



TUTORING IS BAD

Gus Lipkin

PROBLEM AND ANECDOTE

PROBLEM

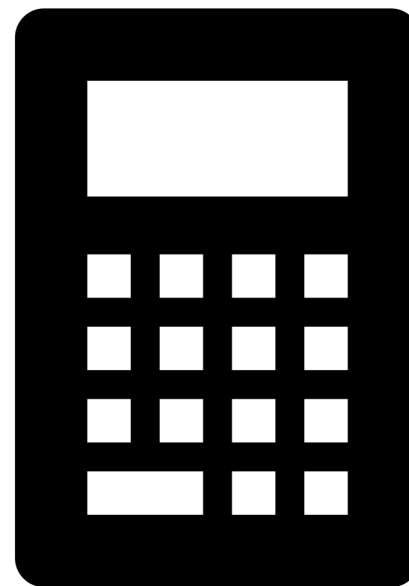
The tutoring system at Florida Poly is bad

- Tutors make their own schedules
- There is not a tutor for every class
- Tutoring sessions can become crowded

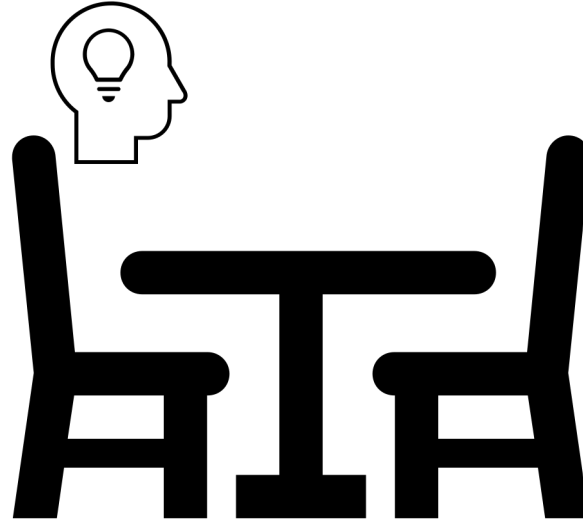
ANECDOTE



THIS IS GUS TAKING STATS I



THIS IS GUS ONE WEEK
BEFORE HIS MIDTERM



THIS IS GUS AT TUTORING
~~FROM EIGHTEEN HOURS~~
BEFORE THE EXAM



THIS IS GUS ASKING DR BUNN WHERE
THE STATS TUTOR HAS BEEN



THIS IS GUS TAKING A CRASH COURSE
IN STATS I FROM DR BUNN



THIS IS GUS BARELY PASSING HIS EXAM

THE STATE OF TUTORING TODAY

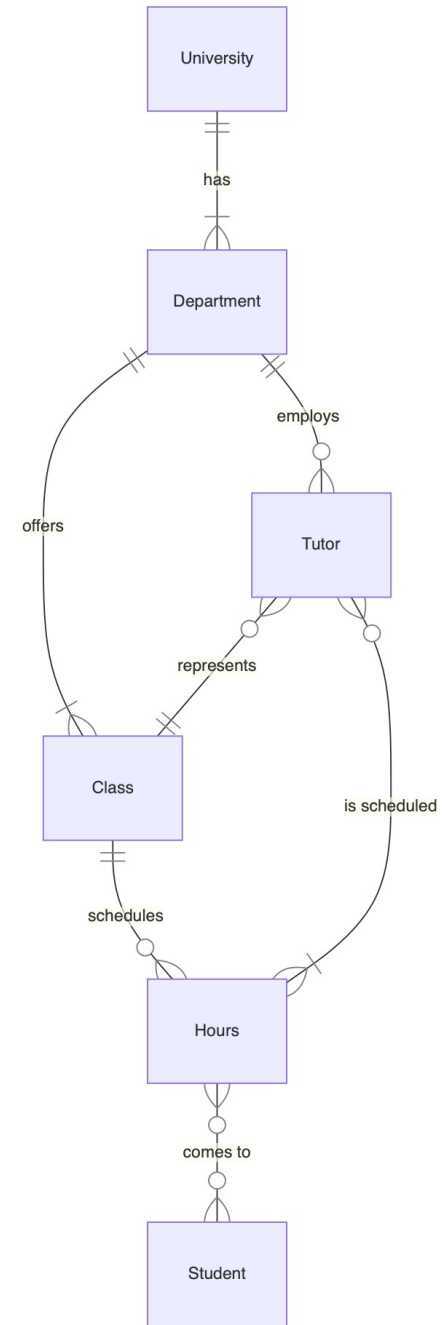
DESCRIPTION

- Some courses offer pre-scheduled group tutoring with tutors

THE CURRENT TUTORING MODEL



AS AN ENTITY RELATIONSHIP DIAGRAM



ICKY MATH

- $C = 10dc_d t_c h_t = \sum_1^d \sum_1^c \sum_0^t 10h_t$
- $TH = 10h_t / B_d$
- $SH = \sum_1^c \sum_0^t 10h_t / \sum_1^d B_d$
- To maximize student hours:
 - Minimize tutor overlap
 - Maximize the number of classes that individual tutors can tutor for

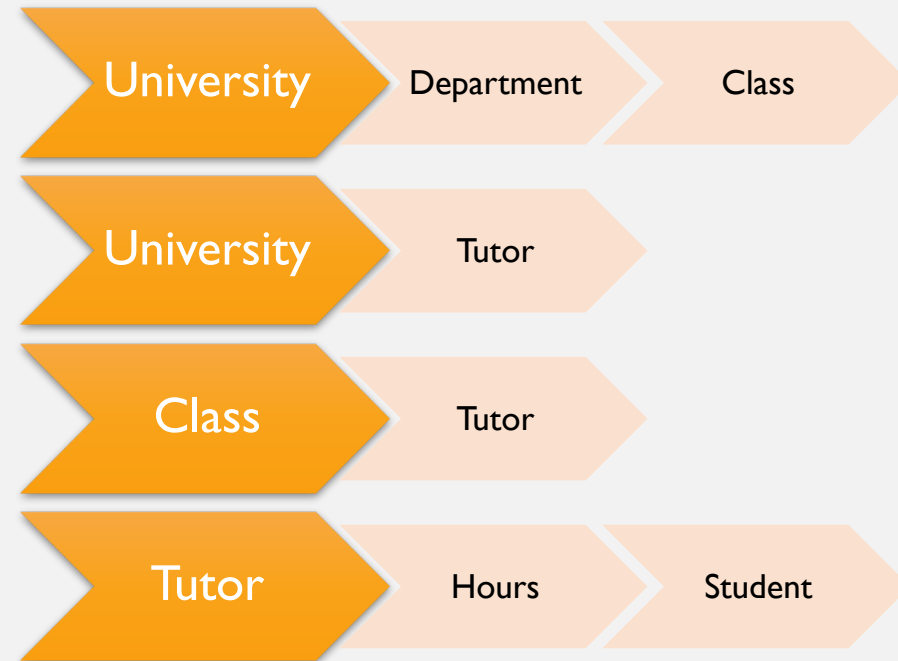
POSSIBLE ALTERNATIVES

A ONE-ON-ONE TUTORING MODEL

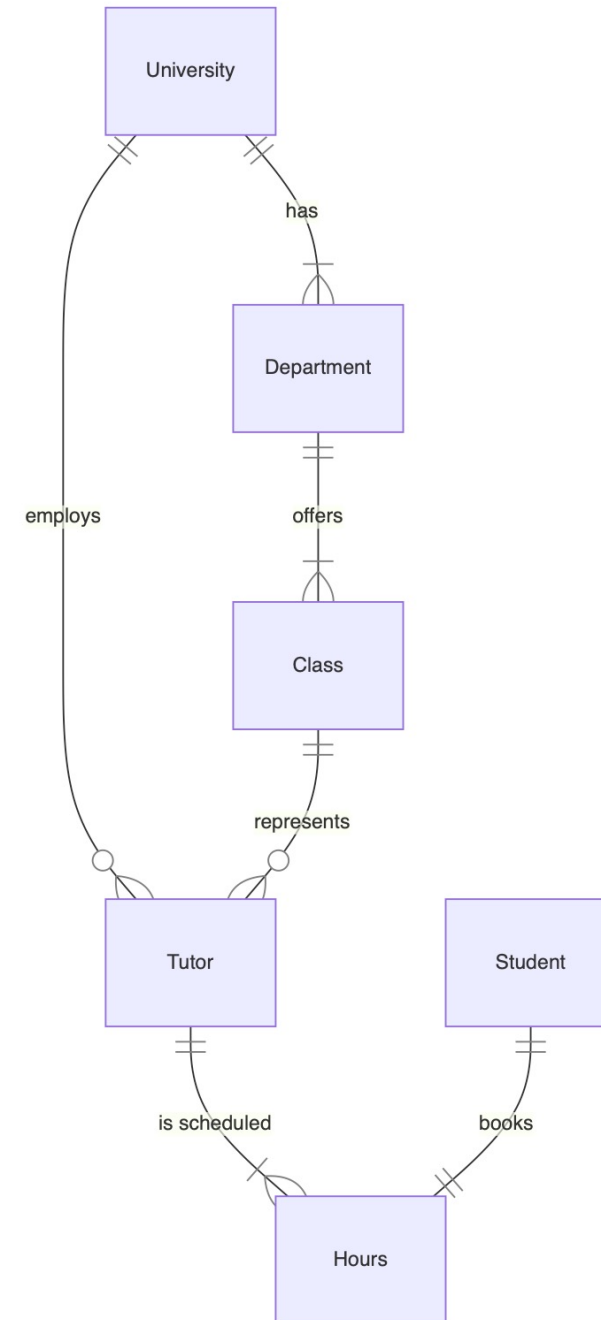
DESCRIPTION

- Tutors are knowledgeable in a variety of subjects
- Students book time with a tutor for a specific class

A ONE-ON-ONE TUTORING MODEL



AS AN ENTITY RELATIONSHIP DIAGRAM



ICKY MATH

- $C = \sum_0^t 10h_t$
- $SH = TH = 10h/B$
- To maximize student hours:
 - Maximize the number of tutors
 - Maximize the number of classes that each tutor covers

A HYBRID TUTORING MODEL

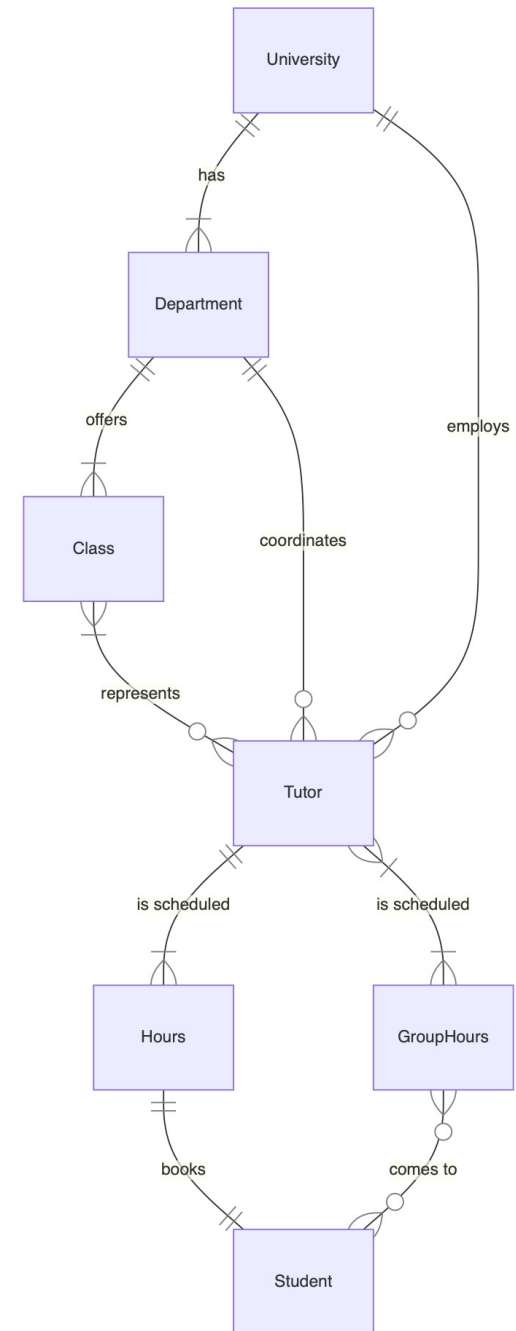
DESCRIPTION

- Combine a group tutoring and one-on-one tutoring model
- For high demand courses, there are scheduled tutoring sessions
- For high and low demand courses, students can schedule time with a tutor

A HYBRID TUTORING MODEL

- I tried to make a flowchart but it's just easier to show you the ERD

AS AN ENTITY RELATIONSHIP DIAGRAM



ICKY MATH

- $SH = \frac{10h_t + \sum_1^c \sum_0^t 10h_t}{B}$
- To maximize student hours:
 - Maximize group hours for popular classes such as Calc, Physics, and Intro to Programming
 - Maximize the number of classes that individual tutors can tutor for

CONCLUSIONS

THIS IS A DIFFICULT PROBLEM TO TACKLE

- Without sufficient proof that working together will save money and help students, no departments will want to pool resources
- I don't know how to do enough of the theoretical math to convince anyone

A HYBRID MODEL IS PROBABLY BEST

- You get the best parts of group tutoring and one-on-one tutoring
- It has potential to be at least as efficient as group tutoring



QUESTIONS FOR THE AUDIENCE

KORI

Who?

GRAHAM

What?

LOGAN

When?

MAVERICK

Where?

DR DEWEY

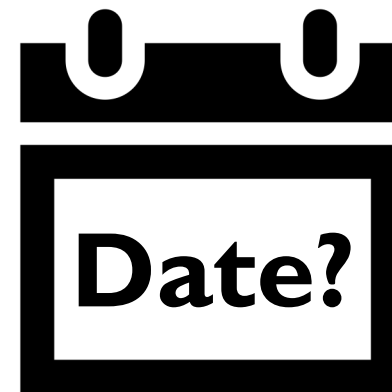
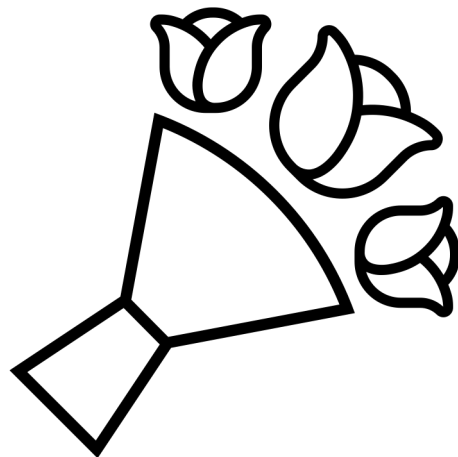
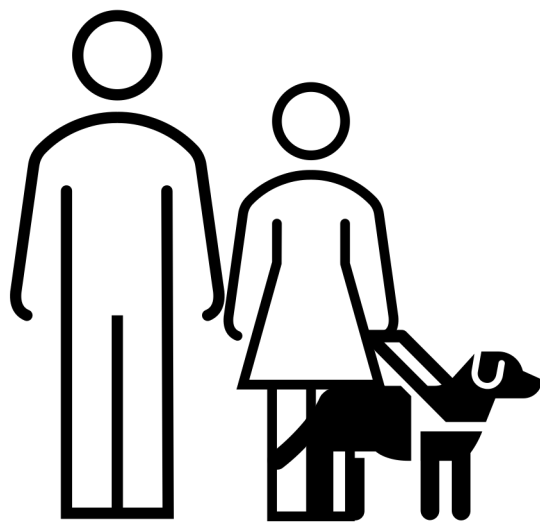
Why?

NICOLE

How?

JAKE

- Can you find a number that does not follow this pattern?
 1. If the number is even, divide it by two.
If it's odd, divide by three and add one
 2. Repeat step one with your new number until you reach one



HAILEY