# Homework 1

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## Part One

### First Visual

The first visual facilitates comparing directly proportions within survived-class between genders. But the same arrange makes it hard to compare within other arranges of the categories, like among classes within gender-survived.

It's hard to tell what can be improved when the point of the chart is not clear from the title (that should be something to consider), but we could diminished the number of charts if we would make three stacked charts where we add total dead and total survivors, as this two categories are mutually exclusive.

#### Second Visual

This visual looks better: it's less cluttered, and it facilitates comparing categories easier; it addresses all the problems from the first one.

The precise data of how many survived per category is lost, and the legend is very obtuse (everyone know how unnatural does "survived=1" looks). Also, one can argue that it is unnecessary as the title and the use of color/opacity guides the understanding (though it's always good to clarify).

#### Conclusions

From both visuals, one can infer an association between gender and class to survival, but it is more apparent from the second one.

### Part Two

Of the two static approaaches, effectively, Visual 2b is more intuitive as it uses shape and direction besides color. It time axis has a clear start and end (1850 to 2023).

Honestly, I don't see much difference in effectiveness between Visual 2b and the video from NASA, except for a couple of points: Visual 2b works with a smaler scale in Celsius  $(-0.9^{\circ}, 0.9^{\circ})$ , and the distances are more dramatic, as well as

the strength of the color. The animations add some "neurotism" and urgency, as the dot starts spiraling faster. But this can also be percieved with how the rate of change of the histogram.