Imagine walking into a classroom and seeing the teacher check for student understanding. The teacher asks the students, “What’s the next step in the procedure?” or “Where in this sentence does the comma go?” then follows with “Put your heads together and consult with your team.” The students literally put their heads together, lean in and talk over possible responses. There is a buzz of animated student chatter to answer the question. After a short time, the teacher’s silent signal leads to total silence. The teacher calls out a number between one and four, and one student in each team quickly raises a hand.

**What?**

The activity described is one version of the cooperative learning strategy that its guru, Spencer Kagan, calls “Numbered Heads Together.” This activity perfectly meets the cooperative learning principles of PIES:

- **Positive Interdependence**
- **Individual Accountability**
- **Equal Participation**
- **Simultaneous Interaction**

Each student is necessary for completing the task and is therefore accountable for learning and sharing material. Each student has an equal chance of being called upon to participate and all students are talking or intentionally listening simultaneously.

**Why?**

As Kagan notes: “In Numbered Heads Together, students cannot depend on the high achiever to do the work for them; they all have to know the answer or how to get it if they are to be assured recognition. Numbered Heads Together is a marvelous antidote to Whole-Class Question-Answer which often boils down to a conversation between the teacher and the high achievers in the classroom with the rest of the class between semi-interested and comatose.” (Kagan Cooperative Learning, 2009).

( cont’d on p. 2)
Application and Variations of Numbered Heads Together

(cont’d) Numbered Heads Together is useful for reviewing and integrating subject matter. Students with special needs also benefit when this strategy is used. After direct instruction of the material, the group supports each member and provides opportunities for practice, rehearsal, and discussion of content.

How?

1. Divide the students into groups of four, and give each member of the group a number from one to four.

2. Pose a question or a problem to the class, and give a time limit.

3. Have student groups gather to think about the question to make sure all group members understand and can give an answer.

4. Call out a number from one to four; students in each group with that number raise their hands to give the answer.

If you decide to make the activity a competition, the first team that gets the correct answer wins a point. This is called “Sequential Numbered Heads Together.”

Numbered Heads is a flexible strategy that can be used at a variety of cognitive levels. The teacher may start with factual information questions, and as students become more familiar with the strategy, ask questions that require analysis or synthesis of information. (For other examples of questions, see Learning Together, issue 3). The students’ task is to come to consensus on whether they agree or disagree, giving an explanation of their reasoning.

After the initial student response, ask the other groups to agree or disagree with the answer by showing a thumbs up or thumbs down, and then explain their reasoning. Or, if the answer needs clarification, ask another student to expand on the answer.*

For example, in an ESL, ABE or ASE class working on writing, students can evaluate the quality of a sample piece of writing using a rubric. Students review the writing as a group and assign a score as a group. Then the teacher asks students to respond with their scores and rationale.

In the CTE lab/shop/room, students can put their heads together to determine the best response to a client or customer complaint.

*https://www.Teacher vision.com/group-work/cooperative-learning/48538.html?detoured=1

In the next issue, we will look at implementing “Simultaneous” Numbered Heads Together to maximize student participation and to improve teacher assessment of student comprehension.

DACE Objectives for Systemizing Quality Instruction

Long-Range Lesson Planning | Agenda and Objectives | Cooperative Learning Strategies