What makes Tech Physics Special?

2016-2021

# Why is this question important?

# What makes us special?

"We treat undergraduate students like graduate students". (Dave Meier)

"Our students are practical" (R.M. Juberias)

"Our students are ready to work on graduation day" (Sonnenfeld)

"We have a lot of female faculty and we do well with female undergraduates.

We have unusual research specialities.

We seem to get along with eachother pretty well.

We do a good job with our curriculum.

We ground our students well in both experiment and theory." (Raymond)

X% of our graduates go on to earn advanced degrees after 5 years.

Implications of these statements.

1) We want to provide our students a solid physics background in which even the theory classes emphasize problem solving and integration of concepts across the sub-fields of physics.

2) We want our students to have practical laboratory, instrumentation and computational skills, which include direct experience with modern techniques in an environment where the student learns to think about their data and not just treat lab work as an exercise in turning knobs.

3) We want to maximize the engagement of our students in actual scientific research (that can lead to publications) and not just "research lite".

4) We want our students to have at least one faculty mentor (and other mentors) so that they can really experience "doing physics".

5) We should assemble an industry panel to help us make our students desirable and successful in industry.