"He who praises everybody praises nobody."
-- Samuel Johnson

"He who praises nobody has taken the research on rewards and extrinsic motivation too seriously." *-- Spencer Kagan*

Do rewards really erode intrinsic motivation?

There has been a movement away from rewards, certificates, and even praise in classrooms, based in part on research which has shown that rewards can erode intrinsic motivation. One intelligent man has gone so far as to say, "Verbal reinforcement is worse than nothing, and material reinforcement is worse yet." Before we all play follow the flag waving leader and march right off the end of the pier without life jackets, let's think a bit.

There is a body of research which shows that in certain situations rewards for behavior do erode intrinsic motivation. For example, if children are given rewards for performing some behavior which they would gladly do without rewards, some may change their attributions from internal to external. That is, without the rewards they see themselves as performing the behavior because they enjoy it, but when the behavior is consistently followed by rewards they may see themselves as performing the behavior for the reward. Later, when rewards are taken away, they may conclude, "If I was doing it for a reward, and there is no reward now, then there is no reason to perform the behavior." So rewards in some cases can erode intrinsic motivation.

But it is only a very special kind of situation in which this is true. It is a situation in which students conclude the *only* reason I am doing something is for the reward. If a student is performing a behavior and enjoys it and happens also to receive praise or recognition, the recognition will not necessarily erode intrinsic motivation. The student knows the reward is not the *only* reason for the behavior. We must be careful not to provide a message to our students that the *only* reason they are studying or cooperating is for external praise or rewards. If a teacher smiles at, praises, or gives a certificate to a student, that recognition can be perceived as a messages from the teacher to the child: "I really appreciate the work you are doing." And the child may conclude "I get to do what I really enjoy doing, and the teacher supports me too."

If I show a child I am pleased he is eating an ice cream, it will not make him less motivated to eat ice cream in the future. The recognition is not perceived as the *only* reason to engage in the behavior. Thus, we should design learning tasks as intrinsically motivating as possible -- tasks the students would love to do with or without rewards. Adding rec-

ognition or rewards on top of good learning tasks will not necessarily erode intrinsic motivation. And for some students, the rewards will actually increase intrinsic motivation.

There is a body of research which shows that rewards can actually increase intrinsic motivation. In situations in which the rewards motivate students to engage in behaviors they otherwise would not, when later tested some show *increases* in intrinsic motivation -- they have found rewards in the behavior on their own. In this case the rewards have provided the incentive to get involved in the task, and once involved the students discover rewards intrinsic in the task.

If we ask how rewards actually work in classrooms there is plenty of support for using them. There is not a single study showing that in the context of a real classroom praise for academic accomplishments or prosocial behavior actually decreases those behaviors. In contrast, most of the the research in cooperative learning which has consistently shown academic and prosocial gains has included teacher and/or peer reinforcement in the form of praise, rewards, certificates or grades. If praise and rewards are so bad, why have they been consistently associated with academic and social gains in cooperative learning classrooms?

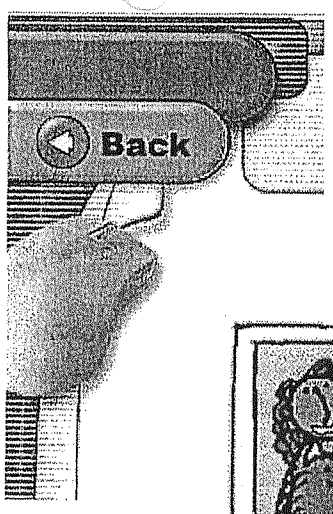
This is not a plea for massive use of rewards. In fact, I do not use any points or certificates or rewards when I do demonstration lessons. It is a plea only for not abandoning a powerful tool which many teachers find useful.

There has been a pendulum swing both in cooperative learning and in education as a whole. The pendulum has swung away from what is now called "drill and kill" toward constructionist views. Skinner, practice worksheets, high-consensus content, convergent thinking, and rewards, are out; Piaget, non-evaluated experimentation, low-consensus content, divergent thinking, and self-evaluation are in.

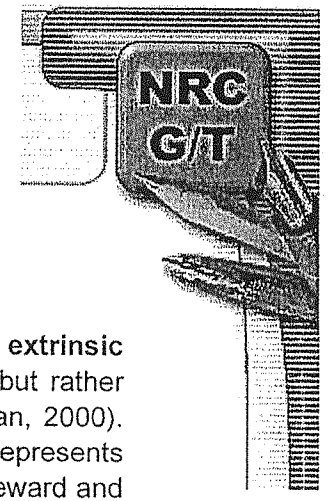
I like the movement. I designed Co-op Co-op for use in my own classes at the University of California, in 1972 in part because it allowed students to choose studies in their own zone of proximal development. Instead of completing teacher-directed assignments in order to receive a grade, students began researching in order to acquire personally meaningful knowledge. The motivation was to satisfy one own curiosity and to have something of worth to offer others, not just obtaining a grade.

I believe that we should, to the extent possible, design learning experiences which are intrinsically interesting, and which students would find a joy to do whether or not they received a reward or praise from the teacher. On the other hand, I know that improvement scoring and formal recognition of improvement in the form of points, class thermometers, and recognition ceremonies works very well to motivate some students, and we should explore all tools which enhance learning and development. There are many, many teachers who have reported to me that once they put in place improvement scoring and coupled it with a class thermometer, they have seen very dramatic improvement among certain students -- in many cases improvement beyond what the teacher thought possible!

If praise and rewards are so bad, why have they been consistently associated with academic and social gains in research investigating cooperative learning classrooms?



Tips for Rewarding Students for Good Performance (Intrinsic and Extrinsic Motivation)



Recent theories suggest that **intrinsic** and **extrinsic** motivation are not two opposing constructs, but rather two ends of a motivation continuum (Alderman, 2000). The intrinsic / extrinsic motivation continuum represents the extent to which actions are controlled by reward and the extent to which actions are self-determined (Alderman, 2000). A person can engage in activities to simultaneously fulfill both intrinsic and extrinsic goals. For example, when someone chooses a career that is also intrinsically rewarding, working can produce both intrinsic rewards (i.e. interest and enjoyment) and extrinsic rewards (i.e., salary and prestige). As educators, we must find a way to make school both intrinsically and extrinsically rewarding for our students.

If a student is not intrinsically motivated to do well, using extrinsic motivators such as rewards or punishments can sometimes prod the student into action. However, using rewards and punishments effectively is an art. Sometimes using extrinsic motivators can backfire. As a general rule, positively reinforcing good behavior or high achievement is far more effective than punishing bad behavior or low achievement. However, even rewards need to be used carefully, since even rewards can have an adverse impact on subsequent motivation. In *Punished by Rewards*, Alfie Kohn argues that rewarding students for activities that are intrinsically motivating can decrease their motivation to engage in those activities in the future. While we disagree with Kohn's conclusion that rewards are ineffective and controlling, we would suggest that rewards are more effective if you follow a few general guidelines.

Strategies for rewarding students: (From Brophy, 1998)

General Guidelines

1. Offer rewards as incentives for meeting performance standards on **low level tasks** or **skills that require a great deal of practice or drill and repetition** rather than as primary incentives to do things that you hope will be intrinsically motivating for the student (such as reading, interest based research projects, participating in volunteer projects, etc.)
2. Rewards can act as motivators only for those students who believe that they **have a chance to earn the rewards** if they put forth reasonable effort. For example, if the teacher offers a reward for the neatest paper, the sloppiest child in the class is unlikely to try to win the award.
3. **Rewards are only effective when students value the reward.** For example, if students don't care about grades, then using grades as a reward for good performance does not serve as an extrinsic motivator for the child.
4. Rewards are most effective when they are delivered in ways that provide students with **informative feedback** about their performance. Explain the importance of learning, performance, and improvement, and use the incentives as markers for mastering key concepts or improving skills, rather than as the entire point of doing the work.

Decreases in performance and intrinsic motivation may occur when...

1. Rewards are presented in ways that call a great deal of attention to them in front of the rest of the students. This can be very embarrassing for the student who receives the award.
2. Rewards are given for mere participation in an activity rather than contingent on achieving specific goals. Rewarding participation can result in subpar performance.
3. Rewards are artificially tied to the behaviors as control devices rather than being natural outcomes of the behaviors. Ideally, if you can design a system where a behavior is naturally reinfocing, you will have the best long-term outcomes. However, sometimes it may be necessary to offer "carrots" for particular achievements. This is effective in the short run. However, when you stop offering the carrot, you are likely to stop seeing the desired behavior. Therefore, rewards can be a great "quick fix", but they are rarely a long-term solution.

Final Note: Remember, what may seem like it would be motivational to one person, can actually be antimotivational for someone else. Consider the following scenario taken from the motivation and motivational tools website, http://www.motivation-and-motivational-tools.com/

"In Mrs. George's seventh grade classroom, Cole always sat at the back of the room, trying to be as invisible as possible. He'd always been quite shy and withdrawn, but also lonely with feelings of isolation. As he began his adolescent growth spurt, Cole's height and strength progressed to the point where he was able to do well in soccer. And his circle of friends

grew. He finally started to feel like "one of the guys."

Then one fateful day, Mrs. George, who had been waiting for opportunities to help Cole feel successful and more confident in his own abilities, asked him a direct question in class. When Cole responded correctly, she praised him quite emphatically. Cole was mortified. He blushed and ducked his head and felt more embarrassed than he had in months. He thought that he'd been made to look like the teacher's pet and would be alienated by his newfound friends. He vowed never to answer a question correctly out loud after that.

So in effect, what Mrs. George had intended as positive reinforcement turned out to be serious disincentive for the behavior she'd been hoping to cultivate."

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