Thoroughly analyze Georges Seurat's *La Parade* for evidence of the Golden Ratio.

This will involve finding and photocopying a photograph in a book (as opposed to an image off the web), *or* finding an image off the web and verifying that its dimensions are in the same proportion as the original, *or* using an image from the web and correcting every ratio for the distortion that occurred.

You will be looking to see whether horizontal lines cut vertical lines into mean and extreme ratio, whether vertical lines cut the horizontal lines into mean and extreme ratio, and whether any of the various rectangles (or implied rectangles) are golden. Pay attention to lines formed by sides of people (or their arms or legs), trees, fences, as well as the more obvious lines. You will discuss what you think is a reasonable acceptance range, how you decided where on a line to measure to (particularly in the case of something wide, like the balustrade, you might want to measure to both sides, and to the middle, and do separate calculations for each).

If you do find ratios that are within the acceptance interval for the Golden Ratio, are they closer to the Golden Ratio, or to 8/5? Can you find any reasons for suspecting that one of these was intended by Seurat, rather than the other? Is there any evidence that Seurat was using the Fibonacci numbers as his guide?

Of course, include plenty of pictures and diagrams, as well as calculations. Begin with an introduction, state your results early on, support them with calculations, and end with a conclusion.

Possible points: If you analyze a significant number of reasonable prospects for evidence of the Golden ratio (16 or more), you could earn up to 30 points. (There's no real point in analyzing the ratio of two quantities that are obviously not in the Golden Ratio, so I do look at whether you focused on *reasonable* prospects). 10 reasonable prospects can earn up to 20 points, and 5 reasonable prospects can earn up to 10 points. Of course, the description of your work must be clear, easy to follow, concise, and correct in order to earn the maximum number of points in any category.

Note: A bunch of calculations submitted without a corresponding analysis will be returned ungraded.