Integrating Cooperative Learning and Structured Learning: Effective Approaches to Teaching Social Skills

Marybeth Andersen, Linda R. Nelson, Richard G. Fox, and Susan E. Gruber

Most educators agree that students must have social skills in order to work cooperatively at school. Further, skills in cooperation are needed in a broad range of human contexts. They are necessary for participation in families, school, friendships, work settings, and the community. Although the rationale for social skills training may be straightforward, it is more broadly based on meeting legal mandates, enhancing the mental health of teachers, improving vocational opportunities, and benefiting society in general.

Clearly, the public expects schools to equip students with a comprehensive range of skills. In fact, the general education laws of most states require that public schools provide students with educational opportunities to acquire academic skills and knowledge, vocational skills, citizenship, and personal development. Implied in these expectations is the idea that students are fully educated only if they have adequate social skills, can work cooperatively, and possess problem-solving skills.

Teachers and others realize that students must be taught higher level reasoning skills to help them become competent critical thinkers. Yet many teachers have increasing difficulty teaching the 3R’s, much less those skills necessary to better prepare young people for adulthood. As a result, teachers are becoming less satisfied with the quality of their professional work and are more likely to experience problems with their jobs than are most Americans (Johnson, Johnson, Holubec, & Roy, 1984). Many teachers are frustrated by children who behave in socially inappropriate ways. It is difficult to teach children and adolescents who lack interpersonal skills to interact effectively with others.

This issue is especially critical when considering the educational environments in which handicapped children are served. Nonhandicapped children interact less frequently and, in general, more negatively with handicapped children without proper attention to social skills instruction (Gresham, 1982). Also, initially, desegregation efforts may bring prejudices or negative attitudes into the classroom, for handicapped and nonhandicapped children alike. When a student is influenced by his or her family background, role models, and peers, the teacher must respond with more than the traditional daily lesson plan.

Marybeth Andersen is affiliated with the Milwaukee Public Schools. Linda Nelson is with the Waukesha (Wisconsin) Public Schools. Richard Fox and Susan Gruber are with the Department of Exceptional Education, University of Wisconsin-Milwaukee.

The importance of learning to work cooperatively goes beyond the classroom. Students who are unable to work effectively with others will leave school unprepared for the world of work. Schrom (1980) states that, "The acute youth unemployment problem has raised the question of whether various sectors of society (school, family, government) could better prepare young people for their lives after school." At the 1985 NEA Representative Assembly, Mary Hatwood Futrell (1985) stated:

We are losing a million children each year who drop out of school. Over a quarter of our nation's young people never graduate. In many of our urban centers, over half the minority students drop out. Many cannot read a classified ad or the warning on a bottle of medicine. Some leave pregnant, others hooked on drugs. The fortunate ones find their way to dead-end jobs. The unfortunate find their way to jail. Too many—far too many—choose suicide as their escape.

Teachers who are currently practicing and those who will eventually join the profession will not be satisfied with accepting these grim statistics. Educators must find answers to rescue would-be dropouts and the so-called unteachables. No longer can we restrict formal education to the 3R's. Social competence and the concerns therein, such as morality, decision making, emotional development, and coping skills, must be an integral part of educational curricula. If we are going to teach the "unteachable," if we are going to teach children who are at-risk, if we are going to be effective with students who are encumbered with unprecedented problems, we as educators and as a society must become serious about the social and personal effectiveness, competence, and development of every student.

Many students do not have the collaborative skills needed to function in groups. When students have never been taught to interact appropriately with others, it should not be assumed that they will learn these skills simply because they are expected to. Students must be taught social skills for effective group functioning and other cooperative interactions with others so they can build constructive peer relationships, as well as develop psychologically, cognitively, and socially. Considerable research evidence shows that students learning cooperatively master more academically and demonstrate social behavior at higher levels than students studying competitively or individually (Johnson et al., 1984).

A variety of social skills curricula have been written for both exceptional and regular educators to develop communication skills, facilitate mainstreaming, and encourage job preparation. Two effective models that have been demonstrated are cooperative learning (Johnson & Johnson, 1987) and structured learning (Goldstein, Sprafkin, Gershaw, & Klein, 1983; McGinnis & Goldstein, 1984). Both approaches to teaching social skills are compatible with one another and in need of integration.

This article describes the three goal structures used in teaching that provide the context in which social skills are learned. The critical elements necessary for establishing a cooperative learning classroom setting are reviewed. Then the major components of structured learning are presented as a strategy for teaching social skills, followed by an example of integrating the two models. Finally, the limitations and advantages of combining these two approaches is presented. If we intend to be successful in teaching social skills, it is best done through direct instruction and in an academic setting. By using this integrative approach, not only will the probabilities be enhanced that students will learn basic academic skills, but that they will come to be effective in the personal and social domain as well.

GOAL STRUCTURES

According to Johnson and Johnson (1987), there are three types of goal structures: cooperative, competitive, and individualistic. Goal structures determine the way in which students will interact with each other and how the teacher will achieve an instructional goal. It is important for students to learn which behaviors are expected in each situation. Goldstein, Sprafkin, Gershaw, and Klein (1983), Gresham (1981), and Strain and Shores (1983) tell us that we need to assess behavior skills, teach the skills, and teach transference of the learned behavioral skills. We cannot assume that a stu-
dent's behavioral repertoire includes the social skills necessary for success in school.

In any society, the most common interaction is cooperative. Without cooperation, humans would cease to exist. Competitive and individualistic goal structures can be used within a cooperative environment.

**Competition**

In a competitive goal structure, students work against each other to achieve a goal that only one or a few students may obtain (Johnson et al., 1984). The traditional classroom overuses competition. A student’s performance is constantly being compared to the performance of another student. In a competitive classroom, some students must come out on top and, as a result, the rest are ranked low or lose. If a student always experiences losing or failure, self-confidence and motivation will be affected negatively. Competitive situations encourage individuals to prevent others from “winning” or accomplishing a goal. Students may develop negative attitudes toward individuals who are more successful than they are, as well as toward the teacher and the school. Schrom (1980) reported that the attitudes of ninth-grade students toward school (finding school to be a negative experience) was a major factor influencing students to drop out of school.

Cooperative learning procedures have been used to enhance classroom management procedures and to decrease absenteeism. Students who are continually placed in a competitive situation do not learn for intrinsic reasons. Learning for its own sake is not rewarding. Winning is the reward. “The inappropriate use and overuse of competition have many destructive outcomes which interfere seriously with successful instruction” (Johnson & Johnson, 1987).

Teachers and students must recognize when to use competition in a positive manner (e.g., drill and practice exercises, review, speed-related tasks, or when a quantity of work is desired). Competitive situations should be structured so that students do not feel hostile toward their peers. For example, it could be arranged so that there would be more than one winner in the class (e.g., one winner per group of three of four). It should be an enjoyable experience. If students compare themselves, this should be done with the purpose of finding out what they are capable of doing (Johnson & Johnson, 1987). After students have learned the material to be mastered in a heterogeneous cooperative group, they could be quizzed in a homogeneous group comparing like-ability students rather than high, middle, and low students. Under the appropriate conditions, competition can be beneficial.

**Individual**

As an alternative to competition, individualized instruction became popular in the 1970s. In an individualized setting, students work by themselves to accomplish goals unrelated to the goals of others (Johnson & Johnson, 1987). An individualized program requires the teacher to plan for each student based on extensive evaluation of each student. Every student must be instructed individually because no two students are working on the same task or at the same rate. Clearly, it is difficult, if not impossible, for the teacher to give each student the attention or instruction he or she needs to progress optimally. Individualized instruction would be most desirable under conditions in which it is possible for each individual to achieve the goal. At times, of course, students have to work individually (e.g., at a computer). But when students do not interact with each other, they have no opportunity to practice skills needed to develop divergent thinking and decision making. Further, they do not have the opportunity to learn to appreciate others or to practice getting along with their peers.

**Cooperation**

A third goal structure is cooperation. In a cooperative goal structure, students in heterogeneous groups work together to accomplish a common goal. Cooperative learning means more than high-achieving students helping slower students. Group members are concerned about the performance of all group members. Students are rewarded on performance of the whole group. Every student must master the material and is individually accountable for contributing a share of work to the group.

In cooperative learning groups, each member is responsible for helping other group members learn. Students learn vocabulary or spelling, solve math problems, or write a story together. Each student in the group might learn a part of the problem, then teach the other group members their parts, and finally review, rehearse, elaborate, and explain prior to turning in the assignment. All members sign a paper indicating that they know the answer and have completed the task and can explain it.

In a traditional classroom, students are anxious to complete the assignment. In a cooperative setting, students are not only evaluated on the final product (e.g., an average of group test scores) but also on how well they maintained good working relationships. In cooperative learning groups, the social skills that students need in order to work collaboratively, such as leadership, communication, and conflict management, are taught directly (Johnson & Johnson, 1987). Too often teachers mistakenly assume that students already have the skills necessary to interact effectively in groups. These interpersonal behaviors should be viewed as skills to be taught. Furthermore, one must not assume that students will acquire them by mere exposure to others who possess them.
A COOPERATIVE LEARNING ENVIRONMENT

The teacher must structure the learning situation so that cooperative interaction does take place. Johnson and Johnson (1987) have detailed a procedure for structuring cooperative learning.

Specifying Instructional Objectives

Teachers must identify what the academic task is, in terms that students can understand. Students learn best when they know what they must accomplish—completing a worksheet, reading a story, or whatever. They also perform best when they know what collaborative/social skills the teacher will be observing during the class period or day. It is suggested that only two or three specific skills be stressed in each session, even though students may need work on many skills. Skills such as using soft voices, praising, or listening might be chosen for a class session and practiced for an entire week or more.

Making Decisions

The size of the group should be small enough to facilitate mutual discussion while taking into consideration the materials available, the arrangement of the groups within the room and the specific task assigned. Groups of two or three seem to work best given the typical class assignment and time framework.

The teacher must decide on the make-up of the group. Heterogeneous groups are more productive than homogeneous groups when trying to create an environment that stimulates questions, explanations, and discussions among group members. Heterogeneous groups encourage constructive relationships among students. “High achievers are more likely to develop the leadership, communication, decision making and conflict management skills needed for future career success” (Johnson et al., 1984). Heterogeneous groups provide a setting for academically handicapped students to practice the social skills in which they are deficient and allow nonhandicapped students to become sensitized to the limitations of handicapped or less able students. Assigning a high, middle, and low student to a group or randomly assigning students to groups will foster heterogeneity. Or groups might be arranged around an acting-out or withdrawn student.

The teacher must decide how to orchestrate the delivery of materials, depending on the maturity and experience of the students. When students are just beginning to develop cooperative skills, the teacher may want to distribute only one set of materials or give each student a different book or piece of information so that students have to work together to complete the task. Jigsawing materials or assignments (e.g., each student in the group reads only 3 of the 9 pages in a chapter or each student completes 5 of the 15 math problems) is one way to divide materials and work among the small group members.

The teacher might decide to assign roles, in which each group member has a responsibility (e.g., the note taker, the observer). Assigning roles or jobs is an effective method of cooperative instruction. It ensures that group members are positively interdependent and function as members of the group rather than as individuals within a group.

Explaining the Task, Goals, and Activities

Teachers must clearly explain the objectives, instructions, and expected outcomes. In addition, teachers should emphasize the group’s goal and tell students that they are responsible to see that all group members participate and learn the material by encouraging and helping one another. Students should be reminded that each member is individually accountable for learning and that the teacher will randomly choose students to explain concepts. Another method to check for individual accountability is to give tests or have group members check one another’s work.

The teacher must state specifically which behaviors are appropriate and will be worked on during the group sessions. Less experienced cooperative groups will have to work on behaviors such as “taking turns” and “using each other’s names” for several lessons. When groups show signs of working cooperatively, the expected behaviors should change. Then they might work on skills such as encouraging, accurate listening, constructively criticizing ideas rather than people, giving directions, and the like (Johnson et al., 1984). Teachers should define the skills for the students. Teachers also must help students understand why the skill is needed. This can be related to both academic and life situations. Then students must be given an opportunity to practice the skill. They should learn specific words to say, as well as actions that could be observed when the social skill is being used. This might be facilitated through modeling and role playing.

Finally, students should practice the skill through actual use in an academic classroom situation. They might, as a group, write an answer to a social science comprehension question. Each student would be required to contribute an answer and initial his or her idea, but the group would have to come to consensus on the one answer or combination of answers to turn in to the teacher. The behavior on which the teacher might check could be “contributing ideas and taking turns.”

Observing/Intervening

The teacher or group members themselves should record observations on group functioning. Accurate data must be kept on whether students are working on the desired behavior for that lesson so that the information can be shared with
the students or parents. Students and groups who are working on collaborative skills should be recognized during processing time. Observation data collected also can be used for discussion and evaluation of academic tasks. Methods of formal observation and the use of observation sheets can be found in Johnson and Johnson (1987).

Teachers should intervene in the groups only when students need suggestions on procedures to improve cooperative skills and positive behaviors, or to give positive feedback. More learning occurs when data are shared during the processing time and when the teacher intervention is accomplished by turning the problem back to the group to solve. A teacher might go to a group and say, "What is the problem here? What can you do to help Susie learn the information?"

Evaluating Academic and Collaborative Learning

Teachers should evaluate the final product (test, paper, project) employing a criterion-referenced system. Students should be asked questions such as, "Did you complete your paper?" "Are you satisfied with your product?" "What will help you complete your work tomorrow?" Based on the accumulated observation data, the teacher should allow time to discuss how well the group functioned. Questions such as, "Did you listen to each other?" "Did you each contribute one answer?" (depending on the expected behaviors) will assist the students in analyzing how their group functioned and determining what they need to focus on during the next cooperative lesson. It is important to allow time at the end of each lesson to process. This can be done quickly if time is short or can take 5 to 10 minutes depending on the level at which the students are functioning. Further, the teacher should provide specific feedback on the collaborative objectives that were set for that lesson and remind students to continue to work at maintaining effective cooperative behaviors as well as to complete the task for the day.

Summary

In summary, the five critical elements of cooperative learning incorporated into each lesson are:

1. Face-to-face small group interactions.
2. Positive interdependence, with each person intimately involved in the tasks and responsible for the group results.
3. Individual accountability to assure that all students learn the material.
4. Direct teaching of collaborative/social skills so that students will have an opportunity to practice the skills necessary for survival in class and in life.
5. Processing how well the group worked during the session, both academically and socially.

This is the time when most growth and learning occur, and cooperative learning ensures that the environment needed for effective learning is appropriately structured. By including these five elements, the teacher knows that the goal structure will be different from traditional small group learning and will be cooperative (Johnson et al., 1984).

Johnson et al. (1984) spell out procedures for teaching cooperative skills to students. They also strongly recommend using competitive and individualistic goal structures within the cooperative learning structure. Because society frequently places people in cooperative situations, a cooperative learning environment, generally speaking, would be the most beneficial predominant setting for the classroom, with competitive and individualistic goal structures incorporated into the system as needed.

STRUCTURED LEARNING

In recent years the psychological education movement has given attention to structured learning as a means of teaching social behaviors. Characterized by regular and systematic direct instruction, structured learning incorporates four methodological elements: modeling, role playing, performance feedback, and transfer of training (Goldstein et al., 1983). Structured learning, then, is another method that can be used to teach social behaviors that are expected of the student in the classroom setting. The teacher who uses structured learning first views the students' interpersonal and intrapersonal behaviors as skills (Goldstein et al., 1983). Those skills are viewed as areas in which the students are either proficient or deficient. Structured learning procedures are used to teach students the skills in which they are deficient.

Like cooperative learning, structured learning is best conducted in a group. Generally, skills are taught in groups of five to eight students and one or two teachers. Structured learning also has been adapted for use in the traditionally sized classroom. To date, however, the approach has been used most in regular and special education classes in upper-level elementary, junior high, and senior high schools. Structured learning follows a sequential order of presentation with a single skill being taught at a time.

Modeling

In teaching a skill, the teacher exposes the group to examples of the skill being used in its exemplary form. The teacher uses several different examples of the skill being used in different settings with different people. The teacher also breaks down the skill into behavioral steps. Those behavioral steps are demonstrated in the modeling displays, after which a group discussion ensues (Goldstein et al., 1983). The focus of the discussion is on the personal impact of the modeling on each member of the group. Goldstein
et al. recommend that students “relate the modeling of the skill to times in their own lives when use of the particular skill has been difficult” (p. 163). One example should be in an academic setting. This might be the skill of listening to the student’s peers in a group discussion or to the teacher as directions are given.

**Role Plays**

Role plays are developed from the examples generated by students in the discussion. Each student is given an opportunity to role play (or practice) the skill, which is designed as a rehearsal for a real-life circumstance that actually may occur. Goldstein et al. (1983) state that, “Each youngster in the main actor role gets an opportunity to choose as a co-actor someone who resembles the real-life protagonist or antagonist in as many ways as possible, and to enact the skill following the behavioral steps which constitute the skill” (p. 163). Students could role play the skill “sharing,” which is important for use within a family and in other social situations. It is also important in an academic situation, such as sharing materials during group work when resources are limited. The students would role play all three situations when the skill was being learned. The teachers provide much support in the forms of suggestions and coaching throughout the role play.

**Performance Feedback**

Immediately after the role play, the teacher(s) asks for performance feedback such as praise, constructive criticism, or approval from the main actor and the other group members. The goal is to provide the main actor with support, as well as suggestions on how to become more effective in using the given skill. Comments such as “I knew you were listening to me because you asked for clarification” or “You put the book where we could all see it” are examples of comments that might be given during this feedback time. The more specific the comments, the more beneficial the feedback will be for the person doing the role play.

**Transfer of Training**

The final phase of structured learning is a concerted effort to generalize the skill beyond the classroom setting. Arrangements should be incorporated to enhance the probability that the skill will transfer into the student’s real-life behavioral repertoire. A variety of procedures may be used to facilitate transfer of training, of which overlearning and real-life reinforcement are two examples.

*Overlearning* occurs when the student is given the opportunity to practice the skill in different situations and over a long period of time (e.g., sharing a book one day, a worksheet another day, a dictionary another, and so on over many weeks or an entire semester). *Real-life reinforcement* can be arranged so that other teachers could give students feedback if they see the skill being applied in their class. For example, when the skill of compensating for being left out is taught, a teacher might overhear a student saying to peers, “I haven’t had my turn to contribute to the answer,” and the teacher could praise the student for speaking up in an appropriate manner. No student, regardless of age or ability, can generalize a behavior learned in a classroom or simulated setting without opportunities for him or her to practice the skill frequently in a variety of realistic settings.

**THEORY TO PRACTICE**

In setting up a classroom session to incorporate the teaching of social skills in an academic setting, careful planning must occur. For example, the teacher briefly may inform his or her students that the task for the day is “to complete one math worksheet per group.” Then, the elements of positive interdependence should be described—one worksheet per group turned in, each student completing five problems on the sheet and initialing the ones he or she didn’t do (indicating that he or she is able to explain how to get the answers), assigning roles of writer of answers on the sheet and checker, to ensure that all understand how all answers were derived and that they can explain them.

Next, the students should learn how individual accountability will be assessed (students randomly chosen to give an answer and explain how it was derived, as well as an individual test given at the end of the week). Prior to beginning the task, the criteria for success also must be explained (completed sheet, group grade of over 90%, each group member to receive 2 bonus points). Next, the behaviors that the teacher will observe (listening, praising, using soft voices) should be specified.

At this point, the teacher may use structured learning to teach one or more of the necessary skills. The skills of using a soft voice and listening might be reviewed, assuming that these have been taught previously. The skill of praising will be defined and explained simply (Teacher question: What is praising? Student response: Saying something nice to another person. Teacher question: Give me some words you could say to another student. Student response: Tom, that answer is correct; Sally, that is an interesting way to write the division steps; Ann, you’re really using a soft voice today; Sam, it makes me feel good when you listen to me explain how I worked the problem). The teacher then should assist the students in understanding the need to praise each other (to recognize peers for good work and appropriate behavior, to make people feel a part of the group, and so on). Then a brief modeling and role playing session might occur, with the teacher demonstrating with another adult or student the appropriate lan-
guage to use as they work a couple of problems on the board. Finally, a few comments should be requested from the class as feedback on the modeling and role playing activities.

Next, students are divided into their work groups, given the worksheet, and directed to begin their work. The teacher circulates around the classroom observing and taking anecdotal information on the three expected behaviors for the session. The teacher intervenes as little as possible and turns questions back to the group when possible.

About 5-10 minutes prior to the end of the class, the teacher stops the group work, asks the students to discuss a couple of questions such as, “What were three things that helped your group work well today and one thing that will help your group work better next time?” Then the group members might rate themselves as to how well they listened, praised, and used soft voices. The teacher then should ask for group reports and also report observations about group functioning, especially on the three expected behaviors.

These social skills should be practiced again in future classes, as well as in other classroom settings. To assist in the generalization process, students might complete homework sheets or teachers might send notices to other teachers and parents to observe the specific skills in other situations. Students could be requested to turn in the sheets or just report to the class or their group where and when they used the skills.

This is only one example. The cooperative learning and structured learning model allows for much flexibility. A variety of techniques, skills, and strategies can be used in each step, to ensure that the students will maintain interest and motivation to contribute to the group. This is what makes learning and teaching fun for both students and teacher while at the same time increasing achievement.

LIMITATIONS

The vast majority of research indicates that social skills training is one way to increase the interactions between handicapped children and their nonhandicapped peers. There is some disagreement, however, among researchers. Gresham (1982) emphasizes assessment and training of re- quisite social skills prior to placing handicapped children in mainstreamed settings. He advocates placement of students in a segregated setting “until the required social skill level has been obtained.”

Strain and Shores (1983), however, look at the “reciprocal quality” of social behaviors and contend that assessing students in a segregated classroom puts the observed student at a disadvantage. The child’s social skill performance will be dependent on the behavior and interaction of the other handicapped children. They question whether handicapped children ever will be judged ready for mainstreaming if they are limited to the opportunities available in educationally segregated classes.

Those authors agree with Gresham in that social skill training must be continued when handicapped children are placed in mainstream settings. They do not agree, however, with the primary thrust of Gresham’s thinking, which proposes that pre-mainstreaming skill training will ensure successful interactions of handicapped children with nonhandicapped peers. Social integration is influenced by peers’ perception of the behaviors toward handicapped children. There is evidence that skills can be obtained and strengthened in “staged” interactions, but there is no evidence that skills generalize to more naturalistic settings (Strain & Shores, 1983). All teachers must structure lessons or the setting so that the desired behaviors have the chance to occur and be strengthened in that environment.

Cooperative learning and structured learning are limited by their ability to produce generalization and maintenance of social skills in real-life settings. Also, the social skills training literature is deficient in providing adequately developed theory regarding which social skills should be selected and the impact they will have on interpersonal relationships. The research is also silent in telling us which social skills in which settings result in social competence (Gresham, 1981).

ADVANTAGES

Research indicates positive results from teaching students social skills and using cooperative learning groups throughout the school day. Students prefer cooperative learning groups over a competitive or individually structured classroom (Johnson & Johnson, 1987). Cooperation promotes higher achievement and self-esteem than do competitive or individual efforts (Johnson, Murryama, Johnson, Nelson, & Skon, 1981) and has “a higher probability for the development of intrinsic feelings of success” (Knight, Peterson, & McGuire, 1982). According to Skon et al., (1981), cooperative peer interaction leads to higher cognitive reasoning when students converse and are involved in concept attainment tasks. “Cooperative interactions with others are essential for the development of trust, self-confidence, and personal identity, all of which are the foundation of mental health” (Knight, Peterson, & McGuire, 1982, p. 234).

Structured learning has enabled students to learn social skills such as empathy, negotiation, assertiveness, following instructions, self-control, and perspective taking (Goldstein et al., 1983). These skills are essential to develop positive peer relationships within cooperative learning groups. Teaching social skills to handicapped students in the regular education setting can lead to peer acceptance and possible generalization of the social skills to other settings.
CONCLUSIONS

The future requires us to open new windows to producing academic and social competence in children. Educators should be receptive to new approaches that will eliminate problems that interfere with teaching and learning. The positive results of using structured learning and cooperative learning allow educators to keep pace with the demands that society is placing on them.

Social skills can be taught in a cooperative environment. Cooperative goal structures provide a motivational context in which academic and social skills can be learned and practiced. Structured learning provides a methodology that allows students to learn and practice the social skills necessary to function in cooperative environments. The two models can be integrated if the teacher structures the learning environment in such a way as to teach the cooperative and social skills through a structured learning (direct instruction) format.

Cooperative learning and structured learning are two compatible models that focus on the development of a student’s social competence and academic performance. These models provide educators with strategies that teach young people to become critical thinkers and to interact cooperatively with others. Paramount to these models is teaching and strengthening social skills. Only then can educators help the adults of tomorrow apply the skills necessary for communicating, interacting, and working in all cooperative situations.

REFERENCES


