Case Study 7: Grade Inflation
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## Recap of Case Study

Our job in this case study is to critique and improve upon a table published in the Minnesota Daily for an article on grade inflation. The table presented grade percentage by college for two academic years. These grade percentages were broken down by letter grade. These tables are to be used as evidence of grade inflation.

## Critique of the Daily's table

## What we liked

The table has an informative title and the columns are clearly labeled. The columns are arranged in a logical order, i.e. by descending letter grades. The table was well spaced and it provides a reference. The table is largely self-contained. It is clear what the information in the table is attempting to convey.

## What we didn't like

The rows of that table do not appear to be arranged in any particular order. They aren't arranged alphabetically nor are they arranged by ascending or descending letter grades. We found the different shades for each row to be a bit distracting. There are too many columns. If the idea is to examine grade inflation perhaps the table does not need any of the columns corresponding to the D and F letter grades. Finally there is just too much in these two tables.

## Suggestions to improve the table

- Combine the tables so that we can see the difference between the years
- Combine some columns into $\mathrm{A}, \mathrm{B}, \mathrm{C}, \mathrm{D}, \mathrm{F}$ to make it more readable.
- We could use less significant figures.
- We could provide an average or median.
- We could bold the maximum and minimum in each column.
- We could alphabetize or use some other reasonable order for the colleges (e.g. ordering on just the A's).
- We could drop the D's and F columns.
- Drop the background colors.
- Create a new change in grade variable from 1999-2000 to 2008-2009.
- We could transpose the table.
- We could make it into a graph.

Table 1. Change in Percentage of Grades Awarded By College from 1999-2000 to 2008-2009.

| College | A | B | C | D \& F |
| :--- | ---: | ---: | ---: | ---: |
| Public Health | 16 | -12 | -3 | -1 |
| Nursing | 14 | -12 | -1 | -1 |
| Pharmacy | 13 | -9 | -4 | 0 |
| Biological Sciences | 10 | 3 | -7 | -6 |
| Liberal Arts | 9 | -2 | -4 | -3 |
| Food, Agricultural, and Natural Sciences | 8 | -3 | -3 | -2 |
| Dentistry | 8 | -4 | -4 | 0 |
| Public Affairs | 7 | -8 | 1 | 0 |
| Technology | 4 | 2 | -3 | -3 |
| Design | 3 | 2 | -3 | -3 |
| Education and Human Development | 0 | -1 | 1 | 0 |
| Management | -3 | 5 | -1 | -1 |
| Continuing Education | -5 | 4 | 1 | 0 |
| Veterinary Medicine | -6 | 6 | 0 | 0 |
| Medical | -8 | 5 | -2 | 1 |
| Average | $\mathbf{5}$ | $\mathbf{- 2}$ | $\mathbf{- 2}$ | $\mathbf{- 1}$ |

## Explanation of our reworked table

We collapsed all the columns within a letter grade into one column. We combined the D's and F columns together into one column. Then we calculated the change in the percentage of letter grades awarded from 1999-2000 to 2008-2009. We round this value to the hundredths place. We sort the rows from largest increase to largest decrease for the A's column from 1999-2000 to 2008-2009. Finally, we included the column averages at the bottom.

