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Resource: The Torch or the Firehose
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Small Groups: Tutorials and Office Hours

In some courses, in addition to having lectures and recitations, the students in a recitation section are further subdivided into several tutorial groups of 4-5 each, meeting once a week with a tutor who grades their problem sets and gives further assistance.

Conducting such a tutorial is an excellent way to start out with a course—you'll be close to the students and will perceive first hand the sort of difficulties they have. It's a good way to start out in teaching, too—problems of getting acquainted and interaction are much less troublesome. But don't think that a small group makes them automatically disappear. Some tutors seem to end up lecturing to three students as if they were teaching 300.

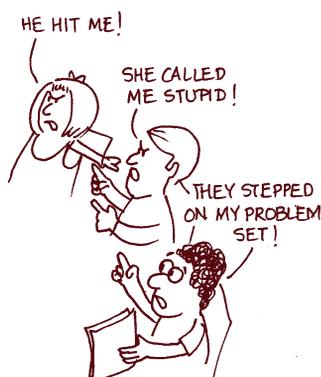
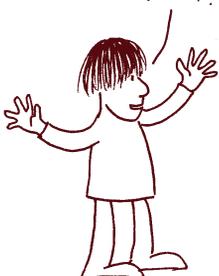
Running the tutorial

Assuming you've gone (as you should) to the lectures and recitations, you'll probably feel it your duty to clear up difficulties students had with poor explanations there. Do so, but don't spend all your time on this. Reinforce your explanations by working problems with them. There are different ways to do this.

One way is for everyone to contribute ideas, while you act as secretary at the board. This way they interact and get to know each other, and it's all the more social.

They can work in pairs, or small groups, solving the problem as a team. In that case, it should be you who picks the one to present the solution at the board; that way they will realize that making sure everyone on the team understands the solution is an important part of their effort. Change the teams so they get to know one another.

YOU SHOULD THINK
OF THIS TUTORIAL GROUP
AS A LITTLE FAMILY!



You can have students work individually, at their seats or the board, while you offer individual help. Maybe at the end one of them explains to the others. Working at their seats has the advantage that they have something to carry away with them; working at the board means they can see each other's work. Do both.

In general, try to keep the hour varied—some of this, some of that, but emphasizing whatever seems to work best with the particular group. Encourage them to keep track of difficult material and bring in their questions. What bothers one student is likely to be a problem for others also.

Working with students of widely varying abilities in a small tutorial is difficult. Your primary responsibility has to be to the ones having troubles. The others can help them, or they can work on more difficult things while you help the students who are struggling.

The tutor and the recitation teacher

The divided responsibility can cause problems. If you're running a small tutorial, you will probably feel closer to the students than to the lecturer or recitation teacher. Be tactful, however, about blaming the lecturer or recitation teacher for the students' troubles: "This point seemed to confuse some of you..." not "R_____ sure did a lousy job of explaining this..."

The recitation teacher for a section that also has tutorials may feel somewhat distant from the students, since someone else is grading their problem sets and clearing up their confusion. Sometimes the tutor is felt to be sitting as a silent critic in the recitation. That's bad. Students should see the recitation teacher and tutor working together in the classroom. The tutor should speak up in recitation if there's a suggestion to be made, and the recitation teacher should encourage this.



It was fun watching the recitation teacher and the T.A. tutor argue with each other.

The teacher and tutor should meet regularly—weekly or at least bi-weekly—to discuss what sort of errors students are making on the problem sets, and what sort of troubles they are having with the course in general. Conveying the complaints of the students is an important responsibility, since the feedback provided can have a significant influence on the course.

Individual tutorials and office hours

Some of the above applies also to one-on-one tutorial sessions with students, either by appointment, at a clinic where you sit in a room and help whoever comes in, or as part of your regular office hours. For this one-on-one tutoring the main points are:

- knowing your stuff;
- being a good listener: try to find out what the difficulty is—ask, or have the student try to do the work in front of you and watch what he or she does, or look at graded quizzes and problem sets;
- being flexible about trying one explanation after another until you find one that works;
- having patience, patience, patience: no matter how frustrated you may get, try not to show it.

Students are often reluctant to come to an office hour, unsure of what to expect. Invite them in class; make appointments with the ones who need help most. You will profit greatly from seeing first hand what difficulties students have, and what helps to overcome them.

It is quite possible to handle several students at once in such individual sessions: one student can be thinking about what you've just said and working, while you are helping a second on a new problem. Introduce them to each other. If you've just explained something to one student and another comes in with the same question, you can ask the first student to explain to the second, while you look on or help a third. It's good for everyone, and many students actually prefer to get help from other students rather than from the staff.

