Teaching statement

I come from a family of teachers – my father, aunt and uncle all taught middle and high school, giving me an early appreciation for the responsibility that comes with being on the teaching side of the classroom. I have taught ten semesters as a Graduate Student Instructor, covering introductory to advanced undergraduate classes (teaching introductory macroeconomics twice, one senior-level class on the European economy, and advanced undergraduate econometrics, seven times). The most important thing I learned about myself from teaching those classes is that I enjoyed it; teaching greatly enriched my time in graduate school, and I hope it will continue to be a part of my life.

In the following, I explain my views on effective teaching – what I have found to work well in the classroom, and wat students have commented on as being helpful to them. I am, of course, only at the beginning of my teaching career, and I would hope to work with colleagues who can mentor me not only as a researcher, but also as a teacher; I learned a lot from passionate teachers I had the opportunity to work with.

At the end of this statement, I also provide a brief overview of my teaching evaluations. I present average scores across all evaluations I have received, as well as a selection of student comments included in those evaluations.

Present every problem from multiple angles

I always try to present difficult concepts in more than one way. For example, in undergraduate econometrics, some students have a much easier time understanding omitted variable bias when it is explained in words while others prefer to see the math. Similarly, I present results both visually and in words: Students are learning to decode a host of new forms of summarizing information, such as graphs of models, plots of data and regression tables. I aim to teach students to translate that information into something they already know. This really seems to help students understand how to work with these new forms of summarizing information and why they are useful. For example, I try to make it clear that a graph of a model has a logic behind it, that it is not just a few curves we can shift, but that there is a value to using those curves: They make analyzing the model easier.

There is also an important synergy between different ways of explaining the same concept; eventually, I always try to tie the multiple different explanations back together. Ideally, students then realize that two explanations of the same idea were really one and the same explanation all along, just in different words or via a different medium. To me, in class or in office hours, student's biggest light bulb moments, those moments when I am as certain as I can ever hope to be they have understood what I am trying to explain, are when they realize that a problem that seemed intractable or difficult is really very much like another problem they have already understood.

Use real world examples, even ambiguous ones

I have found it really helpful to connect the tools students learn about with applications of those tools. Whenever I have taught undergraduate econometrics, for example, I have included papers using the most recent estimators or identification strategies the class had covered, to showcase how immensely

useful these tools are. This keeps students engaged, and it leads to much deeper discussion and thinking around whether, for example, causal identification works in a given real life setting, where the answer may be ambiguous.

Starting from simple, somewhat contrived examples with an obvious answer can be helpful, of course, because that provides clarity and helps students understand the tools. Showing that these tools can be applied in a real life situation, however, makes students *appreciate* the tools. It makes them take the tools more seriously, because they know that if they ever have to use them, it will be in a real life situation without an obvious answer.

Provide ample graded assignments and practice materials

The point of a class is for students to learn something that will continue to be useful beyond the current semester, not just for them to pass an exam. Yet, one of the main forms of evaluation is the exam; all classes I have taught had a midterm and a final. Students are understandably nervous about these. One key element to reduce that a little is to provide several smaller and larger graded assignments, from problem sets to term papers. This was not common during my undergraduate studies in Germany, and I appreciate that it is common in the US. Term papers especially, giving students plenty of time to work out a well-crafted submission, can be less stressful than an exam.

To allow students to prepare for an exam with relatively less stress ahead of time, I think two things are key. First, providing comprehensive lecture slides or notes. These provide an accessible overview of all topics covered up to the exam, and an easy way for students to double check class notes. Second, having problem sets mirror the exams, and providing practice exams that mirror the actual exams in format and length, is really helpful for students. It gives them more practice problems, but it also gives them security around what to expect, which reduces stress prior to the exam and makes students more comfortable during the exam. Well-managed student expectations seem to go hand in hand with fewer stressed-out students in the last office hours before the exam.

Make students comfortable asking questions

I always start my lessons by asking whether students have questions. It takes some time to make them feel comfortable asking in a class setting, and of course office hours, email or class message boards provide other ways of asking questions. As more and more students feel comfortable asking questions in class, I can focus course time on the concepts students find the most challenging. I do my best when planning lessons to anticipate what I will need to spend most time on, since some concepts are always challenging. Still, giving students the ability to express what is difficult about a topic in their own words makes it much easier for me to explain it on their terms.

Get students to think critically about course material

This extends to getting students to ask questions about, and think critically about, course material. Economics as a social science provides (hopefully) well-argued theories and well-done empirical studies of those theories. Nevertheless, we all know from seminars and talking to colleagues that many of the problems we study allow for more than one interpretation. Personally, I found economics much

more engaging the moment I realized that actual economists were having pretty active discussions about it. At the time, these concerned issues like the European Union's response to the ongoing currency crisis, which was close to home for me.

Debates like these, where accomplished economists disagreed on analyzing what the problem was or what the correct solution would be were not reflected in all of my courses, but they were reflected in the courses I took that eventually made me want to pursue a PhD. Getting students to think critically about economics means they can keep coming back to it, and keep reevaluating it as they learn more. It sits with them. This is, I think, crucial to getting them to take something away from a class that will stick with them far past their final exam, and hopefully even far beyond their time in college.

Make economics teaching as broad as economic research

I believe it is important to communicate the enormous scope of topics covered by academic economists, and who these economists are. This is an easy way to make very different students feel like economics has something to offer to them, that it can speak to questions they are passionate about. This in turn makes it easier for them to connect somewhat abstract course concepts to real life settings where those concepts apply, which can lead to a much deeper understanding of and appreciation for the analytic power of those concepts.

This extends to communicating the breadth of people who are economists. An experienced economics instructor (not someone I ever taught for) once told me that they used to include quotes by famous economists in their class materials, along with pictures of those economists. The instructor realized the people they were quoting were all white men, which could make some students feel like economics might not be for people like them, and that it might not be their path towards doing social science. As a solution, the instructor removed the pictures, but kept the same quotes.

After that conversation, I completely overhauled the section materials I had designed the previous semester and was going to use again for the undergraduate econometrics course I was teaching. These featured discussions of research papers I knew that fit each week's course topics. I went over them and made sure to *include* the pictures of the researchers I discussed, and I made sure to broaden the diversity of both scholars and topics I covered. Teaching the class with the revised materials, I got a lot more student engagement, in part because more students saw what I presented as something they cared about, and perhaps in part because more students saw themselves in the people whose work I showcased.

This also taught me to keep improving my lessons. The first time I created my own teaching materials, I got good reviews and lessons went well. There was no obvious reason to overhaul everything, and yet the revised materials turned out far superior. There is always room to improve in teaching, and I have constantly been able to improve, even though I have received good evaluations throughout.

Teaching effectiveness

I close with a brief overview of my teaching evaluations. In Figure 1, I provide average scores for student's rating of ten different questions pertaining to my instruction specifically (rather than the

course as a whole) included in the evaluations. All statements are rated on a five point scale, ranging from strongly disagree (1) to strongly agree (5). The questions are:

- 1. Overall, Maximilian Huppertz was an excellent teacher.
- 2. Maximilian Huppertz seemed well prepared for class meetings.
- 3. Maximilian Huppertz explained material clearly.
- 4. Maximilian Huppertz treated students with respect.
- 5. Maximilian Huppertz was sensitive to multicultural issues in the classroom.
- 6. Maximilian Huppertz handled questions well.
- 7. Maximilian Huppertz seemed to enjoy teaching.
- 8. Maximilian Huppertz was skillful in observing student reactions.
- 9. Maximilian Huppertz was willing to meet and help students outside class.
- 10. Maximilian Huppertz set high standards for students.

For each statement, evaluations provide a median score based on individual responses. I report an average of these median scores across all classes I have ever taught. In addition to the average scores I received, I also add average scores for the College of Literature, Science and the Arts (LSA) and the University of Michigan as a whole (UM) where available in the evaluations. My averages are weighted by the number of respondents for each course, whereas averages for LSA and UM are not weighted, since they are college or university wide averages themselves.

Below the figure, I also provide a collection of student comments I have received over the years. To me, it has always been extremely useful to go through comments and see what specific parts of the course worked for students. I have really appreciated student feedback, both because it has allowed me to improve my course materials, and because part of what makes teaching enjoyable, to me, is that when it works, students really appreciate it.

Student comments

"Max was great! With such a rocky transition of instructors at the beginning of the course, Max did a nice job of relieving student worries and providing constant excellent instruction. Max seems very passionate in seeing student success and I'm sure will carry energy that into whatever he does next!"

"Max is hands down the best GSI that I have ever had! The discussion sections and Office Hours were much better than the lectures, as we could really understand the material. He provided thorough explanations, gave relevant examples, which enhanced the understanding of the subject. He is definitely passionate about teaching this course, which had an effect in the amount of support he provided to students. He was patient with students, and explained the concepts multiple times until understood. I enjoyed his teaching very much and he is definitely the reason why I comprehended the material and R coding."

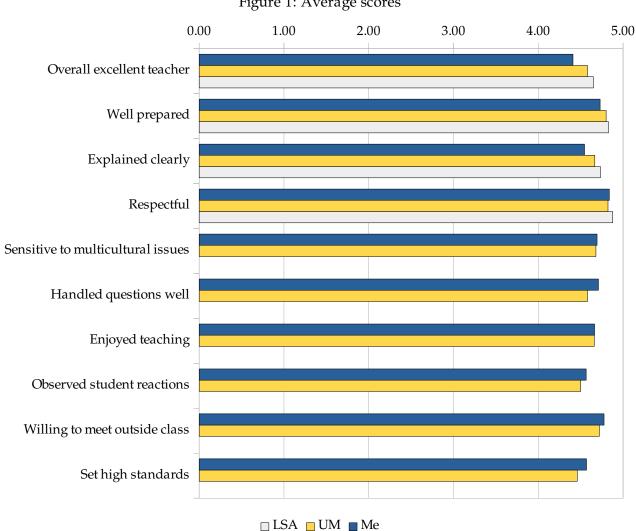


Figure 1: Average scores

Note: The figure shows average scores across all nine courses I have evaluations for. Most evaluations include all ten statements I present scores for. I show average scores for myself as well as for the College of Literature, Science and the Arts (LSA) and the University of Michigan as a whole (UM), where available in the evaluations. Averages for my scores are weighted by the number of respondents. Averages for LSA and UM are unweighted, since they are based on college and university wide averages themselves.

"Max is actually the best GSI I've ever had. He was super patient with us, had plenty of office hours, and was responsive via email. He also explained the material really clearly.", "Max is very good. He is good at explaining things and very respectful. He is available by email a lot and is very helpful."

"Max was a great GSI. He is really good at explaining the more difficult points of the class in discussion section and office hours. Max did a great job and I enjoyed going to his class."

"I liked how prepared Max came to the discussion sections to answer any questions students had on a certain material or on the homework. He explains with much dedication and knowledge to his best and gave concise explanations that answered a lot."

"Max is an amazing GSI. He is incredibly knowledgeable in the subject and can always explain the material/answer my questions clearly. I have learnt more in his discussion sections and office hours than I have in any other course. He is also willing to go through a lot of trouble to help students outside class. I really think he is the best GSI I've ever had."

"Max is an outstanding GSI. He had an idea of what to focus on during discussion sections, but he always made sure to ask us if we had any questions first. He explained material clearly, and even pointed out which parts of the material were more or less relevant in the real world. He often went above and beyond what we went over in lecture to give us a deeper conceptual knowledge (that we didn't need for exams but was helpful for understanding the theory in general). He provided us with all the resources we needed and prepared us well for the midterm exam. It is clear that Max is not only passionate about the subject but also motivated to help us succeed, which made for highly valuable discussion sections. My discussion section was always highly attended."

"Max was an excellent GSI. He covered dense readings, pulling out important points and encouraging classroom discussion."

"Max was really helpful both in section and in office hours. His instruction is one of the main contributors to my understanding of the material and performance on the assignments."

"Max is always very good at explaining what is important and interesting about the topics/readings we cover in discussion, and helping to supplement understanding of lecture material. Great teacher, sometimes students were reluctant to participate in discussion – although that might have been more due to intimidating material. I thought Max handled those moments well."

"Discussion questions are really helpful for me to understand what are the relatively more important issues in the readings. The discussions are also good and Huppertz explains materials clearly and in an efficient way."

"Max was awesome and deserves a lot of credit for good grades in the course. Would have him as full time prof if possible"

"The econ department has some great GSI's and Max is one of them. He handled questions well and if he did not know something he always followed up with us once he had the answer."

"Max is always very patient when answered my questions!"

"Great GSI. Actually explains concepts and willing to answer your questions."

"Great GSI. Max was very willing to go the extra mile to offer extra resources and help."

"Max is a great GSI when it comes to asking questions. I visited office hours frequently and he was always willing to answer my questions and explain things in new ways if I continued to misunderstand."

"Max was a great GSI. His office hours were incredibly helpful. My time in section and office hours has given me confidence in my ability in econometrics."

"Overall, great instruction and material. Really advanced by interest in econometrics, and I think I got some very useful and tangible skills out of this class. I'm sure these tools will help me immensely in the job market. Great stuff!"

"Great GSI, very responsive which is important to me"

"Max a very good and sweet instructor. He really tried to help students and enhance their understanding of the topic"

"Max was fantastic. Always gave great and insightful answers. Was patient with students as well. A class like this is very theoretical, so it is easy to misunderstand the content. Max was very good about explaining the content and helping people understand it properly. I had a lot of "Ohhhh, so that's how it works" moments with him."

"Max is very helpful during office hour. He welcomes all kind of questions and always gives a comprehensive answer. He earns a lot of my respects!"

"Great instructor. He is great at clarifying confusion students may have about topics covered in the course. His discussion section presentations also show how our course material is applied in the real world. That helped solidify my understanding of technical material."

"He handles questions very well and makes sure students completely understand before moving on."

"Overall, very helpful section where my understanding for the course material was enhanced greatly.",

"Max was a very good teacher and frequently answered students questions when they were struggling with homework that the primary instructor did not address"

"Max is one of the best GSIs that I have ever had! He was doing the majority of course instruction!"

"Max was so attentive to student needs and questions. Made the class significantly more doable and enjoyable. I found his teaching style to be much more effective than even the professor."

"Max is extremely willing to meet and help students outside class."

"Max is a very friendly and knowledgeable instructor. I wish him all the best in his future career!"