

The Association Between Race, Sex, and Traffic Stop Disposition Harshness in Connecticut

Zain Punjwani, Applied Data Analysis, Wesleyan University



Introduction

- In recent years, much effort has been focused on decreasing racial disparities at traffic stops across Connecticut (Ross, Kalinowsky, and Barone, 2020).
- The Connecticut Racial Profiling Prohibition Project, launched in 2011, has been found to be successful in decreasing the disparity in traffic stops between White drivers and drivers of color (Connecticut Department of Emergency Services and Public Protection, 2024).
- Economic experts estimate the aforementioned “Connecticut Model” has decreased the racial disparity for minorities by 23.56% (Parker, Ross, and Ross, 2024).

Research Questions

- Despite a decreasing disparity in traffic stops between White drivers and drivers of color in Connecticut, are drivers of color still more likely to face *harsher* traffic stop dispositions than White drivers?
- Does the driver’s sex play a role in increasing or decreasing traffic stop disposition harshness in relation to driver race?

Methods

Sample

- Respondents (N=313,346) were drawn from a dataset from the Traffic Stops Racial Profiling Prohibition Project.
- The dataset, provided by Central Connecticut State University (CCSU), is a record of every traffic stop in Connecticut in 2022.

Measures

- Data from the CCSU dataset utilized in this project were Connecticut driver race, sex, and the concluding traffic stop disposition.
- A *harsh* traffic stop disposition is one that carries legal consequences. The following dispositions recorded in the dataset are not harsh: infraction, no disposition, verbal warning, written warning. The following dispositions are harsh: misdemeanor summons, and uniform arrest report.

Results

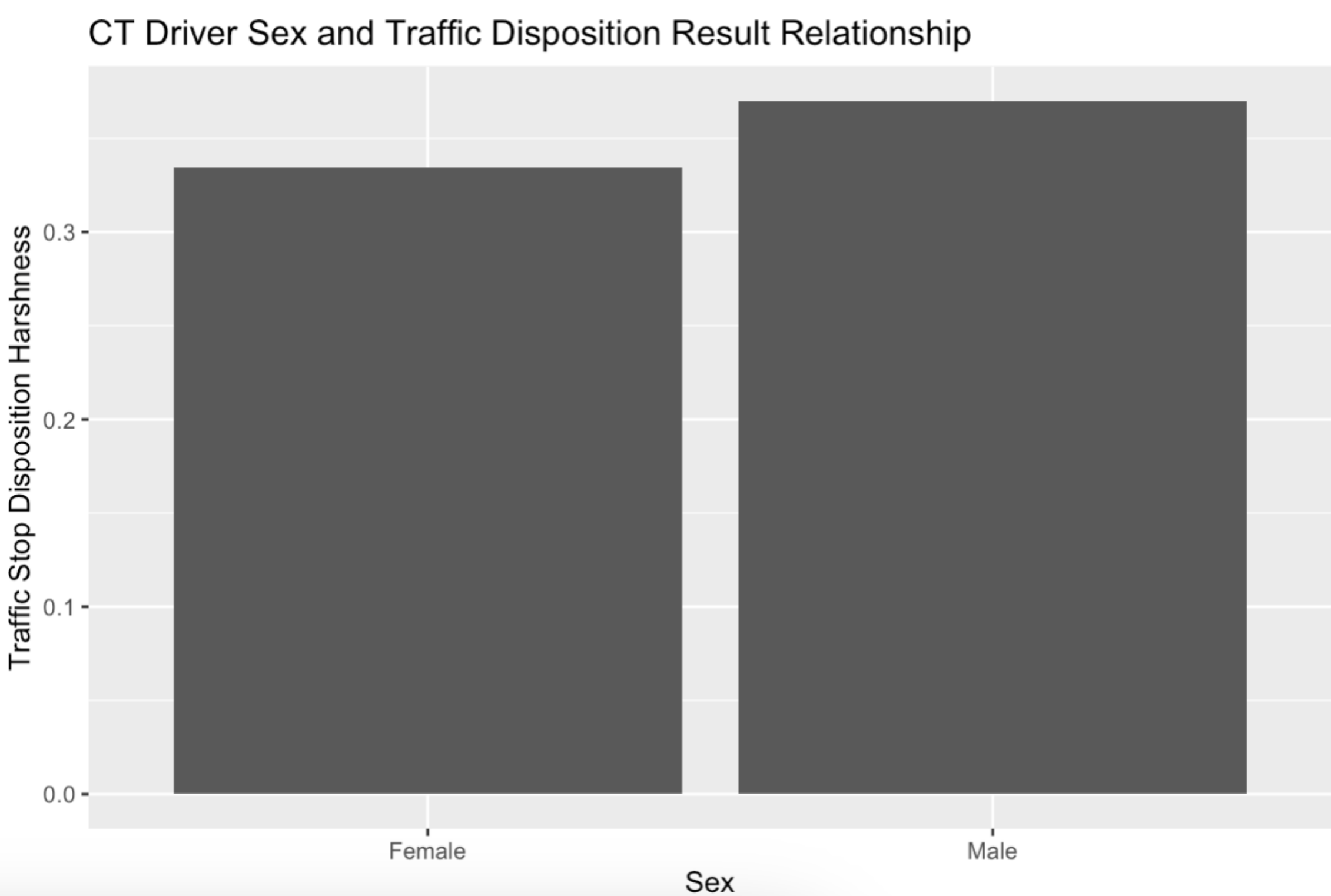


Figure 1: Traffic Stop Disposition Harshness for males vs. females.

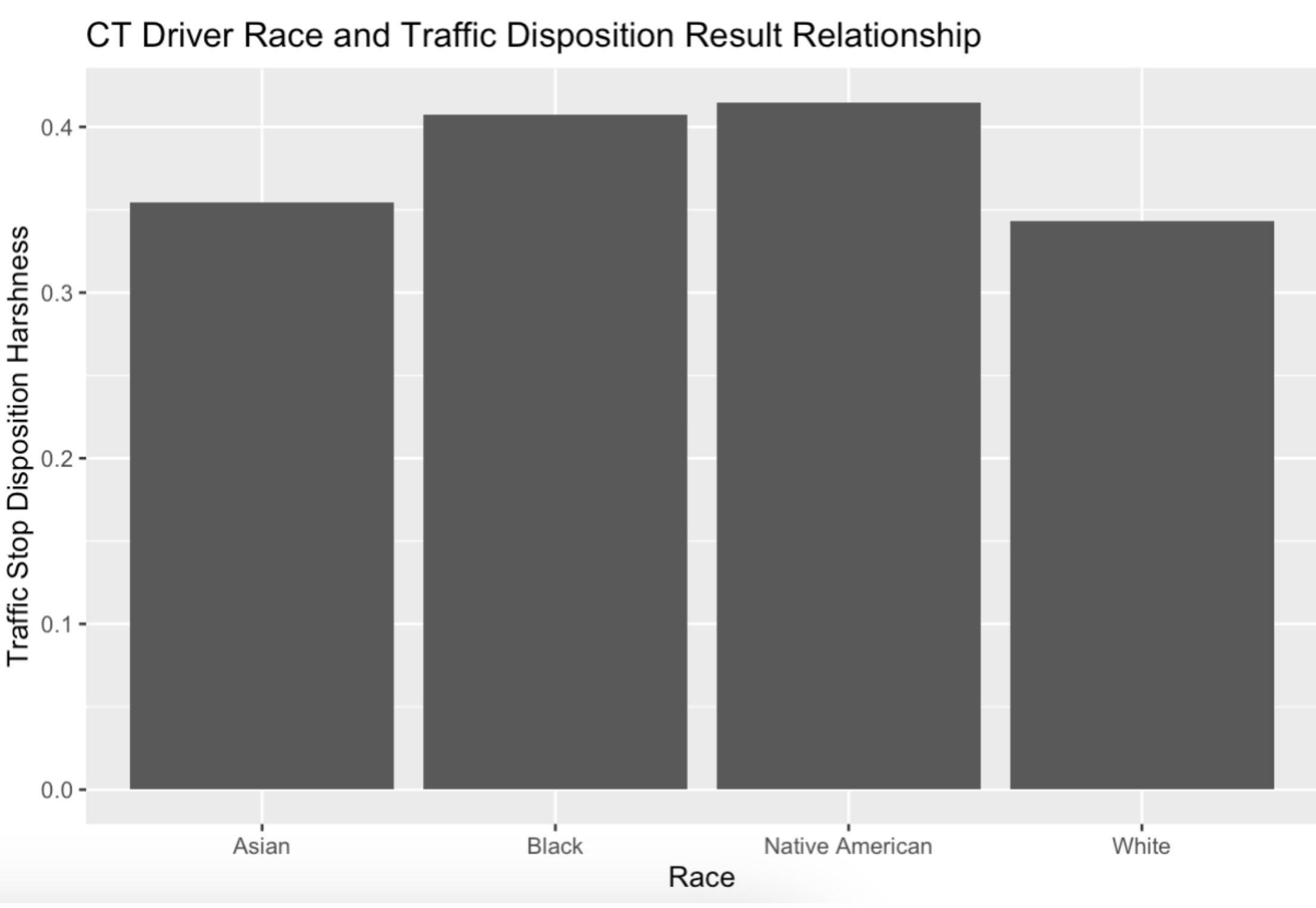


Figure 2: Traffic Stop Disposition Harshness for Asian, Black, Native American, and White drivers.

Bivariate

- A post-hoc test for Chi-Square analysis showed that traffic stop harshness **was** statistically significant ($p=0$) between the following drivers based on race: Asian vs. Black, Asian vs. Native American, White vs. Black, and White vs. Native American. The post-hoc test showed **no** statistical significance between Black vs. Native American ($p=1$) and White vs. Asian ($p=0.338$).
- A Chi-Square analysis showed statistical significance between males and females ($p < 2.2e-16$).

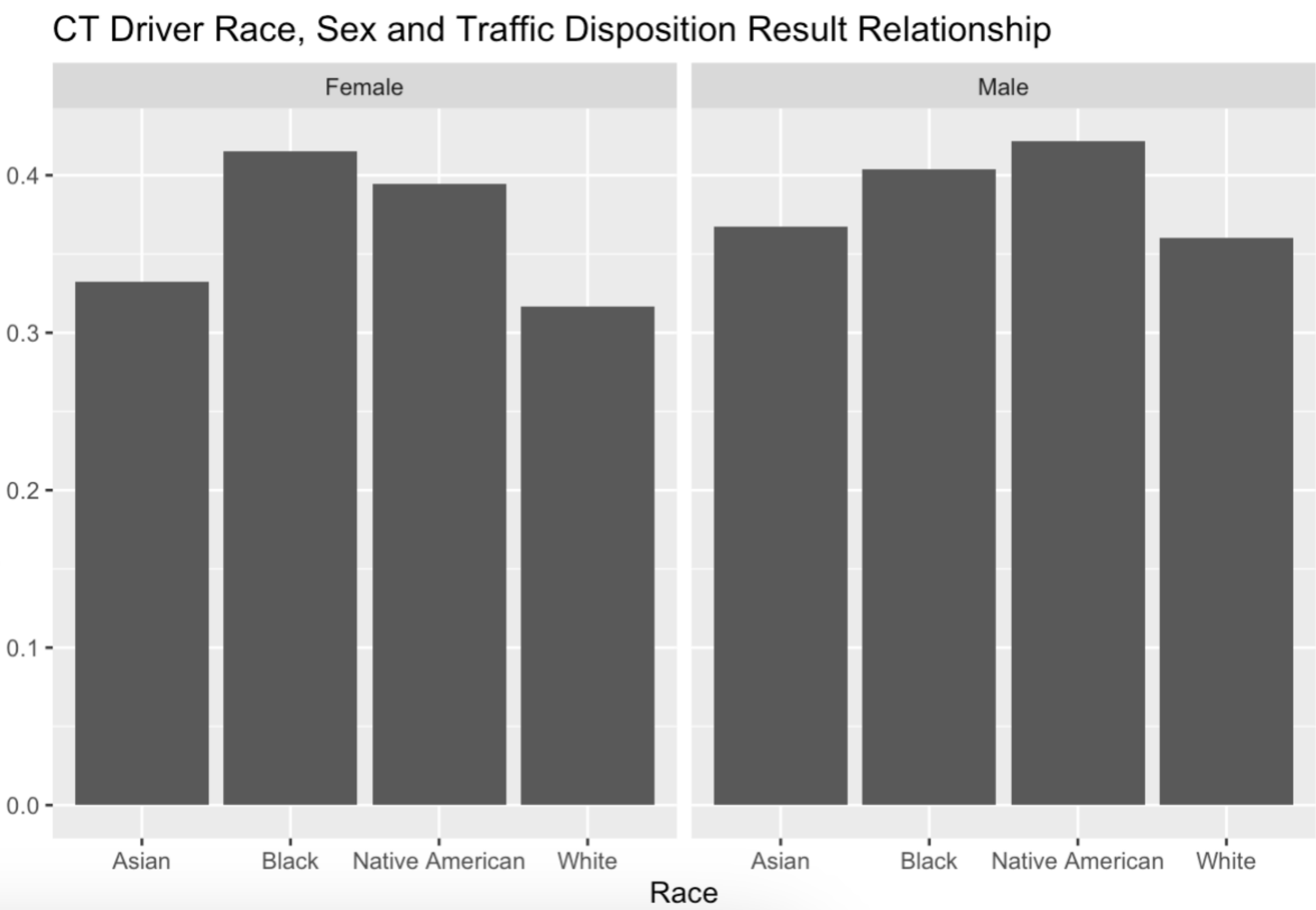


Figure 3: Traffic Stop Disposition Harshness for Asian, Black, Native American, and White drivers that are female vs. male.

Multivariate

- Logistic regression analyses showed that Black and Native American drivers significantly face harsher traffic stop dispositions compared to Asian drivers and White drivers (OR 1.307 and 1.39, respectively), ($p < 2.2e-16$).
- Logistic regression analysis also showed that male drivers significantly face harsher traffic stop dispositions compared to female drivers (OR 1.157), ($p = 0.003$).

Discussion

- Average traffic stop harshness was graphed on a scale from 0-1. The higher the average, the more that race or sex faced a harsher traffic stop disposition.
- These findings show Black and Native American drivers are more likely to face harsher traffic stop dispositions than White and Asian drivers in Connecticut.
- Male drivers are also more likely to face harsher traffic stop dispositions than female drivers across all races except Black drivers.
- Future efforts in Connecticut to curb disparities in traffic stops should also focus on decreasing the disparity in **traffic stop disposition harshness** between Black and Native American drivers vs. White and Asian drivers, particularly male drivers.

References

Ross, M. B., Kalinowski, J. J., & Ross, S. L. (2020). *Testing for disparities in traffic stops: Best practices from the Connecticut model*. *Criminology & Public Policy*, 19(4), 1067–1297. <https://doi.org/10.1111/1745-9133.12528>

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Parker, S. T., Ross, M. B., & Ross, S. L. (2024). *Driving change: Evaluating Connecticut’s collaborative approach to reducing racial disparities in policing* (NBER Working Paper No. w32692). National Bureau of Economic Research. <https://doi.org/10.3386/w32692>