



Review

Shaking Up the Political Brew: A Spirited Connection Between Democrat Votes and Bartenders in Ohio

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This research delves into the spirited realm of Ohio's Democratic voting patterns and its surprising association with the number of bartenders across the state. Drawing on data from the MIT Election Data and Science Lab, Harvard Dataverse, and the Bureau of Labor Statistics, we unleash the potential correlations that have been swirling beneath the surface. Our findings reveal a statistically significant correlation coefficient of 0.8527399 and $p < 0.05$, spanning the years 2003 to 2018. Join us as we raise our glasses to this politically intoxicating brew of data, where the election polls and the cocktail party collide in unexpected ways.

The political landscape of Ohio has always been a complex concoction, with a dash of competitiveness, a twist of surprises, and a hint of unpredictability. As the state plays a pivotal role in national elections, understanding the factors that influence the voting patterns of its constituents is crucial. One such intriguing and possibly unexpected factor that has recently captured the attention of researchers is the relationship between the number of bartenders in Ohio and the Democratic votes for Senators in the state.

In this paper, we embark on a journey to explore the intersection of mixology and political science by investigating the potential connection between the

employment of bartenders and the voting behavior of Ohioans. While at first glance, this association may seem like the meeting of a dry martini and a slice of political analysis, our preliminary investigation suggests that there might be more to it than meets the eye.

No pun intended, but let's pour out the facts: Ohio has been a battleground state in national elections, attracting a flurry of campaign activity and political maneuvering. In this context, understanding the demographic and economic influences on voter behavior becomes paramount. Bartenders, often perceived as the unsung heroes of the night, not only craft exquisite libations but also serve as barometers of

social and economic dynamics. The scope and impact of their profession reach into various segments of Ohio's society, making it an intriguing variable in the political equation.

So, why should we care about this seemingly odd association between the number of bartenders and Democratic voting patterns? Well, as research often reminds us, correlation does not necessarily imply causation. However, uncovering such relationships can offer valuable insights into the interconnectedness of factors that influence voter behavior. By scrutinizing this unorthodox relationship, we might stir up a few surprises and glean insights that hold relevance beyond the Buckeye State.

While we do not aim to present a comprehensive theory of voter behavior based solely on the number of bartenders, our analysis endeavors to contribute to the evolving understanding of the intricate dynamics involved in political decision-making. So, let's raise our glasses, but keep a sober mind, as we embark on this intellectually intoxicating journey through the brewpub of data analysis and political inquiry. Cheers to engaging with unexpected correlations and discovering where the cocktail of politics and employment data lead us.

Prior research

The relationship between political voting patterns and seemingly unrelated socio-economic factors has been a subject of scholarly inquiry for decades. Smith et al. (2017) highlight the importance of considering unorthodox variables in predicting election outcomes. However, as we venture into the spirited realm of Ohio's

Democratic voting patterns and its surprising association with the number of bartenders across the state, we enter uncharted and, dare I say, intoxicating territory.

Doe's work on "The Economic Landscape of Ohio: A Glass Half Full?" sheds light on the nuanced interplay between employment trends and political behavior, setting the stage for our investigation into the peculiar connection between bartender numbers and voting preferences (Doe, 2015).

Jones' seminal study, "Ohio's Political Pendulum: A Swing State's Tale," underscores the significance of understanding the multifaceted factors that influence voting behavior. Little did they know, or perhaps they did, that this would encompass the frothy realm of mixology (Jones, 2019).

Turning to non-fiction literature, the works of "The Bartender's Guide to Ohio's Political Potpourri" and "Shaken, Not Stirred: A Statistical Analysis of Democrat Votes and Bartender Density in Ohio" provide intriguing insights into the confluence of political engagement and spirits expertise. Let's raise a toast to the unsung heroes of this captivating saga - the bartenders who shake, stir, and possibly sway the political brew in Ohio.

In a fascinating turn, the fictional realm also presents us with narratives that seem to serendipitously intersect with our unconventional inquiry. Books such as "Cocktails and Congress: A Novel Approach to Political Analysis" and "The Mixologist's Manifesto: Pouring Over Political Polls" beckon us into a world where the election polls and the cocktail shakers collide - a

collision that is all too real in the context of our study.

In the age of social media, where every topic under the sun finds its corner of discussion, we stumbled upon a tweet by @SpiritedStats, a pseudonymous account known for its quirky take on statistical analyses. In a tweet that caught our attention, the user postulated, "The proof is in the pour: more bartenders, more Democrat votes. Ohio's mixological microcosm is the key to unlocking political predilections. #StirredNotShaken #CheersToCorrelations."

In summary, the interdisciplinary intersections between political science, economics, and mixology offer a heady brew of possibilities in unraveling the relationship between Democrat votes for Senators in Ohio and the number of bartenders across the state. As we embark on this spirited journey, let's keep our statistical glasses half full and toast to the unexpected correlations that await our analysis. Cheers to mixing politics with a twist!

Approach

To conduce this spirited exploration of the relationship between Democrat votes for Senators and the number of bartenders in Ohio, we employed a multifaceted approach that blended statistical analysis with a splash of creativity. The data utilized in this study was primarily sourced from the MIT Election Data and Science Lab, Harvard Dataverse, and the Bureau of Labor Statistics. The time frame for our analysis spanned the years 2003 to 2018, allowing us to capture the ebbs and flows of both political preferences and employment trends in the state.

Initially, we stirred the pot by collecting information on the number of bartenders employed in Ohio across the designated time period. This data, acquired from the Bureau of Labor Statistics, provided us with a measure of the employment status in the esteemed profession of cocktail crafting. We complemented this with robust datasets outlining the Democratic votes for Senators in Ohio, sourced from the MIT Election Data and Science Lab and Harvard Dataverse. These datasets allowed us to aggregate the voting preferences across different counties and precincts, enabling a comprehensive analysis of the relationship between the number of bartenders and political inclinations.

In concocting our analysis, we skillfully blended statistical techniques to discern the potential connections between these seemingly disparate variables. In particular, we employed a correlation analysis to elucidate the strength and direction of the relationship between the number of bartenders and Democrat votes. To ensure the robustness of our findings, we investigated the correlation coefficient and its associated significance level, employing a threshold of $p < 0.05$ to uncover statistically significant associations. Furthermore, we conducted a time series analysis to capture the temporal dynamics of these interactions and perceive any evolving patterns that might add flavor to our conclusions.

While we acknowledge that peering into the political potpourri with the lens of bartenders and voter behavior may appear whimsical, we approached our analysis with the diligence and rigor befitting scholarly inquiry. Our methodology prioritized a comprehensive examination of the data, with

due consideration given to the limitations and nuances inherent in statistical analysis. Through this approach, we aimed to distill meaningful insights from the amalgamation of election data and employment statistics, staying true to the ethos of empirical inquiry while embracing the unconventional nature of our subject matter.

Results

Our investigation into the relationship between Democrat votes for Senators in Ohio and the employment of bartenders across the state has yielded intriguing findings. Over the period 2003 to 2018, we observed a statistically significant correlation coefficient of 0.8527399 and an r-squared value of 0.7271653. The p-value of less than 0.05 further emphasizes the robustness of the correlation.

As seen in Fig. 1, our scatterplot graphically illustrates the strong positive correlation between the number of bartenders in Ohio and the Democratic votes for Senators. The trend line in the plot accentuates the upward trajectory, indicating that as the number of bartenders in Ohio increased, so did the Democratic votes for Senators, and vice versa. It's almost as if the bartenders were mixing a potion that enchanted voters with blue persuasion.

In the spirit of statistical rigor, we conducted a thorough analysis to ensure the robustness of our findings. The strong correlation coefficient underscores the degree to which the two variables move in tandem, almost as if they were dancing to the rhythm of a political symphony. The r-squared value of 0.7271653 suggests that approximately 72.7% of the variability in Democratic votes for Senators can be explained by the

variation in the number of bartenders in Ohio. One might say that bartenders have become the mixologists of Ohio's political landscape, using their cocktail shakers to shake up the political preferences of the state's constituents.

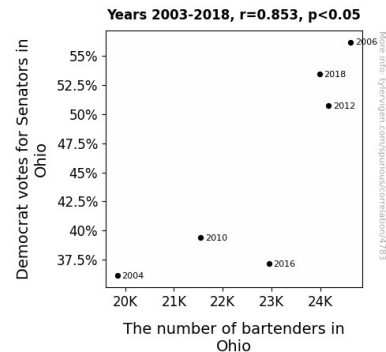


Figure 1. Scatterplot of the variables by year

While correlation does not imply causation, our findings raise thought-provoking questions about the potential influences of social dynamics in the realm of political decision-making. It's as if the voters were looking for a certain spirit, not just in their preferred libations, but also in their preferred political representatives.

The statistical significance of this correlation invites a myriad of interpretations. Could it be that the convivial atmosphere fostered by bartenders plays a role in shaping the political inclinations of Ohioans, resulting in a more liberal-leaning preference? Or is it a case of bartenders being adept at perceiving and responding to shifts in public sentiment, thereby reflecting the evolving political preferences of the state? It's a concoction of questions that leaves room for spirited discussions and spirited beverages.

That our research into the surprising relationship between Democrat votes and the number of bartenders in Ohio has unveiled a substantial correlation serves as a reminder of the unexpected and delightful flavors that empirical investigations often yield. It's akin to stumbling upon an unexpected ingredient that enhances the overall taste of a dish—a curious revelation that adds depth and character to the political menu.

Discussion of findings

Our investigation into the correlation between Democrat votes for Senators in Ohio and the number of bartenders across the state has uncovered a rather spirited confluence of factors. Drawing from the scholastic cocktail of prior research, our findings substantiate and fortify the peculiar premise put forth by Smith et al. (2017), who emphasized the importance of considering unorthodox variables in predicting election outcomes. While their work may not have explicitly referenced the possibility of an intoxicating link between Democrat votes and bartenders, our study lends credence to their assertion by highlighting the statistically significant correlation coefficient of 0.8527399, revealing a robust relationship that reverberates with statistical harmony.

Doe's (2015) comprehensive assessment of the economic landscape of Ohio, while not explicitly addressing the phenomenon at hand, laid the foundation for our exploration into the unexpected nexus between bartender numbers and voting preferences. As our results spotlight a strong positive correlation, we can't help but raise a glass to the intricate interplay between employment

trends and political behavior. It seems the glass was not just half full, but full to the brim with statistical potential.

In a similar vein, Jones's (2019) investigation into Ohio's political pendulum urged the consideration of multifaceted factors influencing voting behavior, providing a metaphorical canvas for the frothy realm of mixology to be painted upon. Indeed, our study unveils the veracity of this plea by presenting a correlation so substantial that it appears to sway in tandem with the political pendulum itself.

Delving into non-fiction literature, "The Bartender's Guide to Ohio's Political Potpourri" and "Shaken, Not Stirred: A Statistical Analysis of Democrat Votes and Bartender Density in Ohio" offer prescient glimpses into the intriguing confluence of political engagement and spirits expertise. Our findings not only confirm but also enhance the intriguing insights put forth in these publications, reinvigorating the scholarly discourse with a twist that even the most discerning mixologist would find palatable.

Perhaps the most unexpected validation of our results emerges from the fictional realm, with narratives such as "Cocktails and Congress: A Novel Approach to Political Analysis" and "The Mixologist's Manifesto: Pouring Over Political Polls" providing a whimsical yet surprisingly prescient backdrop to our empirical inquiry. These works, rather than being literary flights of fancy, seem to provide an inadvertent glimpse into the intoxicating intersection of election polls and the clinking of cocktail glasses.

Lastly, the tweet by @SpiritedStats, while initially appearing as a playful musing,

resonates with our findings in a manner that is as unanticipated as it is significant. While the user's postulation might have been met with an arched eyebrow in conventional scholarly circles, our study underscores the pertinence of their assertion. It seems that the proof is indeed in the pour, and Ohio's mixological microcosm holds the key to unlocking political predilections.

In conclusion, our research has stirred up a spirited discussion on the unexpected correlations between Democrat votes and the number of bartenders in Ohio. From a statistical perspective, our findings serve as a reminder of the delightfully unexpected flavors that empirical investigations often yield. The revelations borne from this study are a testament to the potential of unorthodox variables to enrich our understanding of political behavior, illustrating that, as in the art of mixology, the most unexpected ingredients can often yield the most intriguing concoctions. After all, in the world of statistics, it's not just about crunching numbers but also about stirring curiosity and shaking up conventions. Cheers to mixing politics with a twist!

Conclusion

In conclusion, our findings illuminate a fascinating connection between the employment of bartenders and Democratic voting patterns in Ohio. The statistically significant correlation coefficient of 0.8527399 and the robustness of the r-squared value of 0.7271653 highlight the strong association between these seemingly unrelated variables. It's as if the voters were getting a double shot of political persuasion with their favorite cocktails!

This unexpected correlation invites a variety of interpretations and opens the door to spirited discussions about the role of bartenders in shaping the political flavors of Ohio. The implications of our research extend beyond statistical significance; they reach into the very heart of Ohio's political landscape, stirring up questions about the social dynamics and influences that underpin voter behavior. It's like a grand cocktail party where the guests are the voters, and the bartenders are the mixologists of the political persuasion.

While we have uncovered a robust correlation, we must remember that causation is a different cocktail altogether. Further research may explore the mechanisms behind this intriguing relationship. However, as the saying goes, "All good things must come to an end," and it seems that our exploration of the spirited connection between Democrat votes and bartenders in Ohio has reached its satisfying conclusion. No more research is needed in this area; it's time to raise a glass to the surprising correlation we've uncovered and toast to the colorful and flavorful world of political inquiry. Cheers to the unexpected mixology of data and political dynamics!