Copyleft The Center for Agricultural Sociological Studies, no rights reserved. Contents may be shared with whoever you feel like. They can be copied, emailed, posted to a listserv, printed out and tacked on a colleague's office door. Whatever you want.

STALK-ING THE LINK: A MAIZE-Y CONNECTION BETWEEN GMO CORN CULTIVATION AND KANSAS DIVORCE RATES

Cameron Hoffman, Andrew Taylor, Gregory P Truman

Advanced Engineering Institute

In this study, we delve into the unlikely relationship between the usage of genetically modified organisms (GMOs) in the cultivation of corn in the great state of Kansas and the state's divorce rates. Utilizing data from the USDA and CDC National Vital Statistics, we conducted a comprehensive analysis of the years from 2000 to 2021. Our findings revealed a staggering correlation coefficient of 0.8811446, with a p-value lower than a corn stalk in a tornado at p < 0.01. Upon closer inspection, our results suggest that the proliferation of GMO corn in Kansas may indeed be "corn-ected" to the state's divorce rates. This unexpected connection between agricultural practices and marital dissolutions highlights the need for further investigation into the social and environmental implications of GMOs. As we continue to unravel the complexities of this correlation, we must remember that sometimes, the kernel of truth in research can be as elusive as finding a grain of corn in a cornfield.

As the concern over genetically modified organisms (GMOs) continues to grow, it is researchers no surprise that are "ear"nestly exploring their potential impact on various aspects of life. In the case of the state of Kansas, where cornfields stretch as far as the eye can see, the intersection of GMO corn cultivation and divorce rates might seem as unlikely as finding a kernel in a haystack. Nonetheless, this study aims to peel back the husk of this intriguing relationship and shed light on the "stalk"ing question: is there a maizy connection between GMO corn and divorces in the Sunflower State?

The idea of GMOs impacting something as personal as marital relationships may sound like a "corn-y" joke at first, but our research reveals a correlation coefficient that's as strong as the roots of a wellnourished corn plant. We delved into this research not to "cob"fuddle the scientific community, but to bring to light a potential connection that may have previously been "ear"-gnored.

As we embark on this journey of discovery, it is important to ensure that our research is conducted with the utmost "kernels" of integrity. We must weed through the data meticulously and avoid jumping to "corn"-clusions prematurely. However, once we do find those significant results, we will celebrate like it's the "maize" event of the year!

Stay tuned as we unravel the earresistible connection between GMO corn and divorce rates in the heart of America!

LITERATURE REVIEW

The relationship between genetically modified organisms (GMOs) in agriculture and societal dynamics has been a topic of growing interest among researchers. Smith et al. (2015) investigated the impact of GMO corn cultivation on environmental sustainability, highlighting comprehensive the need for а understanding of the implications of genetic modification on crop production. Similarly, Doe (2018) explored the economic effects of GMO adoption in corn farming, emphasizing the potential influence of agricultural practices on local and regional economies. These studies lay the groundwork for examining the broader consequences of GMO usage, paving the way for our investigation into the unexpected connection between GMO corn and divorce rates in Kansas.

Now, you might be wondering, "What does genetic modification have to do with marital relationships?" Well, hold onto your husks, because we're about to uncover a cornucopia of intriguing findings. As Jones (2020) delved into the social impacts of agricultural practices, it evident that became the interplay between farming methods and community dynamics can have far-reaching effects. But could this extend to the heartwrenching realm of divorce? Let's dig deeper and see what the "ear"-spective holds.

Turning to non-fiction literature, "The Omnivore's Dilemma" by Michael Pollan offers insight into the complexities of modern food production, including the prevalence of GMOs in corn cultivation. Meanwhile, "Fast Food Nation" by Eric Schlosser sheds liaht on the interconnectedness of agricultural practices and societal patterns, inviting us to consider the potential ripple effects of GMO usage.

In the realm of fiction, "Children of the Corn" by Stephen King may seem like a departure from the scholarly discussion, but its eerie portrayal of rural landscapes and unexpected twists serves as a hidden metaphorical reminder that connections can lurk amidst the stalks. Similarly, "The Perks of Being а Wallflower" by Stephen Chbosky invites

readers to contemplate the complexities of human relationships, reminding us that sometimes, the most unexpected correlations can be found in the "corners" of everyday life.

As we ventured into the depths of literature to unravel the mysteries of GMO corn and divorce rates. we encountered а treasure trove of unexpected sources. From scanning through academic journals to perusing the local bookstore, and yes, even decoding CVS receipts, we left no stone unturned in our quest for knowledge. Because when it comes to research, as any "corny" academic will tell you, the maize is the limit!

METHODOLOGY

To harvest the data needed for our study, we embarked on a guest as epic as Dorothy's journey in "The Wizard of Oz." We scoured the fields of the internet and, seasoned farmers, like reaped the information provided by the United States Department of Agriculture (USDA) and the Centers for Disease Control and (CDC) National Vital Prevention Statistics. As we traversed through this digital corn maze, we carefully harvested the data from 2000 to 2021, ensuring that our findings would be as robust as a wellfertilized corn crop.

Our first step in this "stalk"-ing experiment involved extrapolating the annual usage of genetically modified corn seeds, peeling back the layers of statistical reports like а seasoned cornhusker. We dug deep into the USDA's data on GMO corn cultivation in Kansas, separating the "ears" of truth from the chaff of misinformation.

Next, we gathered demographic information on marriage and divorce rates in Kansas from the CDC National Vital Statistics. We diligently combed through the statistical haystacks to find the relevant figures, ensuring that the data we "harvested" was as ripe as an ear of Kansas sweet corn in the middle of summer.

To analyze the collected data, we employed the chi-square test to determine the association between GMO corn usage and divorce rates. As we navigated the statistical "field," we made sure to handle the data with care, treating it like the delicate kernels of a freshly picked corn cob.

Our analysis utilized sophisticated software. which statistical we affectionately dubbed our "corn-chopper," to crunch the numbers and discern any significant correlations. We engaged in regressions and correlations, aiming to uncover any patterns or relationships hidden within the vast expanse of data, similar to a farmer hoping to "dig up" a bountiful harvest.

Finally, to ensure the robustness of our findings, we subjected our results to a sensitivity analysis, akin to inspecting the stability of a sturdy corn stalk against the forces of nature. This additional step allowed us to evaluate the reliability of our conclusions and ensure that our study stands as tall and strong as a genetically modified corn plant in a high-yield field.

In summary, our methodology combined a meticulous approach to data collection and a comprehensive analysis, akin to a farmer carefully tending to their crop. We "cereal"-ously explored every relevant aspect of the relationship between GMO corn cultivation and divorce rates in Kansas, aiming to provide insights as compelling as a midwestern sunset over a field of golden corn. Throughout our research, we remained committed to upholding the highest standards of scientific rigor, even if that involved cracking a pun or two along the way.

RESULTS

Upon analyzing the data collected from the years 2000 to 2021, we found a striking correlation coefficient of

0.8811446 between the usage of genetically modified organisms (GMOs) in corn cultivation and the divorce rates in Kansas. This correlation is stronger than the bond between a cob and its kernels. The r-squared value of 0.7764157 emphasizes the robustness of this relationship, indicating that approximately 77.64% of the variation in divorce rates can be explained by the usage of GMOs in corn production. The pvalue, which was lower than a corn stalk in a storm at p < 0.01, supports the statistical significance of this maize-y connection. It's safe to say that the results of our analysis have shucked any doubts about the relationship between GMO corn and divorce rates in Kansas.

Our findings are summarized in the scatterplot (Fig. 1), which visually presents the strong positive correlation between the usage of GMOs in corn cultivation and the divorce rates in Kansas. As the saying goes, "the proof is in the pudding," or in this case, "the corn is in the correlation."

Fig. 1: Scatterplot showing the correlation between GMO corn usage and divorce rates in Kansas.



Figure 1. Scatterplot of the variables by year

This unexpected correlation reminds us that in the world of research, one must be exploring unconventional open to connections - even if it means traversing through a corn maze of data. As we carefullv unearth these results. it clear becomes that the impact of agricultural practices extends beyond the fields and into the nuanced fabric of societal dynamics, including the tender kernel of human relationships.

In conclusion, our study not only "ear"compelling relationship itates the between GMO corn and divorce rates in but also "corn"-firms Kansas the importance of considering the broader implications of agricultural practices on phenomena. The "stalk"-ing social question of whether GMOs can influence divorce rates has been answered, and it's time for the scientific community to "harvest" this knowledge and plow forward in understanding the far-reaching consequences of agricultural innovation.

DISCUSSION

In this study, we sought to thoroughly investigate the correlation between the usage of genetically modified organisms (GMOs) in corn cultivation in Kansas and the state's divorce rates. Our findings indicate a remarkably strong correlation coefficient of 0.8811446, with a p-value lower than corn in a silo - at p < 0.01. It's safe to say these results have really "corned" us off guard! This striking statistical relationship supports the prior research, including Smith et al. (2015) and Doe (2018), highlighting the need to "stalk" the implications of GMO adoption in agriculture quite seriously.

"ear"-marked Our study was bv unexpected findings, given the rather "corny" nature of our investigation. Nevertheless, the robustness of the correlation, as reflected in the r-squared value of 0.7764157, underscores the significant impact of GMO usage on divorce rates in Kansas. As we peel back the layers of this correlation, it's clear that the "husk" of the matter lies in recognizing the broader socioenvironmental implications of agricultural practices.

The "ear"-spective provided by Jones (2020) on the social impacts of farming

methods aligns with our results, hinting at the possibility of an interconnected web of consequences arising from agricultural innovations. This echoes the lessons from non-fiction works such as Michael Pollan's "The Omnivore's Dilemma" and Eric Schlosser's "Fast Food Nation," which emphasize the farreaching effects of GMO corn cultivation beyond the fields. Even the "corn-y" fiction of Stephen King and Stephen Chbosky surprisingly points us toward acknowledging the unexpected connections that can be "harvested" from seemingly unrelated areas.

Furthermore, our findings are visually scatterplot, represented in the showcasing a strong positive correlation between GMO usage and divorce rates. This practically exclaims, "It's as clear as corn starch!" The statistical significance of our results, akin to a nugget of truth found in a haystack, underscores the need to seriously contemplate the ramifications of GMO adoption in agriculture. So, in the "stalk" market of marital dynamics, our study ventures beyond the 'ear'-regular and plows into uncharted territory, promising an 'earsome' yield of insight.

As we forge ahead, it's important to heed the lessons of our findings and recognize the profound impact of agricultural practices on social phenomena. After all, in the grand "corn-ucopia" of research, there's always more than meets the 'eye' of the husk. So, let's 'ear' on the side of caution and embrace the 'stalk'-ing power of knowledge in unraveling the complexities of societal dynamics.

CONCLUSION

In conclusion, our research unearths a "maize"-ing link between the usage of GMOs in corn cultivation and the divorce rates in Kansas. The data revealed a correlation so strong, it's like the bond between two ears of corn – "ear"resistible! It's clear that the impact of GMOs reaches beyond the fields, delving into the complex fabric of human relationships.

As we wrap up this study, it's important to remember the "kernel" of truth in our findings. The correlation coefficient of 0.8811446 is not just "ear"-levant but also statistically significant, with a p-value lower than a corn stalk in a whirlwind at p < 0.01. These results "ear"-voke a deeper understanding of the potential influence of agricultural practices on societal dynamics.

It's time for the scientific community to "harvest" the implications of our research and acknowledge that sometimes, the most unlikely connections can lead to significant discoveries. After all, who would've thought that GMO corn could be "stalk"-ing its way into the divorce rates of Kansas?

In light of these findings, it's clear that no more research is needed in this area. It's time to "corn"-gratulate ourselves on a "maize"-ing discovery and "cobb"-lude that the GMO corn and divorce rates relationship has been thoroughly "ear"xamined. As the saying goes, let's not "husk" around – it's time to embrace this "ear"-resistible correlation and "corn"tinue seeking new avenues of research!

No more research is needed in this hilariously "corn"-y area!