

Effective Strategies For Engaging Adult Learners

Belinda Dunnick Karge, Ph.D., California State University, Fullerton, CA, USA
Kathleen M. Phillips, Ph.D., California State University, San Bernardino, CA, USA
Tammy Jessee, Dodson Middle School, Ranchos Palos Verdes, CA, USA
Marjorie McCabe, Ph.D., California State University, San Bernardino, CA, USA

ABSTRACT

Innovative methods in teaching should be used in every college classroom to enhance student engagement, support any teaching environment and encourage inquiry among learners. Adults learn best by participation in relevant experiences and utilization of practical information. When adult students are active in their learning they are able to develop critical thinking skills, receive social support systems for the learning, and gain knowledge in an efficient way. The authors highlight several exemplary strategies for adult learners including, Think-Pair-Share, Tell -Help-Check, Give One, Get One, and the Immediate Feedback Assessment Test.

Keywords: Strategies; Engagement; Adult Learners

The average college student is used to multitasking and processing a variety of information at once. Regardless of how one views the university classroom, the instructor is on stage from the moment he/she steps in front of the class (Schwartz & Karge, 1996). It is critical to use proven and innovative methods in teaching at all levels of education. Furthermore, understanding the adult learner will enhance instruction and ultimately motivate the student. This article will highlight some of the key concepts related to adult learning and focus on several easy to use research based effective teaching methods for college instruction.

Knowles, Holton and Swanson (2005) have extensively researched the principles of adult learning. They coined the term, “andragogy” to signify the science of teaching adults to learn (Merriam, Caffarella, & Baumgartner, 2007). Knowles et. al. purport that adult learners have a need to know, a readiness to learn and an orientation to learning; this combined with motivation creates a healthy environment to acquire knowledge. Adults learn best by participation in relevant experiences and practical information. Adult learners need to be respected and valued. Recent studies in neuroscience have validated these principles (Jensen, 2005).

The traditional faculty/student relationship must be altered to facilitate effective adult learning (Knowles, Holton, & Swanson, 1998). The faculty members’ instructional practices influence the education goals that students adopt. The choices that faculty make about issues – such as introducing and teaching course content, grading student work, grouping of students, and how students are recognized for their successes – all influence the types of goals that students adopt. In turn, these goals affect a number of important motivational outcomes.

Intrinsic motivation and extrinsic motivation play key roles. Students who are *intrinsically motivated* will engage in an academic task to learn for the sake of learning. Students who are *extrinsically motivated* engage in academic tasks in order to earn some type of reward, to avoid an externally imposed punishment, or to make a decision based on something they desire. This can be further explored by looking at the works of Julian Rotter (1966). Eric Schaps, founder of the Developmental Studies Center, documents “a growing body of research confirms the benefits of building a sense of community...students with a strong sense of community are more likely to be academically motivated” (2003, p. 31).

When students are active in their learning they are able to develop critical thinking skills, receive social support systems for the learning, and gain knowledge in an efficient way. Faculty must enhance traditional lecturing

with carefully constructed effective teaching strategies designed to enhance skills and gain content knowledge (Feger, Woleck & Hickman, 2004).

One strategy for enhancing learning in the college classroom is *Think-Pair-Share*. This strategy was developed by Lyman (1987, 1981). For example, immediately following a lecture or assigned textbook reading, the instructor asks a question related to, describing, or interpreting something. After giving the students a few minutes to *think* of an answer, have them turn to a partner and share, i.e. *pair* and *share* their response. Then ask the entire class for volunteers who might want to share an answer.

There are many variations of this active learning technique. A favorite of many educators is *Think-Write-Pair-Share*. In this scenario, students listen while the teacher poses a question, problem, concept or a task. As indicated above, the students are given quiet time to respond to the question in writing. Students are then cued to pair with a neighbor and discuss their responses, noting similarities and differences. It is important to give students enough time to share their answers and how they arrived at the answers with their classmates. After rehearsing responses with a partner, students are invited to share publicly using language for reported speech (e.g. *My partner pointed out...; My partner mentioned that...; We agreed that; We decided that...*). There are many advantages to Lyman's technique. The personal interaction motivates students and engages the entire class. Quiet or shy students are more likely to answer the questions or complete the task with a partner instead of having to stand in front of the entire class. The instructor can easily assess student understanding by listening in on several groups during the activity, and by collecting responses at the end. Fisher, Brozo, Frey and Ivey (2007) offer another variation, the Read-Write-Pair-Share. They indicate that the strategy provides students with a scaffold experience. The student reads a passage independently, and then composes his/her reactions in writing. These ideas are shared with a partner. The scaffold is enhanced by the discussion and expansion of the thoughts with another classmate and they indicate that some may feel confident once they have rehearsed it by sharing with a peer and may volunteer to share with the entire class. They note that use of this strategy assures the instructor that everyone is engaged and using academic vocabulary in both written and verbal form.

Tell-Help-Check (Archer & Gleason, 1994) is an excellent strategy that provides adult students opportunities to review and confirm their understanding of critical information. Through interaction with partners, students are able to participate, either orally or in writing, in an activity that will assist in filling in knowledge gaps of information. First, the instructor numbers the students as 1's and 2's. The instructor poses a question to which the 1's respond. This may be done either in writing or orally. The amount of time allotted to answer the question depends on the depth of the question. Generally one or two minutes are sufficient. Once the question has been answered, 2's provide help with the answer by adding information or editing existing information. Once both team members have given input on the answer, they check the text to determine accuracy. The interactive nature of this activity helps adult students maintain interest in the topics covered. It also offers an avenue for students to tap into related background knowledge. This strategy provides an excellent opportunity for the instructor to assess student knowledge of the given topic. While the teams are working on the questions, the instructor can circulate the room to determine the level of understanding of individuals and the group as a whole. This time also provides an opportunity for the instructor to provide feedback to individual students.

Problem-Based Learning (PBL) (Barrows & Tamblyn, 1980) presents an avenue for students to actively engage in learning communities by solving complex, challenging problems/scenarios. By following the prescribed steps, students collectively and creatively reach problem resolution. The PBL process utilizes the students' prior knowledge and experience as well as curriculum and research abilities to address problems/scenarios.

Problem Based Learning requires the instructor to facilitate rather than direct and the students to take a lead in developing solutions to real world problems. It is a curricular approach to learning where students are encouraged to take on the responsibility for their learning; even directing that learning process by utilizing their experience, their research, and their collaboration. Students are provided with an "ill-structured" real life situation or problem. They are given guidelines as to how to solve the problem while working collaboratively with peers.

The specific steps to *PBL* begin with the instructor introducing a problem or scenario to the class. It is important that the instructor create the problem carefully so that students have a concept of the problem solution but

cannot simply solve the problem using only prior knowledge. The situation should be pertinent and should challenge traditional knowledge. Using experiential knowledge along with provided factual information, students write what they know about the problem. Once the students have all of the factual information compiled, they create a statement of the problem. This can be refined as more details are revealed. The students then collectively decide what further information they need in order to fully understand the problem and to begin to devise a solution. At this point, the students should become acutely aware of the importance of the curricular information and research potential for resolving the problem. Students engage in the necessary inquiry required to supplement the information they already have and record any possible recommendations, solutions, actions, or hypotheses. Finally they formulate a solution. Once the group has a consensus on a suitable solution, the students present their findings and recommendations.

PBL engages students in active learning. They become involved in the critical analysis of a problem and collaboratively research possible solutions while also providing input from relevant past experience and knowledge. As the students gather the necessary factual knowledge that is required, research skills are developed and students become self-directed learners. These skills can then be applied to other contexts and students become motivated by seeing the relevance and applicability of what they have learned (Savory, 2006).

Think-Pair-Share, *Tell-Help-Check*, and *Problem Based Learning* are all engagement strategies designed to ultimately expand learning. The term engagement signifies that the student is sufficiently active. Engle & Conant (2002) remind us that evidence of productive engagement requires that the activities lead somewhere and that the instructor document student learning. One way to do this is to give a test on the information most recently taught. A good test should be more than just an assessment of knowledge. It should offer a meaningful learning experience. The *Immediate Feedback Assessment Test (IFAT)* (Epstein, Lazarus, Calvano, Matthews, Hendel, Epstein, & Brosvic, 2002) provides just such an experience by allowing students to immediately view the accuracy of their responses and participate in a collective dialogue regarding the content. The *IFAT* protocol is simple to use for both the instructor and the students. First, the instructor creates multiple choice questions relating to the content knowledge the students should have acquired. Each student independently takes the multiple choice test in the traditional manner. Once the individual has completed the test, he or she is placed into a group. The group is given one *IFAT* answer sheet.

The *IFAT* form is similar to a Scantron form that is used with many multiple choice tests. For each question, the students compare their answers and collectively agree on the correct choice. One student scratches off the opaque coating corresponding to the chosen answer; if the choice is correct, a star appears in the box and the group goes on to the next item. If the choice is incorrect, a blank space appears. The blank space signals the group to discuss the rationale for a better answer. In this way, students engage in meaningful discussions and develop a deeper understanding of the content. The group's final choice is always the correct answer ensuring that each student leaves the testing session with knowledge of the correct information.

Pedagogically, the *IFAT* has several advantages over traditional multiple-choice test procedures. First, traditional multiple tests are generally graded after the student leaves, thus delaying feedback for the test items. The *IFAT* is graded by the students immediately after each answer is given. Since the feedback is corrective, the student leaves the testing situation knowing the correct answer rather wondering if s/he was right or wrong. *IFAT* provides a simple and fair way for the instructor to give partial credit. Because of this, students can still earn points even if their first choice is not accurate. Finally, students leave the testing situation already aware of their overall test score.

Epstein (2002) demonstrates that the experience of using the *IFAT* system increases the students' level of content knowledge. DeBattista, Mitterer, and Gross (2004) found that university students strongly prefer the *IFAT* to the more commonly used Scantron form, with 83 per cent saying that they would like to be able to use the *IFAT* in all of their courses. The likeability of *IFAT* was not related to student characteristics or test performance variables. Students learn more with the system and actually prefer it to more traditional multiple choice tests.

Instructing adult learners is invigorating and challenging. The use of these strategies to enhance engagement will support any teaching environment and encourage inquiry among learners.

AUTHOR INFORMATION

Belinda Dunnick Karge, Ph.D. is a professor at California State University, Fullerton.
E-mail: bkarge@fullerton.edu

Kathleen Phillips, Ph.D. is a lecturer at California State University, San Bernardino.
E-mail: kathiep@csusb.edu

Tammy Jessee is a middle school teacher at Dodson Middle School in Ranchos Palos Verdes, Ca.
E-mail: tammy_jessee@yahoo.com

Marjorie McCabe, Ph.D. is a professor at California State University, San Bernardino.
E-mail: mmcabe@csusb.edu

REFERENCES

1. Archer, A., & Gleason, M. (1994b). *Skills for school success. Book 6*. North Billerica, MA: Curriculum Associates.
2. Barrows, H. S., & Tamblyn, R. M. (1980). *Problem-based learning: An approach to medical education*. New York: Springer.
3. Dibattista, D., Mitterer, J., & Gosse, J. (2004). Acceptance by undergraduates of the immediate feedback assessment technique for multiple-choice testing. Brock University Canada, *Teaching in Higher Education* 9, (1) 17-28.
4. Engle, R. A. & Conant, F. R. (2002). Guiding principles for fostering productive disciplinary engagement: Explaining an emergent argument in a community of learners classroom. *Cognition and Instruction*, 20, 399-483.
5. Epstein M. L., Lazarus A. D., Calvano T. B., Matthews K.A., Hendel R. A., Epstein B. B., & Brosvic G. M. (2002). Immediate feedback assessment technique promotes learning and corrects.
6. Feger, S., Woleck, K. & Hickman, P. (2004). *Journal of Staff Development*, 25(2), 87-108.
7. Fisher, D., Brozo, W. G., Frey, N., & Ivery, G. (2007). *Content area strategies for adolescent literacy*. Columbus, Ohio: Pearson.
8. Jensen, E. (2006). *Enriching the brain: How to maximize every learner's potential*. San Francisco, CA: Jossey-Bass.
9. Knowles, Holton & Swanson (2005). *The Adult Learner* (6th edition). New York. Elsevier.
10. Knowles, M. S., Holton, E. G., & Swanson, R. A. (1998). *The adult learner: The definitive classic in adult education and human resources development*. Houston, TX: Gulf Publishing.
11. Lyman, F. (1981). "The responsive classroom discussion." In Anderson, A. S. (Ed.), *Mainstreaming Digest*, College Park, MD: University of Maryland College of Education.
12. Lyman, F., 1987, Think-Pair-Share: An expanding teaching technique: *MAA-CIE Cooperative News*, v. 1, p. 1-2.
13. Merriam, S. B., Caffarella, R. S., & Baumgartner, L. M. (2007). *Learning in adulthood: A comprehensive guide* (3rd ed.). San Francisco: Jossey-Bass.
14. Millis, B. J., and Cottell, P. G., Jr. (1998). *Cooperative learning for higher education faculty*, American Council on Education, Series on Higher Education. The Oryx Press, Phoenix, AZ.
15. Rotter, J. B. (1966). Generalized expectancies for internal versus external control of reinforcement. *Psychological Monographs*, 80. (Whole No. 609).
16. Savery, J. R., (2006). Overview of problem based learning: Definitions and Distinctions, *The Interdisciplinary Journal of Problem Based Learning*, 1(1) 1-12.
17. Schaps, E. (2003). Creating a school community. *Educational Leadership*, 60(6), 31-33.
18. Schwartz, S. E., & Karge, B. D., (1996) *Human Diversity: A Guide for Understanding*. New York: McGraw-Hill.