Analysis of Hispanic-White Differences in Traffic Stops and

Searches in Greensboro, NC, 2002-2013

Frank R. Baumgartner, Derek Epp, and Kelsey Shoub[1]
University of North Carolina at Chapel Hill
Department of Political Science
http://www.unc.edu/~fbaum/traffic.htm

Contact: Frankb@unc.edu

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Table 1. Overview of the Data

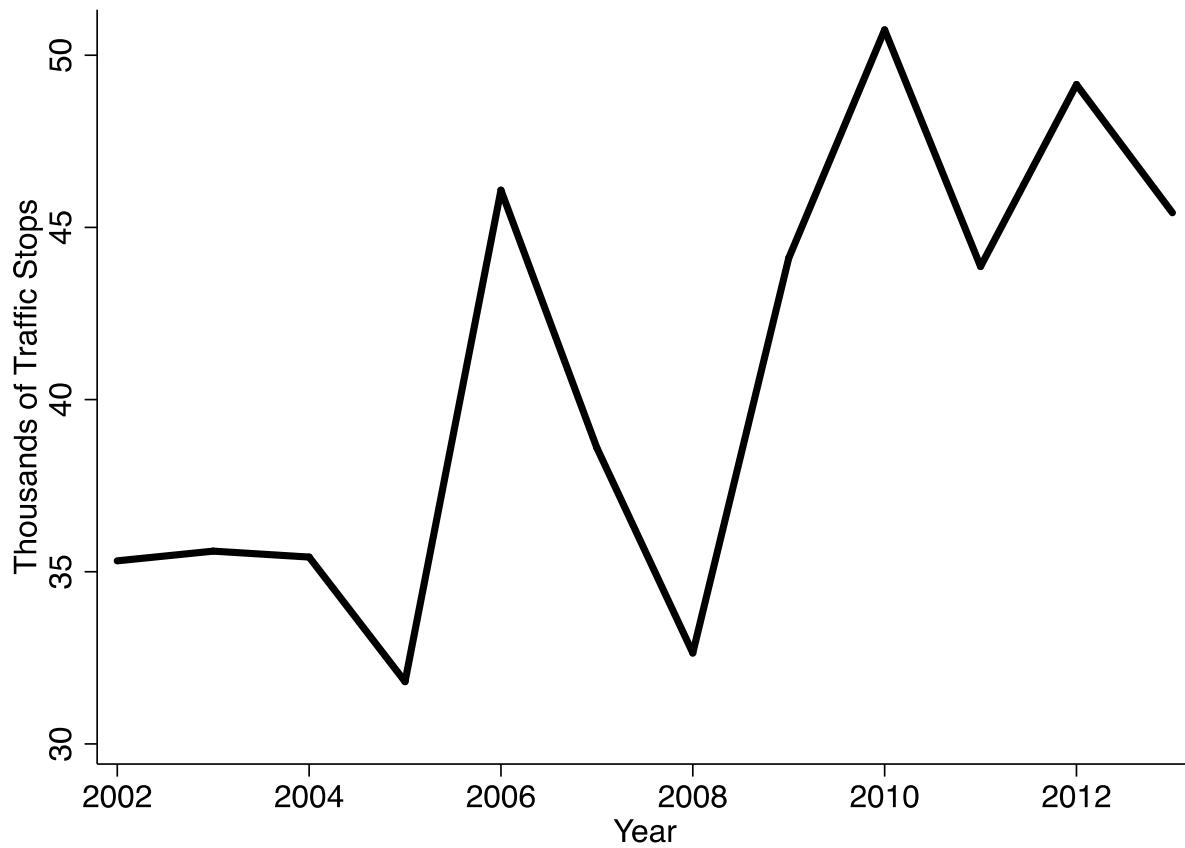| Data Subsets	Observations
Total stops	517,114
-2014	11,902
-Passengers	16,715
-Checkpoint stops	0
Stops for analysis	488,758
Searches	24,011

Search Rate = 4.91

Figure 1. Number of Traffic Stops per Year

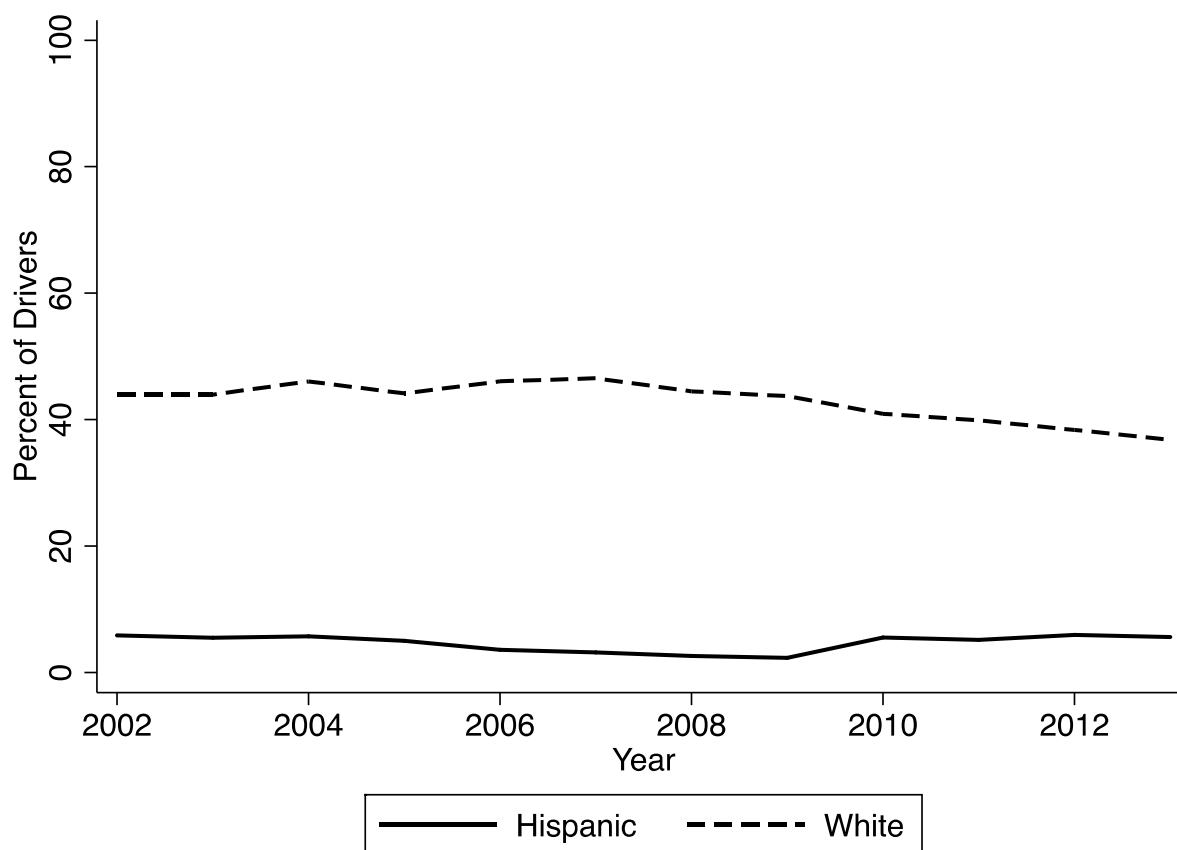Figure 2. Ethnic Composition of Traffic Stops by Year

Table 2. Ethnic Composition of Traffic Stops by Purpose, Drivers

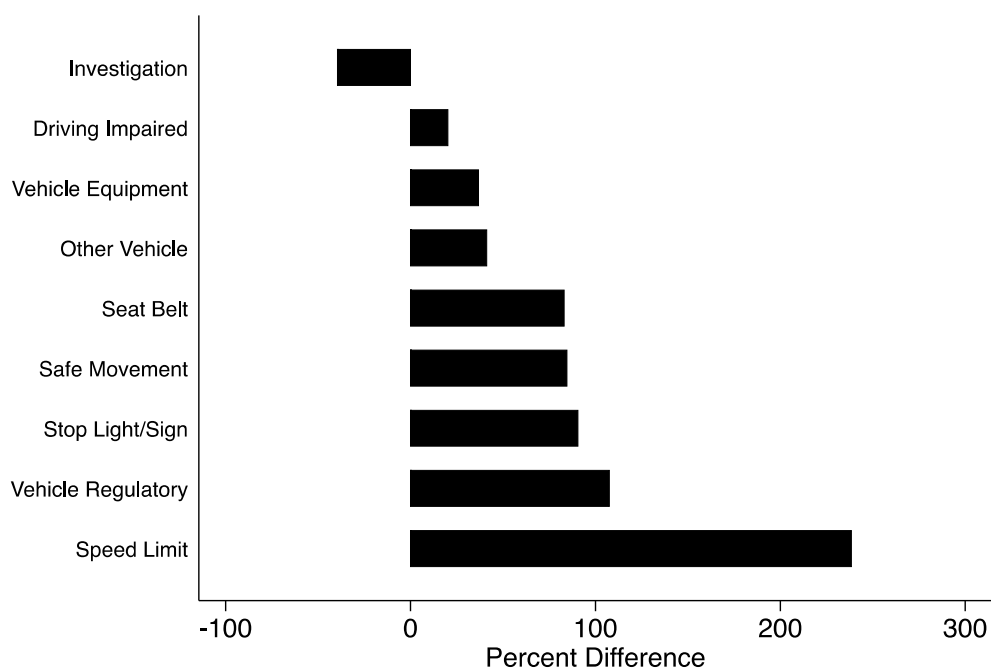|		Percent	
Purpose	Number	White	Hispanic
Total Stops	488,758	44.73	4.70
Speed Limit	205,185	53.94	3.83
Stop Light/Sign	27,590	45.06	5.37
Driving Impaired	2,030	51.64	12.81
Safe Movement	38,526	43.72	5.74
Vehicle Equipment	48,447	32.35	5.00
Vehicle Regulatory	101,405	37.01	4.00
Seat Belt	19,200	42.38	3.21
Investigation	30,084	32.11	9.95
Other Vehicle	16,287	44.73	6.70

Note: Includes only drivers. Excludes 0 checkpoint stops. Excludes 16,715 passengers.

Table 3. Percent Searched by Ethnicity and Purpose of Stop

|					Ratio
Purpose	Number	% Total	% White	% Hispanic	Hispanic:White
Total Stops	488,758	-	44.73	4.70	-
Total Searches	24,011	4.91	2.96	6.42	2.17
Speed Limit	205,186	1.71	1.03	3.49	3.39
Stop Light/Sign	27,590	4.49	2.76	5.26	1.91
Driving Impaired	2,030	42.61	46.72	56.15	1.20
Safe Movement	38,526	7.40	5.25	9.68	1.84
Vehicle Equipment	48,448	7.53	5.71	7.81	1.37
Vehicle Regulatory	101,406	5.19	3.02	6.27	2.08
Seat Belt	19,200	7.12	3.10	5.67	1.83
Investigation	30,085	12.98	11.44	6.92	0.60
Other Vehicle	16,287	8.36	5.19	7.33	1.41

Note: See the appendix for this same table broken down for Men and Women.

Figure 3. Difference in Likelihood of Being Searched, by Ethnicity and Type of Stop
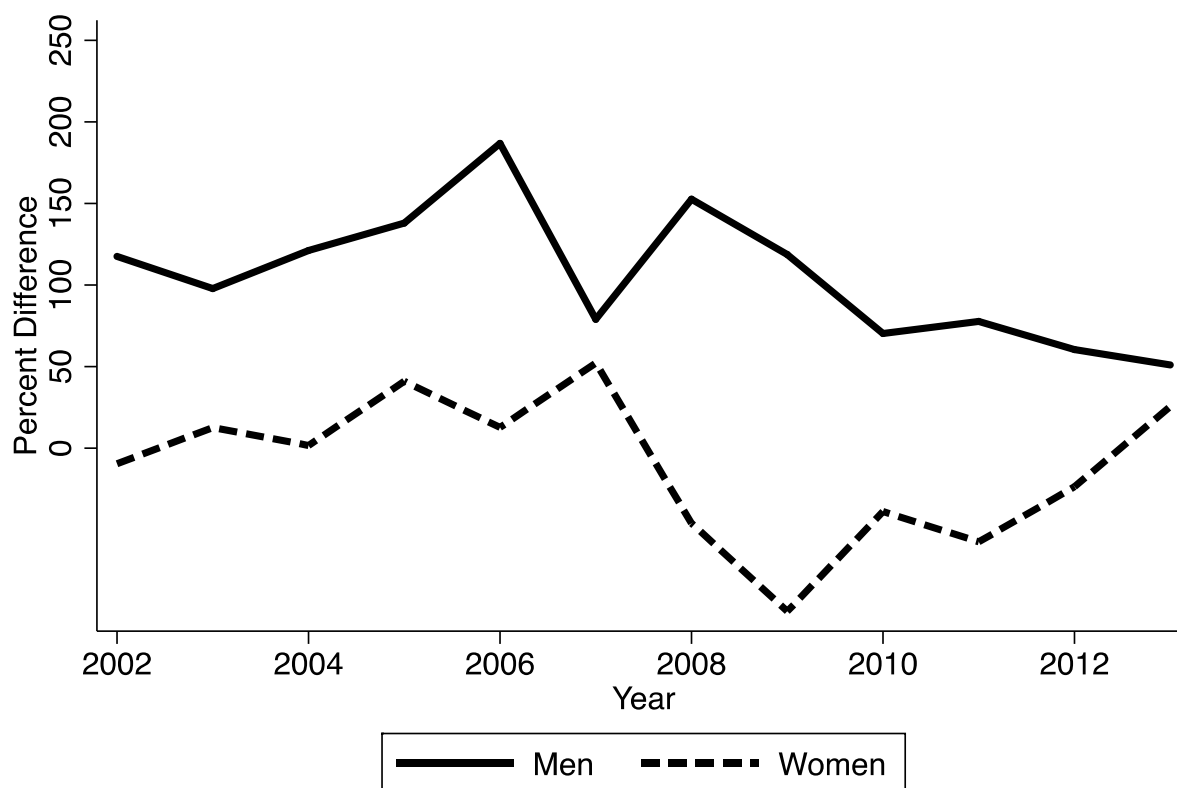

The figure shows the percentage difference in the likelihood of Hispanics being searched as compared to Whites by purpose of stop.

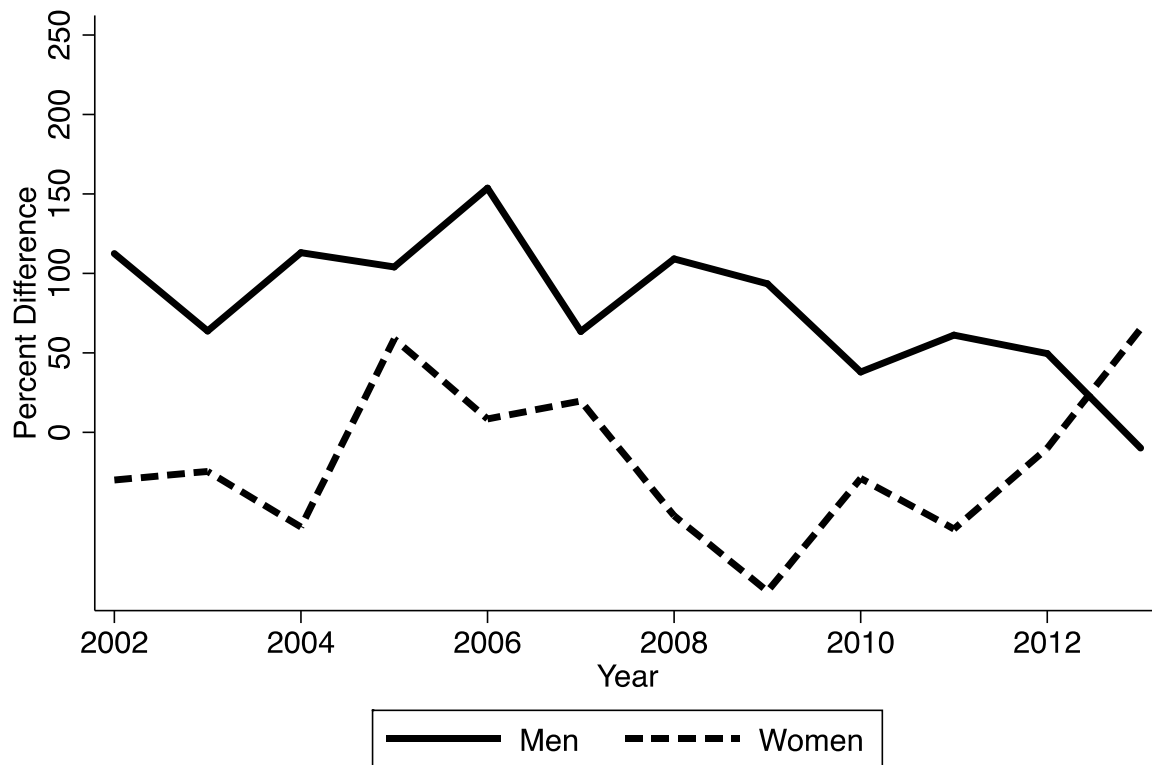Figure 4. Ethnic Differences in the Likelihood of Search
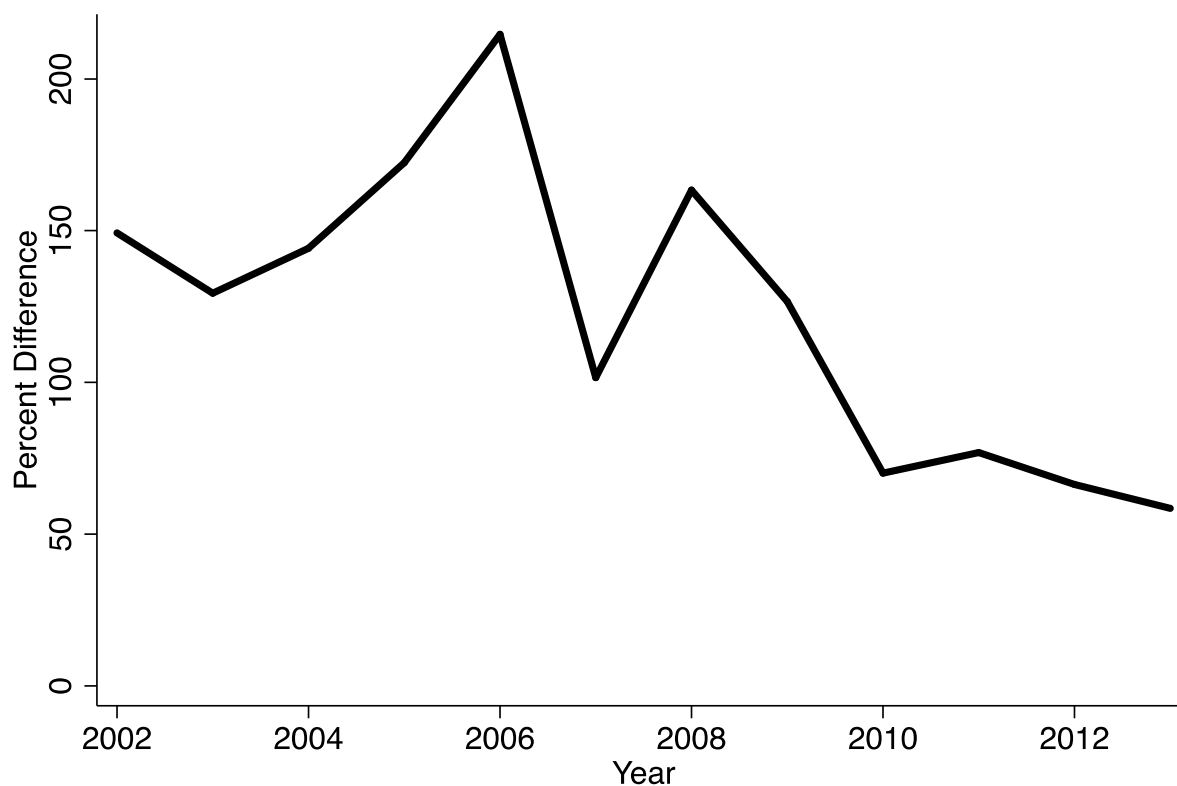
The figure shows the percentage difference in the likelihood of Hispanics being searched as compared to Whites.

Figure 5. Ethnic Differences in the Likelihood of Search by Gender

The figure shows the percentage difference in the likelihood of Hispanics being searched as compared to Whites by gender.

Figure 6. Ethnic Differences in the Liklihood of Search by Gender, for Drivers Under 30
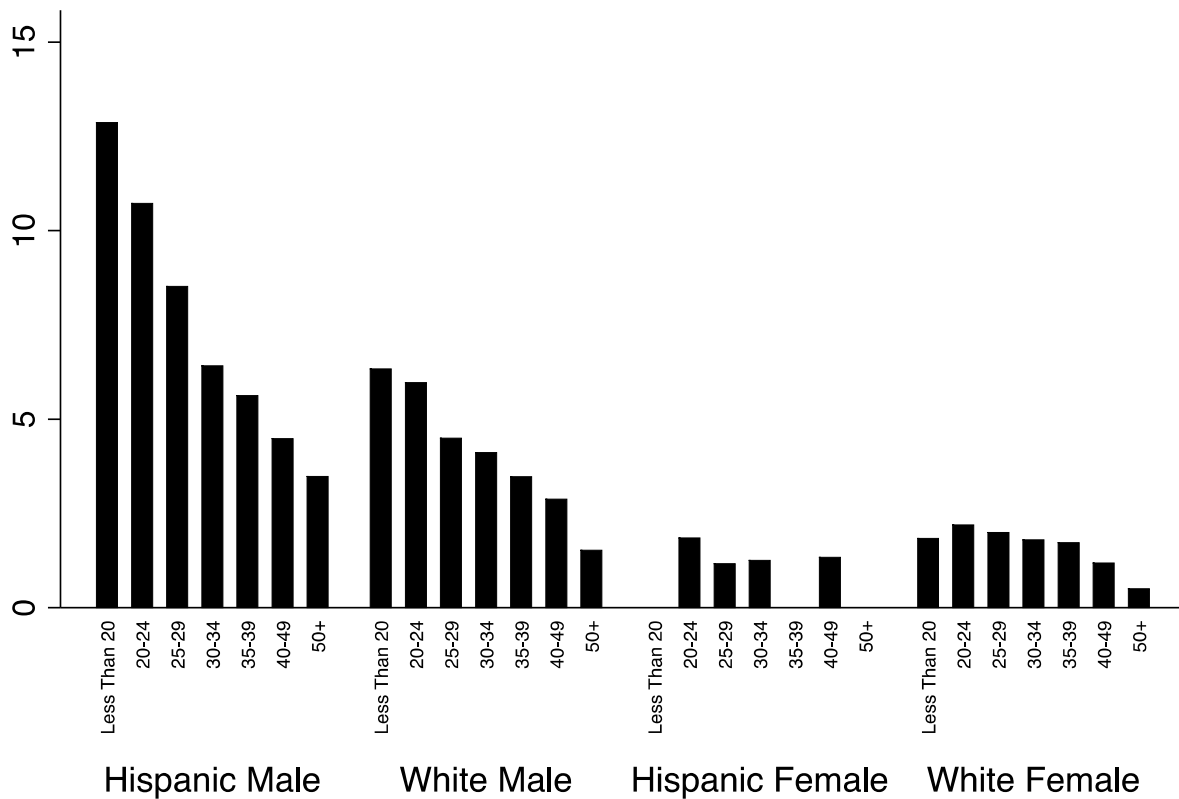

The figure shows the percentage difference in the likelihood of Hispanics being searched as compared to Whites by gender for motorists under 30.

Figure 7. Search Rates by Ethnicity, Gender, and Age Group

Based on 488,758 traffic stops from 2002 through 2013, and 24,011 searches. Overall rate of search: 4.91 percent.
No data are presented for categories with fewer than 10 searches.

Figure 8. Number of Stops, by Ethnicity and Gender
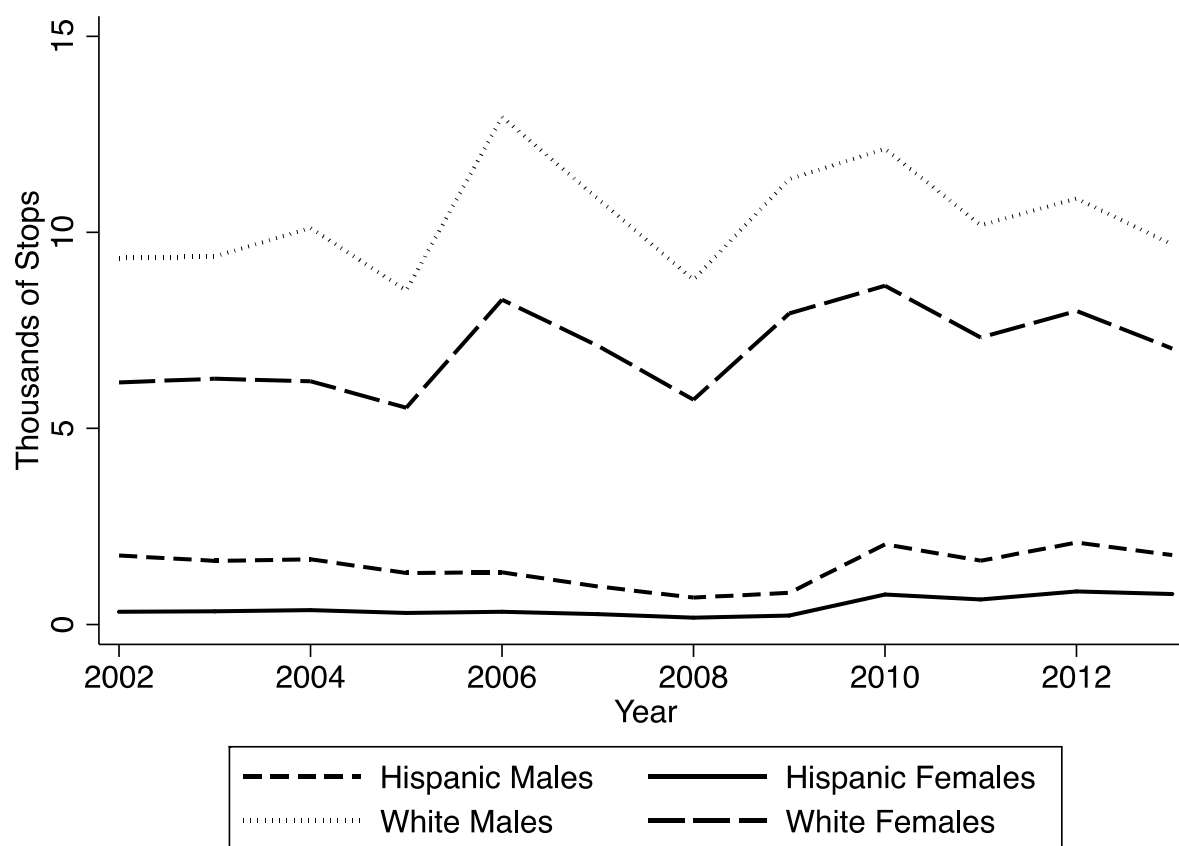
Figure 9. Percent of Stops Resulting in a Search, by Ethnicity and Gender
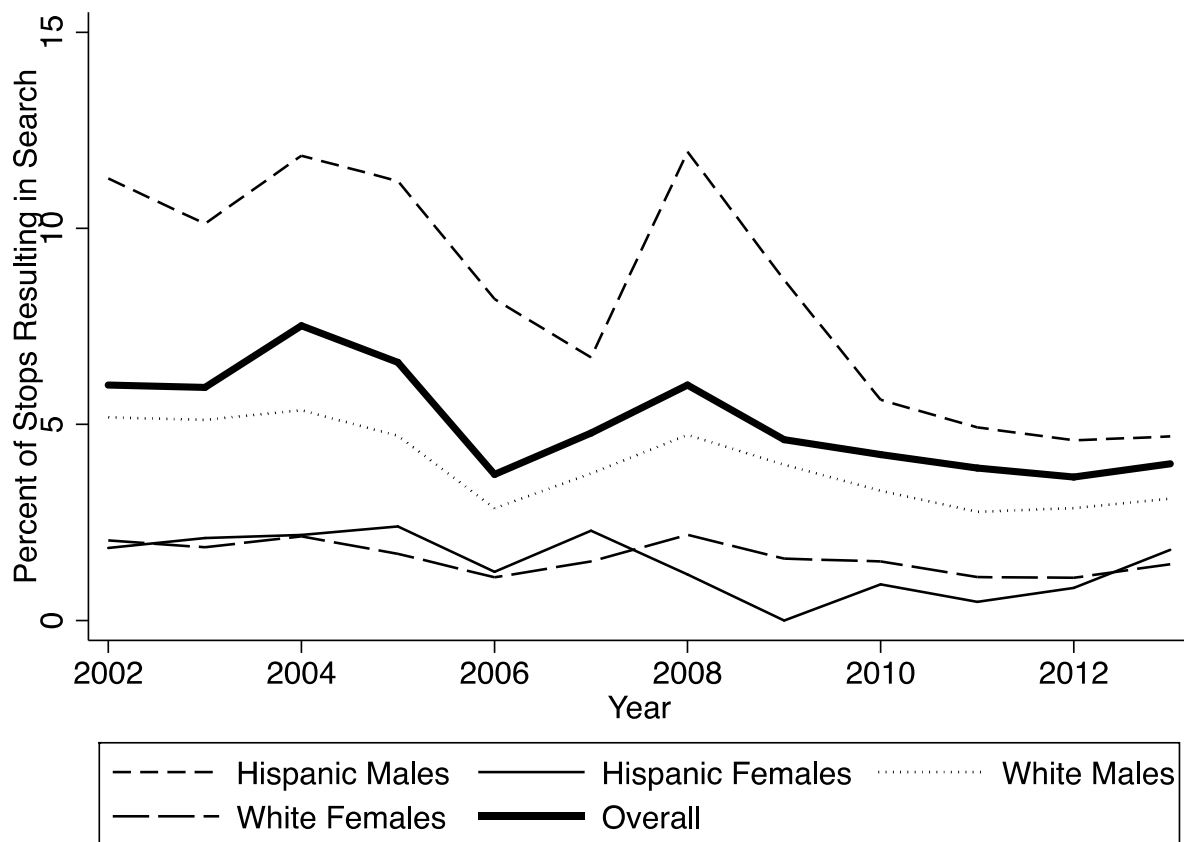
Table 4. Type of Search by Ethnicity

Search Type	Number	% Total	% White	% Hispanic	Ratio Hispanic:White
Total Stops	488,758	-	44.73	4.70	-
Total Searches	24,011	4.91	2.96	6.42	2.17
Consent	13,808	2.83	1.75	3.33	1.90
Search Warrant	41	0.01	0.01	0.03	3.00
Probable Cause	3,844	0.79	0.42	0.65	1.55
Incident to Arrest	5,746	1.18	0.73	2.23	3.05
Protective Frisk	572	0.12	0.06	0.18	3.00

Note: See the appendix for this same table separately for Men and Women.

Table 5. Distribution of Officer IDs by Stop

Number of Stops	Officers w/ this many Stops	Percent of Officers	Cumulative Percent	Percent of Stops	Cumulative Percent
1	3,071	55.71	55.71	0.63	0.63
2 – 10	1,404	25.47	81.18	1.03	1.66
11 - 100	373	6.77	87.95	2.90	4.56
101 – 1,000	577	10.47	98.42	48.08	52.64
1,001 +	87	1.58	100.00	47.35	100.00
Total		100	-	100	-

Figure 10. Number of Hispanic and White Motorists Stopped, by Officer
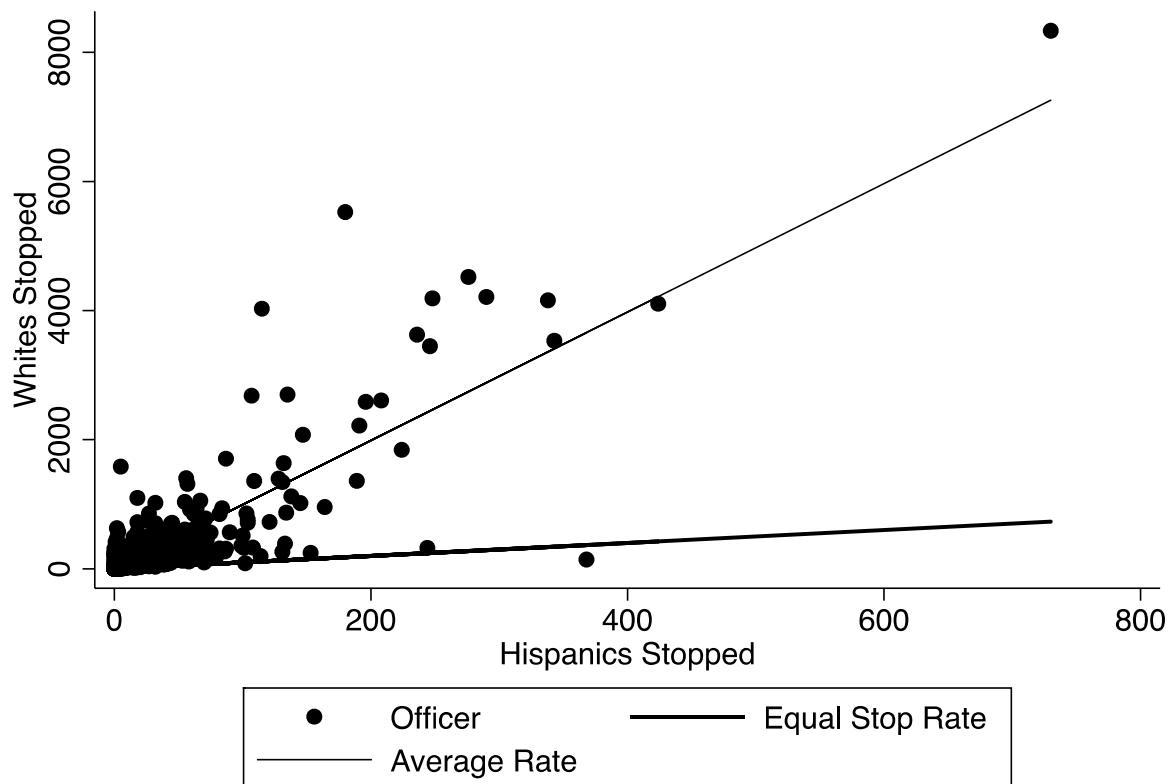
On average, officers stop 5.60 Whites for each Hispanic stopped.

Figure 11. Number of Hispanic and White Motorists Searched, by Officer
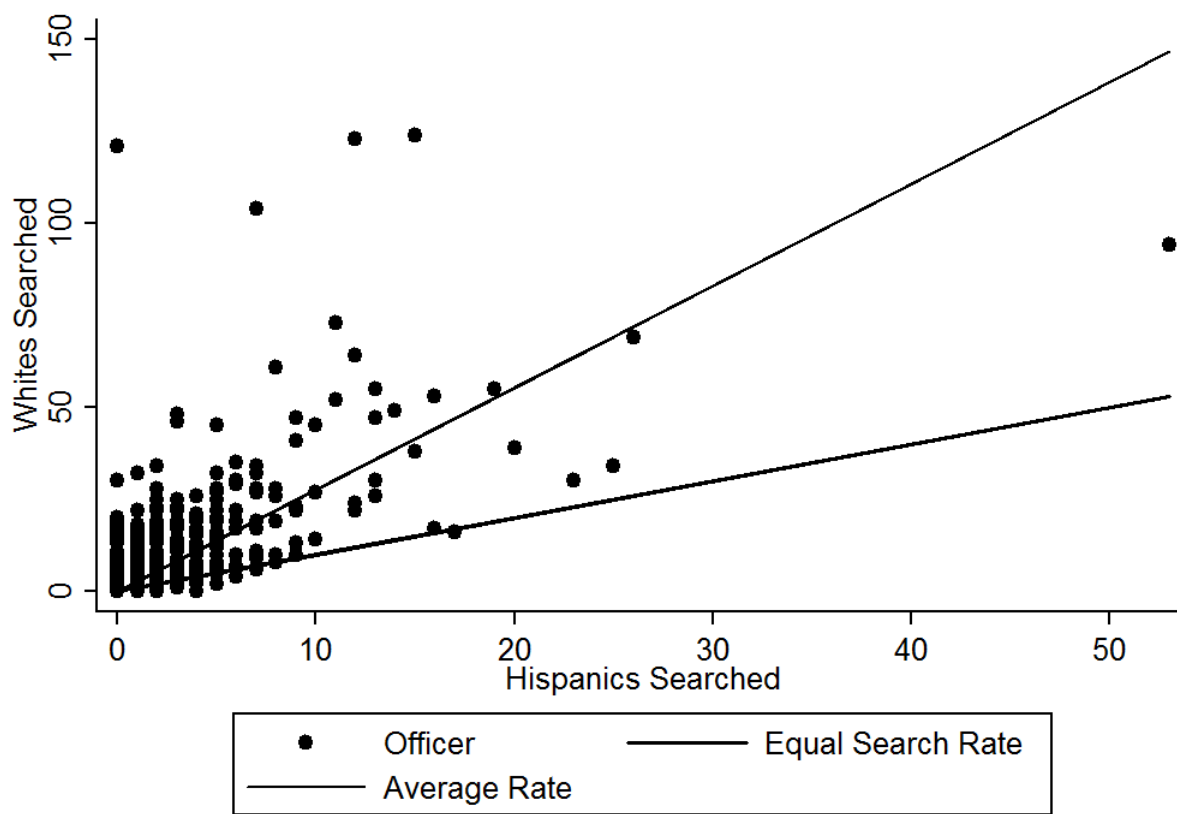
On average, officers search 2.77 Whites for each Hispanic searched.

Figure 12. Percent of White and Hispanic Drivers Searched, by Officer
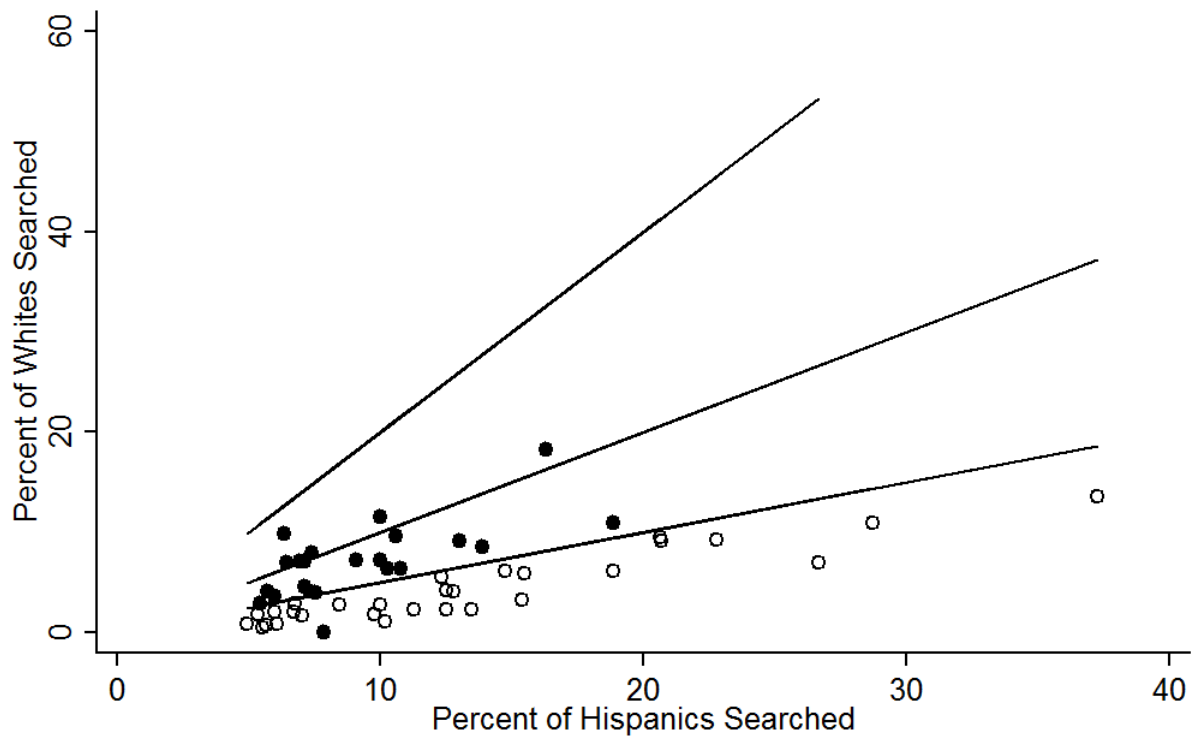
Includes 50 officers with a minimum of 50 White stops, 50 Hispanic stops, and a search rate above the department average of 4.91 for either ethnicity. The hollow circles indicate high disparity officers. 0 officers search Whites at more than twice the rate that they search Hispanics. 29 officers search Hispanics at more than twice the rate that they search Whites.

Appendix

Table A1. Ethnic Composition of Traffic Stops by Purpose, Passengers

Purpose	Number	Percent	
		White	Hispanic
Total Stops	16,715	25.38	5.49
Speed Limit	2,286	32.06	8.05
Stop Light/Sign	768	26.40	4.82
Driving Impaired	254	62.07	20.08
Safe Movement	2,099	29.80	6.62
Vehicle Equipment	2,588	23.39	4.83
Vehicle Regulatory	3,724	21.57	4.00
Seat Belt	1,069	19.65	3.37
Investigation	3,028	24.30	5.12
Other Vehicle	899	21.45	4.56

Table A2. Percent of Men Searched by Ethnicity and Purpose of Stop

Purpose	Number	% Total	% White	% Hispanic	Ratio Hispanic:White
Total Stops	297,349	-	44.39	5.94	0.13
Total Searches	20,378	6.85	3.90	7.96	2.04
Speed Limit	117,079	2.56	1.43	4.46	3.12
Stop Light/Sign	17,378	6.18	3.59	6.60	1.84
Driving Impaired	1,551	46.36	50.46	57.26	1.13
Safe Movement	25,281	9.68	6.49	11.47	1.77
Vehicle Equipment	31,535	9.77	7.16	9.01	1.26
Vehicle Regulatory	59,882	7.30	3.97	7.89	1.99
Seat Belt	13,177	9.50	4.16	6.44	1.55
Investigation	20,857	15.52	13.16	8.65	0.66
Other Vehicle	10,609	11.30	6.92	9.04	1.31

Table A3. Percent of Women Searched by Ethnicity and Purpose of Stop

Purpose	Number	% Total	% White	% Hispanic	Ratio Hispanic:White
Total Stops	191,405	-	45.25	2.78	0.06
Total Searches	3,633	1.90	1.56	1.34	0.86
Speed Limit	88,106	0.59	0.48	0.60	1.25
Stop Light/Sign	10,212	1.63	1.46	0.87	0.60
Driving Impaired	479	30.48	37.31	33.33	0.89
Safe Movement	13,245	3.04	3.13	2.84	0.91
Vehicle Equipment	16,912	3.33	3.30	3.20	0.97
Vehicle Regulatory	41,523	2.14	1.72	1.22	0.71
Seat Belt	6,023	1.93	1.13	2.94	2.60
Investigation	9,227	7.24	7.83	0.90	0.11
Other Vehicle	5,678	2.85	2.51	0.46	0.18

Table A4. Type of Search by Ethnicity: Men

Search Type	Number	% Total	% White	% Hispanic	Ratio Hispanic:White
Total Stops	297,349	-	44.39	5.94	0.13
Total Searches	20,378	6.85	3.90	7.96	2.04
Consent	11,853	3.99	2.33	4.09	1.76
Search Warrant	35	0.01	0.01	0.04	4.00
Probable Cause	3,249	1.09	0.56	0.79	1.41
Incident to Arrest	4,728	1.59	0.92	2.80	3.04
Protective Frisk	513	0.17	0.08	0.24	3.00

Table A5. Type of Search by Ethnicity: Women

Search Type	Number	% Total	% White	% Hispanic	Ratio Hispanic:White
Total Stops	191,405	-	45.25	2.78	0.06
8Total Searches	3,633	1.90	1.56	1.34	0.86
Consent	1,955	1.02	0.89	0.81	0.91
Search Warrant	6	-	-	-	-
Probable Cause	595	0.31	0.21	0.19	0.90
Incident to Arrest	1,018	0.53	0.44	0.34	0.77
Protective Frisk	59	0.03	0.02	-	-

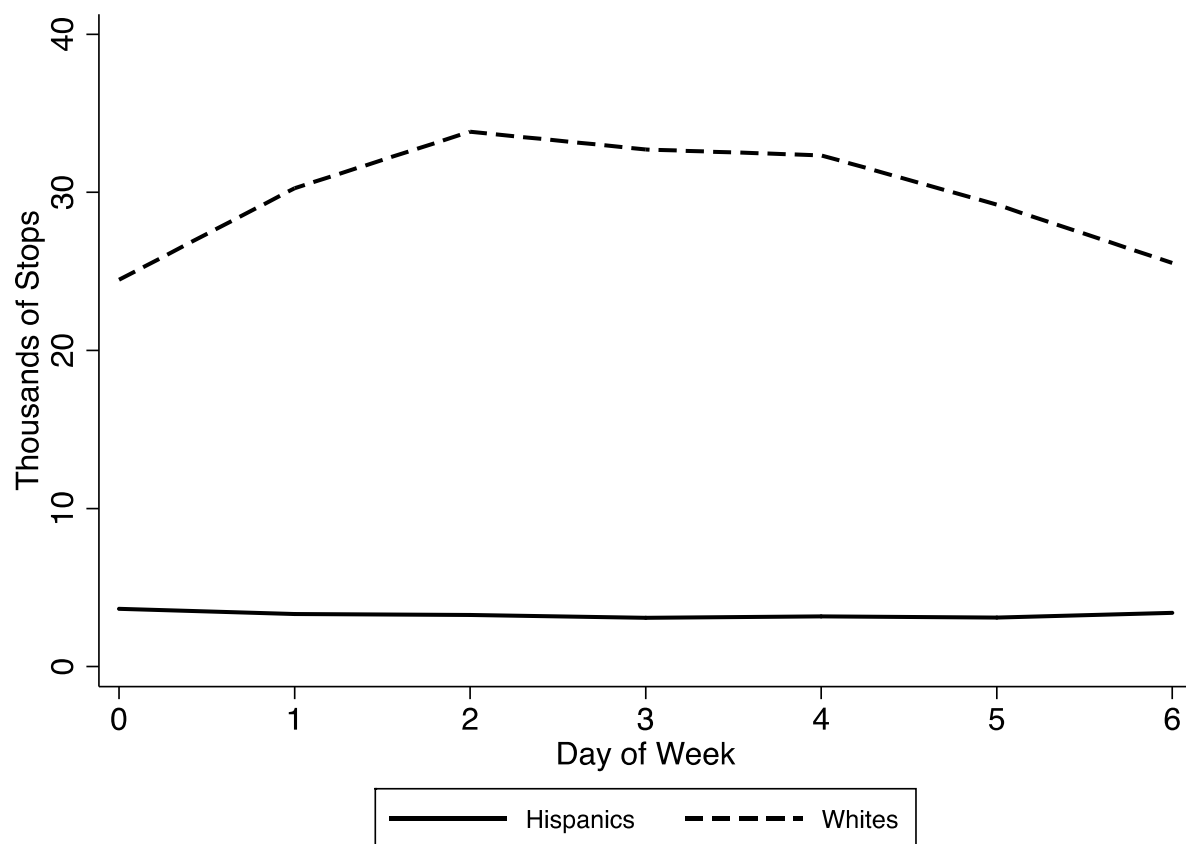Figure A1. Stops by Day of the Week
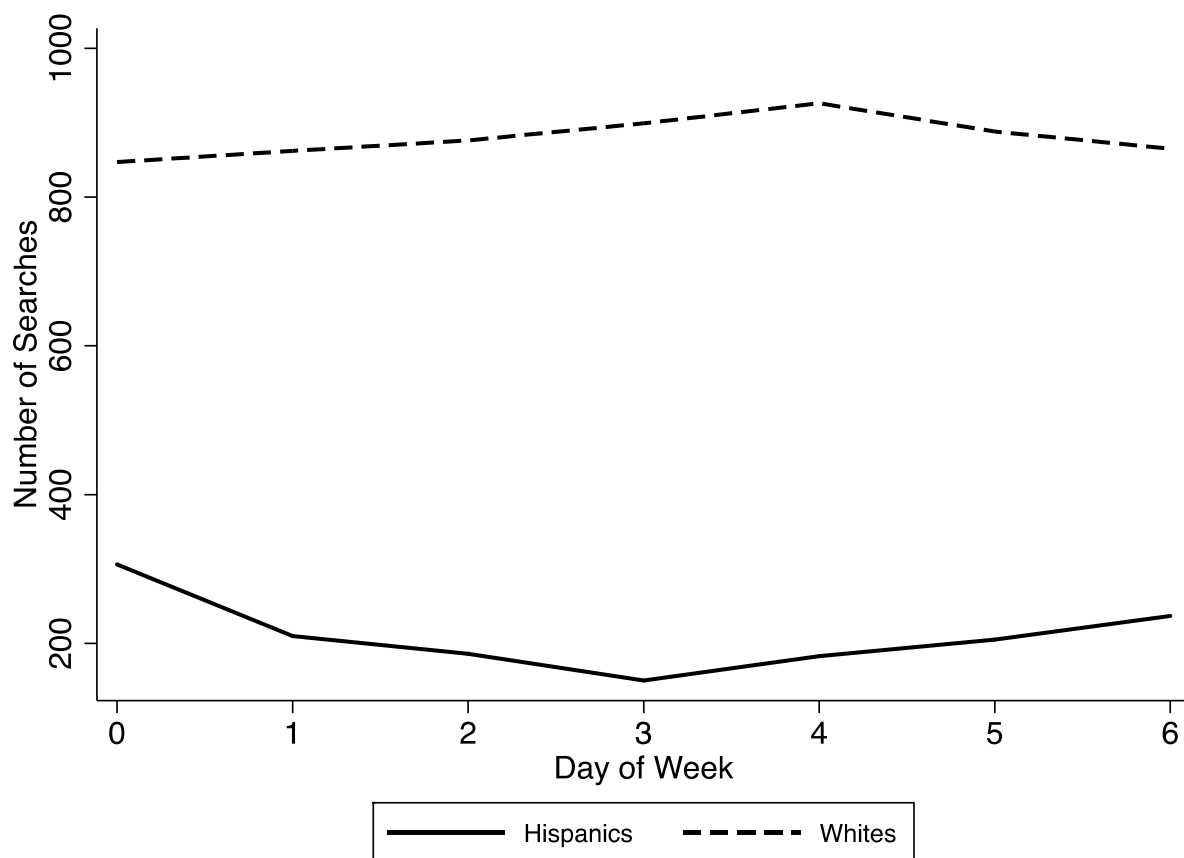
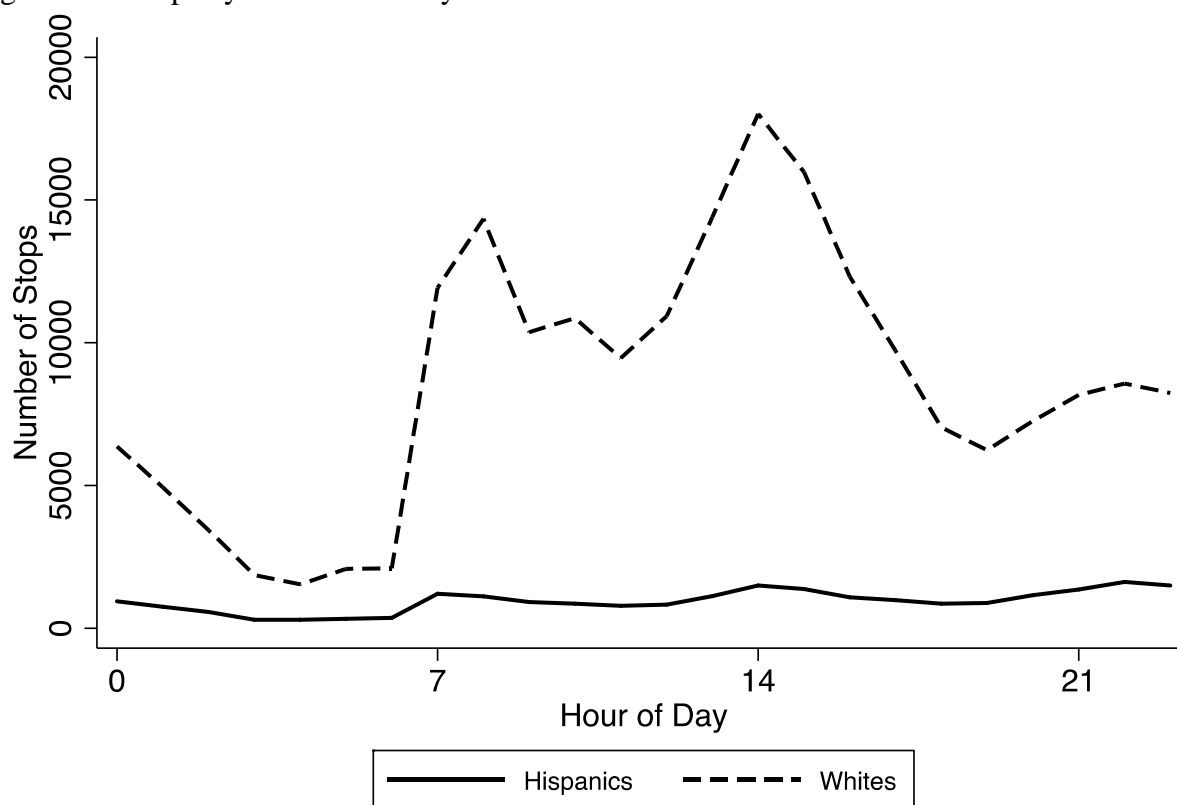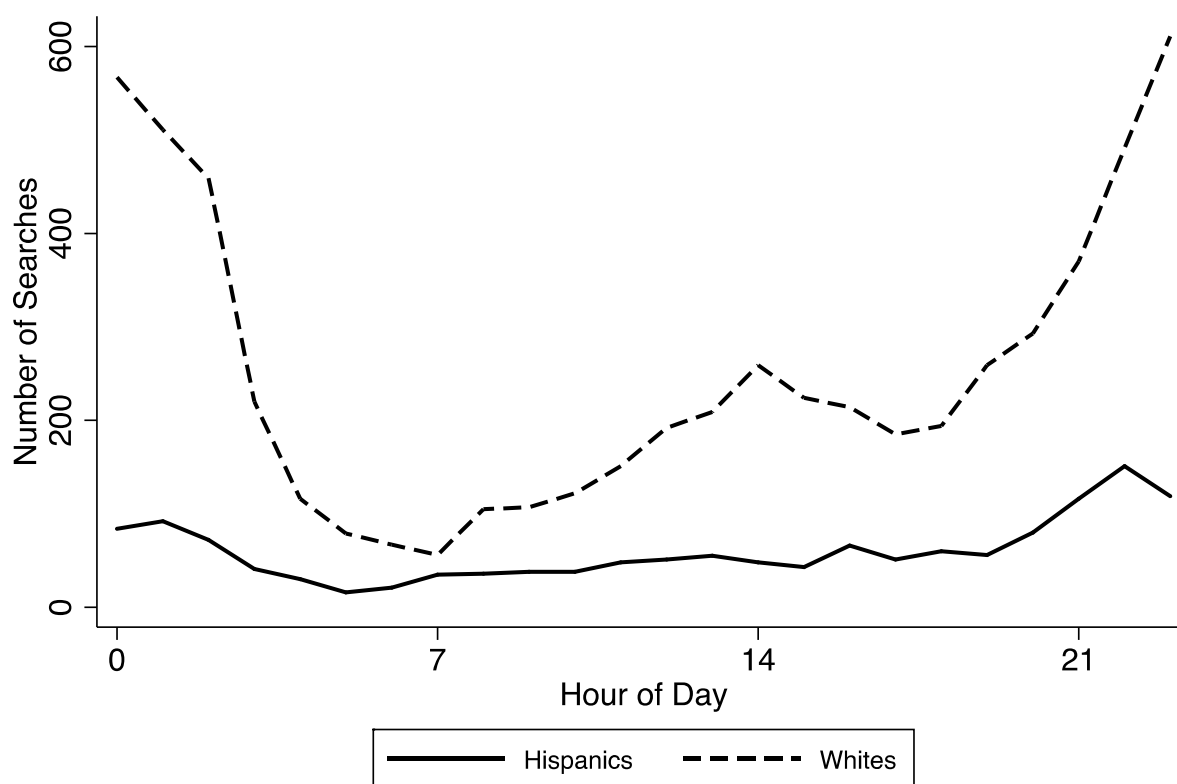Figure A2. Searches by Day of the Week

Figure A3. Stops by Hour of the Day

The figure excludes cases where the hour and minute was exactly 0:00.
These cases were presumed to be missing data.

Figure A4. Searches by Hour of the Day

The figure excludes cases where the hour and minute was exactly 0:00.
These cases were presumed to be missing data.

Figure A5. Ethnic Differences in the Likelihood of Search: Consent Searches Only
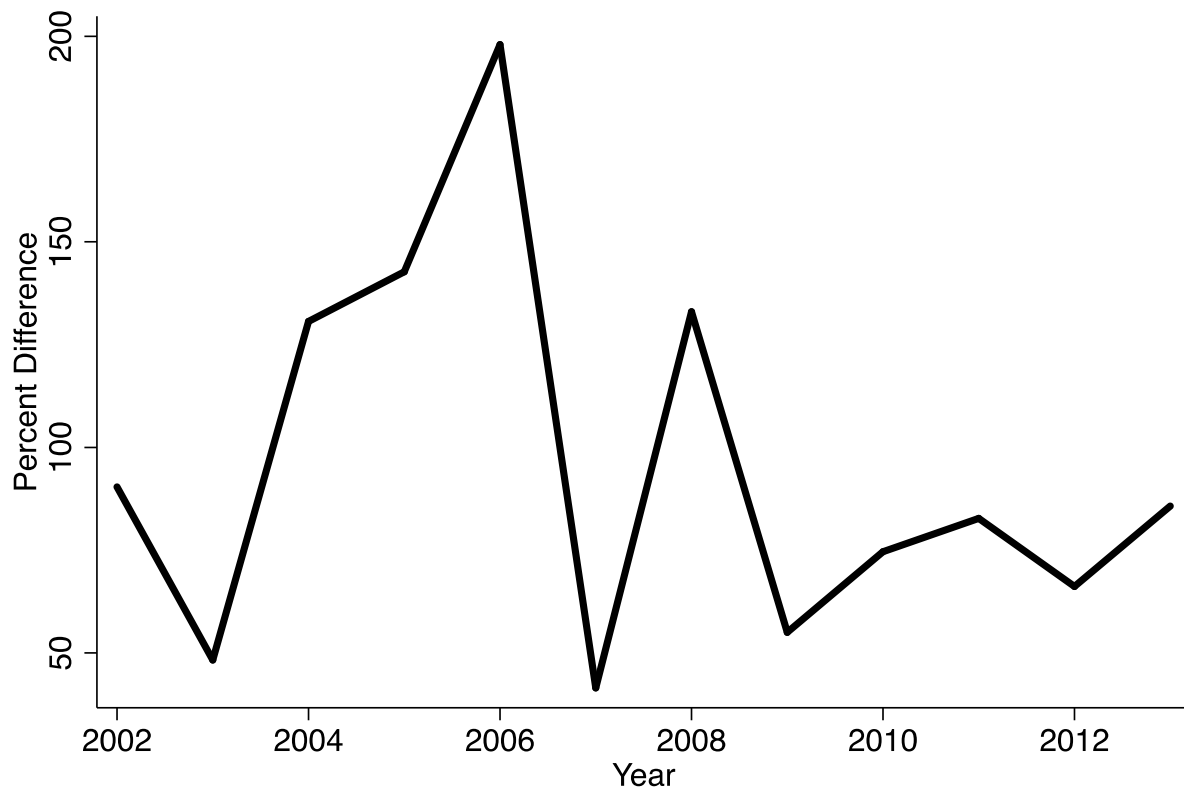
The figure shows the percentage difference in the likelihood of Hispanics being searched as compared to Whites; consent searches only.

Table A6. Likelihood of Finding Contraband Given a Search, by Ethnicity

Contraband	Number	% Total	% White	% Hispanic
Yes	6,799	28.32	30.39	19.16
No	17,212	71.68	69.61	80.84
Total	24,011	100.00	100.00	100.00

Table A7. Differential Outcomes by Whether or not a Search Occurs

Ethnicity	Search Occur	N	No Action	Verbal Warning	Written Warning	Citation Issued	Arrest	Total
White	No	202,192	2.29	26.87	6.44	63.95	0.45	100.0
Hispanic	No	21,512	2.90	23.21	3.60	69.18	1.11	100.0
Total	No	464,743	2.98	29.61	6.20	60.53	0.67	100.0
White	Yes	6,163	1.83	18.09	4.46	43.50	32.11	100.0
Hispanic	Yes	1,477	1.02	12.32	3.99	45.29	37.37	100.0
Total	Yes	24,011	1.87	17.62	4.08	45.83	30.60	100.0