

A Model Teacher Education Program for Economics

By Michael K. Salemi*

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Economics Departments face increasing pressure to improve the quality of undergraduate instruction (Becker, 2000). A Teacher Training Program (TTP) is one strategy Departments can use to improve the quality of teaching¹. A TTP typically targets graduate student teaching assistants (TA's) but can also provide valuable education to new junior faculty.

The task set for this paper is to describe the ideal TTP. What is ideal is a matter of opinion. Mine are based on long experience with the TTP at UNC-Chapel Hill, on familiarity with TTP's at Nebraska-Lincoln, Indiana, and Purdue, and on my experience as director of teaching workshops sponsored by the AEA Committee on Economic Education (Salemi, Saunders, and Walstad, 1996). I begin with principles that should guide creation of a TTP, describe a TTP's essential elements, and conclude with a consideration of resource issues.

I. TTP Principles

Four principles guide creation of a TTP. First, program staff should be economists who have taught the concepts that TTP participants will teach. Education specialists can offer advice of a general nature but cannot provide specific examples relevant to the economics classroom. In a department TTP, participants learn how to teach economics. In a college-wide program, participants may have trouble transferring the general advice they receive to their own

participants can use in recitations. The program should take a “just in time” approach to topics so that, for example, participants will be learning about multiple choice exams as they help prepare their first Principles exam. In a department where junior TA’s teach Principles recitations and senior TA’s teach their own courses, the TTP should be broken into two parts—each designed to meet the specific needs of its participants.

Third, program staff should practice what they preach. Modeling recommended teaching techniques is a powerful instructional strategy. Staff should use active learning to teach about active learning, call participants by name, and use follow up questions. They should motivate participants and model a variety of teaching styles.

Fourth, the program should be evaluated. Participants should complete an anonymous evaluation and results should be quickly provided to program staff. Alumni of the program should be surveyed to determine whether the program has had lasting, beneficial effects.

II. Content of a Model TTP

While there are good reasons for departments to customize their TTP’s, I recommend that all programs include the following elements.

Teaching Policies and Regulations. An early session should focus on the policies and regulations of the department and educational institution including TA responsibilities, grades and grade changes, honor code responsibilities, final examinations, class cancellation, sexual and racial harassment, and amorous relationships between students and instructors. The program can

arise.

Teaching Warm Up. Because teaching for the first time can be a frightening experience, especially for those who come from different cultures and have other native languages, it is helpful to provide participants with an opportunity to practice for their first class. To prepare for a “warm up” session, participants prepare material for 10-15 minutes of their first class and focus on one or two basic skills such as speaking clearly or using an “advance organizer” (Saunders, p. 174). After participants take turns delivering their presentations to a group of five or six, a program staff person provides feedback.

Because the main purpose of the session is to help participants overcome the jitters, program staff must approach feedback carefully. To strike a balance between encouragement and constructive criticism, feedback can be based on a “two-and-one” rule where group members each state two things they liked about the presentation and one thing they wish the presenter had done differently.

If the warm up reveals a potential disaster, program staff should talk privately to the participant, suggest appropriate remedies, and schedule a second practice presentation. The problem may be stage fright which, with a little encouragement, the participant can overcome. If the problem is more serious, it is better to know in advance so that appropriate help and monitoring can be arranged.

Learning Theory. Participants will benefit by learning several important ideas from

organizing their presentations and revealing that organization to their students. They should know that a well-motivated learner learns better and learn a variety of motivational strategies. Participants should know that background and prior experience affect how students perceive information. Graduate students are immersed in technical analysis of models and in learning the complex language of professional economics. Principles students are unfamiliar with models and economic jargon. Participants should learn the importance of communicating economic ideas in language their students understand.

Active Learning. The program should help participants use active learning. Salemi (2002), Becker and Watts (1998) and Walstad and Saunders (1998) provide valuable suggestions on active learning strategies for teaching economics. Different sessions should be conducted for Principles TA's and for TA's who teach their own courses.

To become literate in basic economics, Principles students must practice using economic ideas (Hansen, Salemi, and Siegfried, 2002). Principles recitations can provide practice opportunities provided that TA's understand how to keep students active. Instruction in active learning strategies is particularly important for novice teachers who have a tendency to lecture because it is a high-control, low-risk teaching strategy.

For recitation TA's, active learning can be organized around assignments that Professors give their Principles students. Ideally, Professors will cooperate with TTP staff in creating these assignments. Assignments should state what Principles students should learn in recitation and

practice using economics. TA's should learn why students benefit from working actively with economic concepts (Salemi, 2002) which will help them make better choices "on the ground." TA's should know that learning is intentional and that acknowledging the personal identities of students leads them to work harder and take more responsibility (Saunders, p. 92).

TA's should learn how to ask follow-up questions (Hansen and Salemi, p.219). Students, especially in large-enrollment, required courses, want answers from authority figures and will attempt to get the TA's to provide "right" answers for assignments. Participants should learn how to use follow-up questions to "bounce" the responsibility for answering back to the students.

TA's should learn how to de-brief an active learning exercise. In active learning, students must recognize incorrect and partially correct answers and revise them. Active learning can be confusing for students who feel bombarded by a lot of information and have difficulty distinguishing the wheat from the chaff. A debriefing provides students an opportunity to reflect on what they have learned and why it is important (Salemi, 2002).

Active learning instruction for TA's who teach their own courses can target additional skills. Senior TA's should learn how to identify course concepts that are sufficiently important to warrant the class time that active learning requires. They should learn how to use cases (Buckles, 1998), literature and drama (Watts, 1998), and readings (Hansen and Salemi, 1998) as active learning exercises. They should understand the benefits (and costs) of cooperative

tailored to the teaching assignments of participants. The TTP should explain why assessment is a valuable part of the learning process—and not simply a process by which grades are assigned (Walstad, 2001). An understanding of the role of assessment will help TA's develop their own assessment strategies as they become more experienced. At the outset of their teaching careers, however, TA's should focus on writing and grading examinations.

If Principles Instructors use multiple choice examinations, recitation TA's should know how to write multiple choice test items. Because test banks are typically geared toward testing lower levels of cognition, helping TA's write better multiple choice items can immediately improve Principles course examinations. Participants should learn what sort of learning outcomes can be tested by multiple choice tests. They should learn how to write test items that are valid and discriminating and to assemble them into examinations that are balanced from the point of view of content and difficulty (Walstad, 1998). Senior TA's should also learn how to use statistical diagnostics to identify and revise poorly performing items.

When Principles courses use constructed-response questions graded by TA's, the TTP should teach TA's the importance of providing students with feedback on their essay answers, how to prepare a list of criteria for assigning points, and strategies that help maintain consistency even when there are large numbers of tests to grade (Welsh and Saunders, 1998).

Senior TA's should receive instruction on how to create an assessment plan for their courses, how to write constructed response examinations, and how to use non-exam assessment

the point of view of student learning and strategies for making lectures more valuable learning experiences. Of particular importance are strategies that helps students understand the structure of the lecture and strategies that break the lecture into chunks separated by opportunities to reflect on the meaning of the material (Saunders, 1998).

The TTP can also introduce senior TA's to presentation technology available on their campus. Participants should learn how to obtain and operate an overhead projector, how to operate the RGB projectors and other media available in their classrooms, how to use classroom computers, and how to learn more about presentation and other educational software. Unless TA's are required to use educational software, it is sufficient to orient them to campus-based resources for learning it.

Course Planning. The TTP should instruct senior TA's in the basics of course planning. Participants should learn how to build a course around student learning objectives (Saunders, 1998). They should learn what information a good course syllabus contains, write their own syllabi, get feedback, and revise them. Participants should learn that different students have different learning styles and that teachers can reach a wider variety of learners by using a variety of teaching strategies. Participants should learn how to provide frequent feedback to their students on how well they are learning (Walstad, 2001).

Feedback on Teaching. The program ought to provide participants with feedback on their teaching that is based on visits to their classrooms. Several principles should guide class

videotapes should be incorporated into feedback given participants (Salemi and Cowell, 1998). Videotape provides staff with an opportunity to show participants their own behavior as they comment on it. Third, a senior graduate student can visit classes and conduct critiques for other graduate students but faculty staff should visit and critique faculty participants. Fourth, staff should conduct visits and critiques following a tightly designed plan. Critiquers should fill out an assessment instrument while they watch the class and base the critique on that assessment. The critique should strike a balance between encouraging participants by acknowledging good teaching practices and providing participants with those few suggestions that will best help them improve their teaching (Salemi and Cowell, 1998).

III. Resources and Related Questions

Once a department decides to conduct a TTP, it faces several questions. One is “Who should participate?” The TTP should be required of all TA’s as a condition of their employment. While not all TA’s may find it in their private interest to participate in the TTP, most students taught by TA’s will benefit from what TA’s learn. A related question is whether to require new junior faculty to participate in the TTP. At UNC, we invite all new faculty to participate and leave to the department chair the question of whether specific individuals must participate.

How can resources be provided for a TTP? One way is to make the TTP a graduate course that carries teaching credit for its instructor. With this option, departments must decide whether the course is required or elective and whether it fulfills any degree requirements—often

course credit option is controversial.

Support from the college or university is helpful but not essential to establishment of a TTP. University policies mandating or supporting TA teacher education can help department faculty agree on the importance of a TTP and can encourage individual faculty to support and participate in the program. Of course, it is useful when the university provides a department with resources for its TTP.

Who should conduct the TTP? For many departments, a list of candidates will include faculty who have participated in teaching workshops and those who have won teaching awards. Departments should rotate the TTP assignment among two or three faculty. Rotation will help the program survive faculty departures, will expose participants to a variety of teaching styles, and will make possible a team approach to program decisions.

The Department TTP is a cost effective strategy for helping TA's and other novice teachers learn basic teaching skills. When the TTP is coordinated to their teaching assignments, participants use program ideas to do better work that they must do anyway. In my experience, participants value their TTP and believe that it helps them be better teachers.

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Endnotes

*. Department of Economics, University of North Carolina at Chapel Hill. The author thanks William Walstad, Patrick Conway, and Helen Tauchen for helpful comments on an earlier draft and William Becker, William Walstad, and Michael Watts for providing up-to-date syllabi for the TTP's at their universities.

1. While some prefer “teacher education,” use of the term “teacher training” is a tradition that dates back to the TTP offered at Indiana University in 1973 (Salemi, Saunders, and Walstad, 1996).