

## Material from Session 4 of [Teaching Faculty Workshop](#)

*Summaries in form of best practices are in italics (made by organizers)*

### **What is a key resource that you found or asked for?**

- Money with no strings. There is power in being able to spend my \$3K/year on anything I want, without having to defend why I need a third audio recorder in as many months or whatever.
- I have found that I can almost always offload any tasks to TAs. If I give them power, they will accept responsibility with pleasure. I have (undergrad) TAs interview new TAs, schedule staff meetings, draft assignments, run review sessions, fill in for my lecture while I am at SIGCSE, create rubrics, ...
- Relationships with faculty in other departments of various ranks.

*Provide an annual discretionary amount of funding to be used for conference travel, equipment and other items not automatically covered by the department. Amounts typically range from \$2K to \$5K. If there are no departmental funds to pay for food for TAs meetings extending through meal periods (e.g., grading, review sessions), include an amount for such expenses.*

### **Developing skills and advancing your career:**

- I would say that a teaching center or even an interest group to discuss teaching and scholarship issues would be great.
- Teaching center, mentor in department and outside the department.
- Make use of resources offered by your department / school / university, for example teaching center workshops and observations.
- Don't let lack of funding stop you from going to conferences and getting involved in projects that mean a lot to you. Make a vacation out of it.
- Professional development support should be standard. Not just dollars (though those are important) but also meaningful mentoring, by senior members of the faculty.
- One action that I am glad I took was to join (and then accept the role of chair) of a university-wide committee. This gave me the confidence and the exposure to university policies and practices to go after other opportunities - such as a diversity ambassadorship with our teaching and learning center

*Have on-boarding/orientation sessions for new TTFs hires. This should include teaching related aspects on processes and resources, plus relevant material included in the orientation of tenure/tenure-track faculty.*

*Encourage TTFs to take advantage of teaching related training made available by a teaching center in the University. This can include attending their workshops, receiving assessment of teaching through observation or video, and establishing relationships with experienced teachers.*

*Provide mentoring for each teaching faculty. If there is only one mentor, the individual should be a senior member of the faculty with experience in teaching, scholarship, and promotion. If there are two mentors, areas of experience may be divided up.*

*Support interaction and communication of teaching faculty with teaching faculty in other departments. This can be especially valuable when the department has a small number of teaching faculty.*

*The expectations for a teaching faculty typically consist of excellence in teaching plus X:*

- *How excellence in teaching is measured and assessed should be clear to the teaching faculty.*
- *Support and value creativity and innovation in teaching.*
- *From assistant to associate rank: measure university impact.*
- *From associate to Full: measure national impact (external letters are commonly requested).*

*What are common and meaningful options for X?*

*Typically refers to scholarship and broader impact besides teaching.*

- *Curriculum development*
- *Developing an online presence*
- *Development of instructional tools (e.g., tools that increase scalability as class sizes increase)*
- *Write a textbook*
- *Developing and implement organizational structures for effective use of undergrads as TAs; training of UTAs.*
- *Supervising student projects beyond class projects*
- *Oversight and mentorship related of student organization or student groups (e.g, programming competitions)*
- *Involvement in outreach and diversity activities*
- *Recruiting of students (especially students from underrepresented groups)*
- *Education research (typically related to classes taught)*
- *Publication resulting from education research, developed instructional tools, new curriculum efforts, etc.*
- *Serving as the chair of a committee*
- *Leadership roles in college or university level committees where instructional experience is of value or participation benefits the TTFs professional career.*
- *Efforts in support of diversity and establishing meaningful relationships with other departments.*

**What could your department do to help you feel like a first class citizen?**

- **Put me on a PhD committee. I don't want to chair it. I just want to serve. I can help!**
- **Chair MS Thesis/Ph.D. Dissertation Committees**
- **Having departmental leadership talk about teaching track faculty in the same way as the tenure track in meetings and in email**
- **Having the departmental communications highlight teaching track faculty "kudos" in the same way they do for research faculty.**
- **Have a clear process for promotion (we only have a "lecturer" and "senior lecturer" rank and nothing beyond that). Have a process for sabbaticals.**

*Communicate and highlight achievements and recognitions of TTFs and T/TT faculty the same way. Whether in website announcements, e-mails, or in meetings.*

*Include TTF on committees where their experience and insight is of value. Besides committees related to curriculum, teaching, and student matters, this can include M.S. and Ph.D. committees, awards committees, facility committees etc. Recognize that a TTF may be interested in serving in roles that are not immediately teaching focused.*

*Have a clear and known policy and process for evaluation and promotion. This should be in the form of an official document provided to each TTF.*

*Ensure that TTF have voting rights on all matters related to curriculum and teaching, including hiring of teaching faculty. Consider including TTF's as appropriate in other decision processes and voting issues.*

*Ensure that TTF have the same benefits and equal access to benefits like access to daycare, medical care, housing, retirement contributions.*

*Have a sabbatical option for teaching track faculty. (Possibly specify expectation of TTF sabbaticals.)*

#### ***What TTF's said ...***

***If you want to be treated like a first-class citizen, act like one.***

- *This includes attending meeting, speaking up, getting to know T/TT faculty and build relationships, let them know what you do, involve them in your activities as appropriate, attend research talks of interest to you, get involved in grant writing if opportunities arise.*
- *Be visible and thoughtful.*
- *Remember that we see all students at the beginning of their studies. Students will remember us.*
  - *What we do has impact on them.*
  - *We serve the pipeline more than typical tenure/tenure track faculty.*
  - *We have more impact on diversity than typical tenure/tenure track faculty.*

#### **Collaborating with tenure-track faculty**

- We have many opportunities to collaborate (Faculty meetings, committees etc.) I try to go out of my way to chat with them in these meetings or just in the hallway.
- Attend their group meetings if applicable.
- Meeting with faculty occasionally and sometimes over lunch. Collaborating on general department tasks such as reviewing FTE hires, and MS and PhD applications. Actively attending department meetings. Also, collaborating on curriculum development with some of the research track faculties.
- If there are computing education tenure-track faculty in your department, try to collaborate with them
- I am collaborating with a TT faculty member to offer a monthly teaching lunch. Each month we discuss a specific teaching topic. I am also in the process of applying for a mutual mentoring grant which would also include both TF and TT faculty.
- Change research-oriented faculty's perception of teaching track faculty
  - Attending the meetings, bringing opinions about teaching (undergrad and grad)

- Where possible new junior faculty (teaching and research) should be blended so such segregation won't occur
- Be active and visible outside your department and university

### **Advocating for yourself and others**

- I met with a variety of teaching faculty, in private, and ask for their problems, then used those anecdotes to make a pitch. Saying "I know a female lecturer who told me she chose not to take maternity leave because she did not have a long contract" was far more potent in conversation because anecdotes inspire sympathy and anonymous friends cannot be contradicted
- Connect with teaching track faculty at other institutions not just at SIGCSE, but at other conferences that you attend during the year:
- I am asking questions from the department chair and department manager whenever I am not sure about my rights and that makes them to clarify the right of teaching tenure-track faculties to the rest of the department
- Get a copy of the Taulbee survey, read the salary section, find your school's category, look at the median salary for teaching track faculty. Advocate for yourself!
- Define your own evaluation criteria by defining your job as "Teaching + X"
- We are codifying our college bylaws now, and there is much debate about the symmetry (or not) in P+T, etc., between tenure-track and non-tenure-track faculty. It would be great for best practice to be full symmetry between groups.
- Ask for symmetry: if Tenure faculty can vote on Teaching P&T, then Teaching should be able to vote on Tenure. I found most faculty in CS have a sense of fairness that can be appealed to.

### **Integrating teaching and research**

- Create undergrad teams to do projects/senior thesis is a good vehicle
- Choosing a focus and designing research that fits into your classroom is a good idea.
- Propose a course in your research area, capstone or senior design project in your research area
- Work on research projects with undergrads / MS students who are desperate for research experience. Teach courses in your research area (if possible) or mention relevant content in intro/core classes. This helps identify good student researchers.
- Hiring master students when teaching graduate-level courses related to your research area. Also, running experiments in teaching large lower-division courses about how effectively deliver large lectures and how to incorporate active learning in them.

### **Managing competing demands and workload**

- Contracts and/or culture documents should clearly specify expected workloads: teaching loads, number of committee assignments, internal/external service. These may differ between institutions, but should be clear to all faculty.
- Clear expectations make one's demands clearer. Having formal documents, even if they are in department level, might help achieving this.
- Even if it is redefined every year, I would like to see a percentage document created that explains the proportion of folks' workloads (Teaching, service, research)

- Teaching load: what's a "full" teaching load? If one teaches 80% of the time, what does that mean in terms of number of students, number of sections, etc.? I have no idea what best practice is, but I know what definitely is not working: 3 sections, 100 students each, 5 graders.
- I am assigning days to different tasks, for example, I am allocating Mondays to department-related obligations, Tuesday-Thursday to teaching (I asked department to schedule my course on these two days), and I am spending Wednesdays and Fridays for research and outreach
- I make a point to (a) put everything I do on my calendar (even class prep, grading, etc) and (b) ensure people can see the calendar when I am trying to schedule a new commitment. I generally don't even have to mention that I am busy if they see a calendar covered in appointments. Also, using black background for my calendar helps make it pop.

### **Instructional Resources**

- TAs / graders: How many students per TAs / graders? I think best practice is something like < 30 students per TA / grader. And preferably much less than 30:1.
- Tiered TA team
- I have 50 TAs: 3 head TAs, 12 Lab Leads, 25 returning TAs, and 10 new TAs. Each has a defined role, with some decisions made by me, some by the head, some by the leads, etc. I have meetings with different groups, which allows me to offload more work than the time of the meetings requires. And I assign each student a single grader (10 graders / TA)

### **Other common issues/concerns**

Wrong perception about teaching track faculty

- Best Practice: how to change that? Attending the meetings, bringing opinions about teaching (undergrad and grad)
- It was discussed here that new assistant professors should be blended so such segregation won't occur

What is a best practice for diversity in hiring and retention with teaching track faculty?

How critical it is to conduct/integrate computer science education research with the routine teaching practice? If it is critical, how should that be done?

Should universities be looking for teaching-track faculty with expertise in education in addition to (or even instead of?) expertise in the subject matter? How should graduate degrees in education be treated?