

Schedule for Week 10

Monday: Memorial day. NO CLASSES.

Tuesday: Download the worksheet from the “Class materials” page, link to “Practice Final” .

Wednesday: Professor Paul Smith will lecture. Topic: examples of curve sketching and optimization.

Thursday: Review TA session: discuss practice final. Last chance to check your grades!

Friday: NO LECTURE. BUT Mo will have the “last chance” review session in this room, Smith 102, 12:30-1:20

Office Hours and Review Sessions for Week 10

Monday	Laura		11-1	her office PDL C-113
Tuesday	Kyle		3:30-5:30	MSC
Wednesday	Mo		1:30-2:30	MSC
	Mo	REVIEW SESSION	6-9pm	Smith 102
Friday	Mo	REVIEW SESSION	12:30-1:20	Smith 102
	Mo		1:30-2:30	his office PDL C-18

Example: Grade Optimization Problem

The Simpsons

A star student of the Springfield middle school, Bart Simpson, has a math homework due on Monday morning. This fact has slipped his head completely while he was playing videogames all week-end. At 5am on Monday morning he wakes up with a burning thought that he has 4 hours before he has to go to school, and his very long homework hasn't been even started. He does not trust himself to do a good job in such a short time... and he also was forced to leave his game right in the middle last night so it needs to be finished too. So he follows a well-developed route: he wakes up his dad and his sister Lisa, hands them his homework and informs them that they have exactly four hours to earn him the best possible grade (under given circumstances).

It is known from vast previous experience that Lisa can solve any problem in 20 minutes and always does it correctly. On the other hand, her dad, who is extremely efficient, solves any problem in 5 minutes! But he hasn't gotten it right even once...

The homework is graded for both completeness and correctness. A correct solution is worth 7 points. An attempted but incorrect solution is worth 2 points. Moreover, there is only one calculator in the Simpson's household so Lisa and Homer can only work on the homework one at a time.

Lisa, being a smart girl, considers the task for a second and then runs back to bed, saying: "I can be of no help".

Question: How should have Lisa and Homer split the workload? Will Lisa's refusal to help hurt Bart's grade?