a very important lesson, one that our professional development program hoped to teach.

A Whole School Training Approach to Reduce Disciplinary Referrals and Referrals to Special Education

Gottlieb and Polirstok (2005) report on a professional development program where the instructional staff of three schools were trained to use positive behavioral interventions in order to reduce the number of disciplinary referrals made by teachers to the school principal and/or guidance counselor and the impact of these reductions on the overall number of referrals for special education evaluation and placement in each of the schools. While the performance of each of the schools on standardized reading measures was not an intended variable for assessment in this professional development program, the findings strongly demonstrated the interrelationship among "high approval teaching," increased student on-task behavior, and academic achievement.

The three schools were selected to participate in this professional development program by district supervisors who were concerned with each of the school's disciplinary referral data and declining

academic performance. The three schools had similar student populations, mainly poor (91% - 99% received free lunch) and mainly minority (40.3% African American, 55.7% Latino, 3.2% Asian, and .8% Caucasian). Each of the schools was characterized by low academic achievement, high teacher requests for transfer and retirement, high percentage of novice teachers and pervasively low staff morale.

School #1 was the first school selected for training. School #1 was a K-8 school with a total of 550 students. Approximately 300 of these students were in grades K-5. The number of disciplinary referrals made by teachers to the school principal and/or counselor for the year prior to the initiation of the professional development program was 625. This number was substantially more, in fact 42% more, than the 360 disciplinary referrals forwarded to the principal for grades K-5 two years prior to the professional development program. Hence not only was the number of disciplinary referrals quite high the year before the onset of the program, but in fact the number of referrals had been increasing over time and the data suggested very serious problems regarding classroom management and appropriate student deportment on a building-wide scale. Another concern that the district administration had about this school in particular was the high rate of referrals for special education evaluation and placement due to conduct problems, which was more than 200% higher than the district average (11.2% as compared with a district average of 4.7%).   Relative to the entire school system, School # 1 placed in the top 5% of the total 811 elementary and middle schools.

Consistent with the district administration's concern regarding high referral rates for special education evaluation and placement due to conduct problems, two additional schools were chosen for the professional development program. In these two elementary schools (School #2 and School #3) selected for training during the year following the training at School #1, the total number of referrals for special education evaluation and placement represented 8% of the enrollment in each of the two schools, almost double (170%) the average district special education referral rate.

From an administrator's perspective, when teachers are making both disciplinary referrals and referrals for special education evaluation and placement due to conduct problems occurring at high rates, it suggests that the teaching staff depth of training in whole class management overall and in individualized strategies for increasing student rule compliance, on-task behavior and academic performance.

The Professional Development Program

To address the problem of too many disciplinary referrals in Schools 1, 2 and 3, a training program for all administrators, clinical personnel, teachers, and paraprofessionals was initiated. The training focused on behavior management procedures employing positive behavioral interventions to increase the level of teacher praise and reinforcement to students, thereby decreasing punishment and negative teacher comments. This is in keeping with current trends in behavioral intervention which stress positive interventions over the use of more negative and punitive strategies (Smith et al., 2004).

Techniques that were taught in this program included: identifying classroom rules, using contingent, "high approval" teaching, structuring hierarchies of no-cost or low cost tangible reinforcers, and selective ignoring. These are all techniques which have been widely documented in the literature as effective in managing student behavior and in promoting student learning (Lloyd, Forness, & Kavale, 1998). Helping teachers change their overall approach from "high disapproval" to "high approval" and to recognize that "high approval" teaching does not make them appear weak or insincere to students was a significant component of this professional development program. The program sought to empower teachers to create high approval classrooms where children would feel safe to take the necessary risks to tackle difficult academic tasks and change their inappropriate behaviors. In a contingent classroom, the rules are clear and the teacher approval and/or reinforcement is dispensed in an organized and consistent

manner. Contingent classrooms with "high approval" teaching provide the kind of environment where students can begin to demonstrate prosocial and proacademic behaviors because the structured environment supports those behaviors.

An overriding intent when developing the training program was the desire to minimize demands on teachers regarding record keeping. Deliberate steps were taken to insure that teachers did not have to do things that were overly demanding of their time in order to implement the program successfully. The rationale was that if teachers were asked to do things that were too taxing or foreign to their normal routines, they would not attempt the required activities, an outcome often evident when new behavioral programs are piloted.

The school district administration dedicated seven half days between September and January for training in School 1.   About 8 weeks following the training, a 45-minute follow-up session at a regularly scheduled faculty meeting was provided to review several key points and answer teacher questions. The two additional schools, School 2 and School 3 were trained jointly during the following year; only five half day sessions were available for the professional development program between September and January. Similarly, a follow-up refresher session 8 weeks later was held for both schools at their regular monthly faculty meetings.

Each of the 150-minute professional development sessions typically began with a question and answer period, where teachers raised questions about problems they encountered in their classes. The trainer encouraged group discussions to address these problems. Another portion of each session focused on a specific behavior management technique and how that technique could readily be used in classrooms.

The overall professional development training included:
*(1) How to develop classroom rules that were behaviorally specific (few in
number & stated positively)*;
*(2) How to teach classroom rules to students to foster student ownership of
academic and   behavioral performance (increase locus of control through
self-monitoring);*
*(3) How to increase teacher consciousness about language used with students to either praise or
reprimand and whether teacher comments were appropriate given classroom rules (how
to be a contingent teacher in the use of approval and disapproval);*
*(4) How to increase the number of positive statements made by teachers to individual students as
well as to the whole class, as compared with the number of negative statements made to
individual students as well as to the whole class (how to be a high approval teacher and
change the approval/disapproval ratio in the classroom);*
*(5) How to develop reinforcement systems that were "user- friendly" in terms of
time and record keeping (limit the complexity of the system developed);*
*(6) How to use selective ignoring while trying to "catch students being good"
(change the focus from "catching students being bad"); and*
*(7) How to work with high frequency disruptive behaviors by reducing them
gradually over time (set realistic behavior change goals which recognize
that change is often a slow process).* (Gottlieb & Polirstok, 2005)

Time during each training session was allotted for participants to meet in small groups, usually by grade level taught, to discuss how specific techniques presented could actually be applied in their classrooms in a developmentally appropriate way. Clinical personnel were integrated in these small group discussions and provided insight from a developmental perspective about what strategies might work with particular grades. The collective sharing of group members during training sessions led to

additional discussions at other times when the professional development program was not taking place. In essence, participants were learning how to collaborate and support each other with respect to general classroom management issues, as well as issues related to the special needs of individual children.

Monitoring the Success of the Professional Development Program

The evaluation of outcomes varied slightly according to the data available in individual schools. Some data, such as standardized achievement testing and referrals for special education evaluation and placement, were available in all three schools. Other data, such as the number of disciplinary referrals forwarded to the principal, were available for only School #1.

Information on disciplinary referrals in School #1 was provided by the building principal. The number of referrals that the principal received from the teachers was recorded monthly. Information regarding the number of referrals for special education evaluation and placement as well as the reasons for them was obtained from the clinical team that was responsible for processing all special education referrals for each of the three respective schools. Members of the clinical team assigned to each school received the referrals and the accompanying documentation, conducted the multi-disciplinary assessments and determined eligibility and placement recommendations. Information on referrals from each clinical team was gathered at the end of the academic year.

Decreasing Disciplinary Referrals to the Principal

Disciplinary referrals detailing student misbehavior(s) were sent to the principal in School #1. In the year prior to the training, 625 disciplinary referrals were sent to the principal, a significant increase over the 360 that had been submitted the year prior. During the school year that the professional development program was offered, 246 disciplinary referrals were forwarded, a reduction of 61% over the prior year and 32% over the year before that.

Decreasing Referrals for Special Education Evaluation and Placement

Special education referrals to the clinical team for behavioral problems were collected in Schools #1, #2 and #3. In School 1, data on referrals to special education during the training year were compared with data from the previous year. The data showed declines that paralleled the decrease in disciplinary referrals, a drop of 30 to 11, or 63% reduction. Data on referral rates to special education were collected in Schools #2 and #3 during the training year in both of these schools and those rates were compared with the previous year's data, yielding a 31% drop.

Fostering Increases in Academic Achievement

School achievement data on standardized reading tests administered to all schools in the school system were used as measures of academic achievement. During the school year prior to the initiation of the professional development program in School #1, 27% of the students in that school scored at or above grade level on the California Test of Basic Skills, administered annually to all students in the school system beginning in the third grade. In the year immediately following the training, 35.3% of the students in School #1 scored at or above grade level. The increase of 8.3% of children reading at or above grade level was substantially higher than the 3.5% average increase for that school district as a whole across its 15 elementary schools. In fact, it was also the first time in six years that reading scores in School #1 had improved.

Reading scores for Schools #1, #2 and #3 at the end of the second training year were compared with the remaining twelve elementary schools in the district. The percentage of children reading at or above grade level in the three schools that received the professional development program increased from

28.8% to 32.3%. During the same period, scores for the remaining twelve schools declined from 39.2% reading at or above grade level to 37.7%. Despite the fact that the district had allocated the same level of resources for literacy development in all 15 elementary schools, the three schools that received the professional development program improved five percentage points beyond the other schools. Indeed only two of the twelve schools in the comparison group improved their performance during the same time period.

Improving School Climate

As a consequence of the professional development program, tangible changes in school climate in Schools #1, #2, and #3 were noted.   Observational data supplied by the principals characterized the nature of these changes: (1) teachers treated children with greater respect; (2) there was less "backbiting" among teachers than had occurred in previous years; (3) the faculty seemed less stressed; (4) teacher-paraprofessional teams functioned more consistently and more effectively with regard to classroom management; (5) itinerant teachers saw positive changes in the school environment; and (6) clinical staff interacted with teachers in a broader context as resource personnel.

It is important to note that the changes in school climate occurred even though not every teacher had adopted the program. Principals reported that about one-third of the teachers attempted the program and dropped it within a day or two, claiming that it was not effective. Another third attempted to implement the behavioral program, stopped, and then resumed it, sometimes for several iterations. A final third of the teachers implemented the program and stuck with it for the duration of the school year. The principals were questioned as to why some teachers believed that the program was unsuccessful. They responded that those teachers who saw the program as a failure were seeking total and immediate elimination of the inappropriate behaviors they were trying to improve. When the behaviors were not extinguished immediately, the teachers concluded that the program was not viable. Other teachers who kept coming back to the program were more willing to accept a gradual reduction in inappropriate behavior rather than a total and sudden elimination, as a criterion for success. Changing classroom behavior of whole classes or individual students requires that teachers examine their use of reinforcement and punishment and the provision of incentives to foster engagement of students in the change process. For teachers who had the patience to work with the program, results were evident.

Implications

The findings of this professional development program confirmed what researchers and teachers typically say about classrooms - that successful behavior management is a critical prerequisite for successful academic instruction. Less time spent on managing behavior translates into more time available for instruction. This finding is supported in the literature: "Effective classroom management is required if students are to benefit from any form of instruction, especially in inclusive classrooms where students display a wide range of diversity [Jones & Jones, 2001)]" (Smith, Polloway, Patton & Dowdy, 2004, p. 42).

As a result of this professional development program, disciplinary referrals and behaviorally-based special education referrals declined substantially. When teachers were provided with the skills to manage disruptive behavior, they referred fewer students for special education.   In reviewing the referrals to special education that did occur over the intervention period, it was noted that the nature of these referrals shifted from primarily conduct-based referrals to more academically-based referrals that were skill specific.   Clearly children who need special education services should be referred for special education evaluation and placement.   All too often however, once children are referred for special education evaluation, the number of students found to need services is extremely high.   While the goal is that students who truly need special education get those services, the problems inherent in the

assessment/evaluation process especially related to children from diverse backgrounds may result in students being placed in special education incorrectly because they have not had the opportunity to develop the prosocial and proacademic behaviors required for success in school. Pre-service teachers and novice teachers need to acquire the dispositions and knowledge necessary to develop social skills, on-task time, and rule following behaviors in children in very directive ways, so as to maximize student performance in general education classrooms and decrease special education referrals.

While all three schools in the study demonstrated improvement on the variables targeted for intervention, School #1 showed greater improvements than Schools #2 and #3. This may be due in part to the fact that School #1 was trained by itself over 7 half-day sessions, while Schools #2 and #3 were trained together over 5 half-day sessions the following year. In all three schools, the number of available staff development hours was determined apriori by the school system; no additional funds or times were provided for additional training. This was a true limitation of the study because while the intervention curriculum was covered during the allotted times during both training years, additional time for questions, content integration and shared faculty discussion were limited. Moreover, training two schools together in comparison with training one school by itself could have negatively impacted on the comfort level teachers experienced when sharing concerns regarding their teaching and management and made teachers reticent to address the group during the training.

Finally, the role and reputation of the principal as a leader and respected colleague could have also had an impact on the performance of each of these schools. School #1's principal was highly regarded by the staff, attended all training sessions and actively participated throughout the program. In School # 1, the principal was a "high approval" administrator, dispensing praise to staff for decreased disciplinary referrals and improvements in the climate and operation of the school building. In contrast, while the principals of Schools #2 and #3 supported the program and encouraged the staff to participate, they did not actively participate in the sessions themselves.   It would seem that the active participation of the principal in this type of school-wide intervention may be a critical variable.

Using this school-wide approach to improving behavior impacted significantly on school climate and highlighted the roles clinical personnel can play in supporting school change. Clinical personnel met more often with groups of teachers to discuss reinforcement programs for whole classes as well as individual students with special needs. The gap between "in-classroom personnel" (teachers and paraprofessionals) and "out of classroom personnel" (clinical psychologists and social workers) was bridged by this positive intervention program.

The professional development program highlighted in this article recognizes the importance of creating school communities rich with approval and opportunities for success.   Interactions between teachers and students that are characterized by high approval can contribute to a successful instructional program and a positive school climate, which can yield the types of academic and behavioral gains described in this work.

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