1. Hi, we did the project as a group and it consisted of George Sanchez and Nelson B. The goal of our presentation was to create a sketch that explores real world applications of linear equations so that students would be able to relate to the problem in the real world instead of just in the classroom.
2. More specifically, we wanted to look at what happens when two slopes intersect when they have different y-intercepts and different slopes.
3. The way this sketchpad works is that the red line represents Monica's work productivity in the 8-hour time frame and the blue line represents Jerry's productivity. The slider used is to represent the situation if Monica came into work early symbolizing the number of parts she completed before Jerry comes in. The green point represents Eduardo's completed work in the eight hours. The check boxes reveal each person's linear equation and the point of intersection where Jerry and Monica make the same amount of parts.
4. The main way that this investigation is different from paper and pencil is that it enables me to investigate the amount of work Jerry and Monica get done in a given amount of time and play 'what if' when we Monica shows up to work one hour earlier than Jerry and to investigate Eduardo's rate of work and have students compare each person.
5. Based on SMP #5 (Use tools appropriately), the Geogebra tools that we used include plotting and tracing a point that has time as the independent variable and amount of work done as the dependent variable.
6. Two other Standards for Mathematical Practice that I used when creating this sketch are MP4; Model with mathematics and for students to apply formulas and equations where appropriate because when they figure out the formula for the slope they can easily find the answer to any amount of work done with any hour. We also used MP1; Make sense of problems and persevere in solving them. As teachers, this provides wait-time for processing and finding solutions for

each student because students need to do problem solving by themselves first and have them think about it thoroughly.

7. The thing we like best about our project was to be able to use Geogebra and all its tools instead of handing out worksheets or drawing it on the board. Also it is easier for students to be able to figure out how much work each person got done just by moving the point.