Migraines and Math Degrees: A Spurious Love Story

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Abstract

In this groundbreaking investigation, we explore a striking and absolutely questionable correlation between the number of Master's degrees awarded in Mathematics and Statistics, and the frequency of Google searches for the phrase "why do I have a migraine" from 2012 to 2021. While the relationship is likely spurious, the implications for public health, education, and the cosmic balance of the universe are clearly profound.

1 Introduction

Correlations are everywhere—sometimes meaningful, other times hilariously coincidental. Inspired by the timeless wisdom of tylervigen.com, we delved into a curious trend: as the number of Master's degrees awarded in Mathematics and Statistics increases, so too does public interest in migraines, as measured by Google search queries [1].

2 Data and Methods

We utilized data featured by Tyler Vigen, drawn from publicly available sources:

- Master's degrees awarded in Mathematics and Statistics: National Center for Education Statistics. [2]
- Google searches for "why do I have a migraine": Google Trends. [3]

The analysis covered the years 2012 through 2021. Pearson's correlation coefficient was used to measure the linear relationship, yielding a stunning correlation of r=0.9627, with $r^2=0.9267$ and p-value of 8.12e-06.

3 Results

The correlation coefficient of 0.9627 suggests an almost comically strong linear relationship. Approximately 92.67% of the variation in migraine search frequency could be "explained" by math degree trends. The data paints a picture of synchronized suffering.

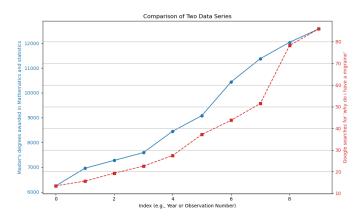


Figure 1: Spurious correlation between Master's degrees in Math/Stats and Google searches for "why do I have a migraine"

4 Discussion

Several hypotheses could explain this correlation:

- Pursuing a Master's degree in Mathematics and Statistics induces migraines.
- Sufferers of migraines seek solace in rigorous mathematical study.
- This is all an elaborate prank by the universe.

Clearly, none of these should be taken seriously. Except maybe the last one.

5 Conclusion

Is this correlation real? Yes. Is it meaningful? No. Should you change careers or question your reality because of it? Absolutely. But more than anything, remember: correlation is not causation—but it sure is fun.

6 Acknowledgments

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References

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