# AWAKENING A SLEEPING GIANT: THE RIDDLE OF LATINO POLITICAL PARTICIPATION 

Thesis by<br>Tara L. Butterfield<br>In Partial Fulfillment of the Requirements<br>for the Degree of<br>Doctor of Philosophy

California Institute of Technology

Pasadena, California

Tara L. Butterfield
All Rights Reserved

## Acknowledgments

I thank all of the members of my committee, Professors Michael Alvarez, Rod Kiewiet, and Jonathan Nagler, for giving their time and expertise in making this a better work. If it were not for Professor Alvarez's prodding, I would not have come back after my maternity leave; if it were not for his willingness to allow me to change my dissertation topic, this particular work never would have been written. I am grateful to Professor Alvarez for giving me the freedom to begin this work and for believing that I could complete it. I also thank Garrett Glasgow, Fred Boehmke, and Professor Jan Leighley for their insightful comments when this work was in its earliest stage. Of course, I take full responsibility for the content and confess that any remaining errors are mine alone.

In addition, I thank the following teachers who helped me develop the skills necessary to research, write, and complete this work: Professor Michael Alvarez, Mrs. Barbara Archer, Mrs. Sharon Bayles, Professor Peter Bossarts, Professor Kim Border, Professor Jeffrey Dubin, Professor David Grether, Professor Phil Hoffman, Professor Ronald Lee, Professor John Ledyard, Professor Jonathan Katz, Professor Rod Kiewiet, Professor Richard McKelvey, Professor Peter Ordeshook, Professor Scott Page, Professor Robert Sherman, and Professor Simon Wilkie.

I thank Laurel Auchampaugh, the graduate assistant. Throughout my years at Caltech, she has been more than helpful and very supportive, which has enabled me to focus on my studies rather than on administrative details. In addition, I thank Garrett Glasgow, Anthony Kwasnica, Julie Smith Kwasnica, Christina Ramirez, and Reginald Roberts for their assistance and friendship during my graduate years at Caltech.

This work is dedicated to my husband Jim Poth, my child Meghan Kelley Mary Poth, and my parents Marion and Sherri Butterfield. Without my husband's and my parents' support, this work would not have been completed. My father gave me the self-confidence to pursue graduate studies. My mother unselfishly gave her time to watch Meghan for a year and a half so that I could finish my research and write my dissertation. My husband patiently understood when the wash wasn't done and dinner was late. And Meghan made me laugh even when my data set wasn't running and I thought I would never finish.

My dissertation is more because of the unique ways in which each one of these individuals taught, supported, questioned, prodded, encouraged, and, at times, applauded my efforts, and it would be less had they not done so.

## Abstract

For some time now, the Latino voice has been gradually gaining strength in American politics, particularly in such states as California, Florida, Illinois, New York, and Texas, where large numbers of Latino immigrants have settled and large numbers of electoral votes are at stake. Yet the issues public officials in these states espouse and the laws they enact often do not coincide with the interests and preferences of Latinos. The fact that Latinos in California and elsewhere have not been able to influence the political agenda in a way that is commensurate with their numbers may reflect their failure to participate fully in the political process by first registering to vote and then consistently turning out on election day to cast their ballots.

To understand Latino voting behavior, I first examine Latino political participation in California during the ten general elections of the 1980s and 1990s, seeking to understand what percentage of the eligible Latino population registers to vote, with what political party they register, how many registered Latinos to go the polls on election day, and what factors might increase their participation in politics. To ensure that my findings are not unique to California, I also consider Latino voter registration and turnout in Texas for the five general elections of the 1990s and compare these results with my California findings.

I offer a new approach to studying Latino political participation in which I rely on county-level aggregate data, rather than on individual survey data, and
employ the ecological inference method of generalized bounds. I calculate and compare Latino and white voting-age populations, registration rates, turnout rates, and party affiliation rates for California's fifty-eight counties. Then, in a secondary grouped logit analysis, I consider the factors that influence these Latino and white registration, turnout, and party affiliation rates.

I find that California Latinos register and turn out at substantially lower rates than do whites and that these rates are more volatile than those of whites. I find that Latino registration is motivated predominantly by age and education, with older and more educated Latinos being more likely to register. Motor voter legislation, which was passed to ease and simplify the registration process, has not encouraged Latino registration. I find that turnout among California's Latino voters is influenced primarily by issues, income, educational attainment, and the size of the Spanish-speaking communities in which they reside. Although language skills may be an obstacle to political participation for an individual, the number of Spanish-speaking households in a community does not encourage or discourage registration but may encourage turnout, suggesting that cultural and linguistic assimilation may not be the entire answer.

With regard to party identification, I find that Democrats can expect a steady Latino political identification rate between 50 and 60 percent, while Republicans attract 20 to 30 percent of Latino registrants. I find that education and income are the dominant factors in determining Latino political party
identification, which appears to be no more volatile than that of the larger electorate.

Next, when I consider registration and turnout in Texas, I find that Latino registration rates are nearly equal to those of whites but that Texas Latino turnout rates are volatile and substantially lower than those of whites.

Low turnout rates among Latinos and the volatility of these rates may explain why Latinos in California and Texas have had little influence on the political agenda even though their numbers are large and increasing. Simply put, the voices of Latinos are little heard in the halls of government because they do not turn out consistently to cast their votes on election day.

While these findings suggest that there may not be any short-term or quick fixes to Latino participation, they also suggest that Latinos should be encouraged to participate more fully in the political process and that additional education may be one means of achieving this goal. Candidates should speak more directly to the issues that concern Latinos. Political parties should view Latinos as crossover voters rather than as potential converts. In other words, if Latinos were "a sleeping giant," they may now be a still-drowsy leviathan waiting to be wooed by either party's persuasive political messages and relevant issues.

## Table of Contents

Chapter 1. Introduction: Latino Citizenship and Participation in California Politics ..... 1-26
Chapter 2. The Calculation of Latino Voter Registration and Turnout, 1980-1998 ..... 27-50
Chapter 3. The California White and Latino Voting-Age Populations ..... 51-66
Chapter 4. Latino and White Registration, 1980-1998 ..... 67-83
Chapter 5. Latino and White Turnout, 1990-1998 ..... 84-91
Chapter 6. The Future of Latino Political Participation in Los Angeles County ..... 92-98
Chapter 7. The Analysis of Registration and Turnout Rates, 1990-1998 ..... 99-116
Chapter 8. Latino and White Political Party Registration, 1990-1998 ..... 117-151
Chapter 9. Texas: Latino and White Registration and Turnout, 1990-1998 ..... 152-165
Chapter 10. Conclusion: Latino Citizenship and Participation in California and Texas ..... 166-179
References ..... 180-186
Appendix ..... 187-283
Applying the Method of Generalized Bounds to a Data Set: Registration Rates for Latinos in California During 1990 ..... 188-202
Tables ..... 203-283

## List of Figures and Tables

Figure 1. A Data Summary ..... 39
Figure 2. A Tomography Plot ..... 40
Figure 3. A Truncated Bivariate Normal Surface Plot ..... 41
Table 1a. Latino and White VAP as a Percent of Total VAP, 1980-1988 ..... 56
Table 1b. Latino and White VAP as a Percent of Total VAP, 1990-1998 ..... 58
Table 2a. Latino and White VAP as Percent of Total VAP, 1980-1988: California's Top 10 Producing Agricultural, or Rural, Counties ..... 60
Table 2b. Latino and White VAP as a Percent of Total VAP, 1990-1998: California's Top 10 Producing Agricultural, or Rural, Counties ..... 61
Table 3a. Latino and White VAP as a Percent of Total VAP, 1980-1988: Urban Counties with Latino VAP > 0.20 ..... 63
Table 3b. Latino and White VAP as a Percent of Total VAP, 1990-1998: Urban Counties with Latino VAP > 0.20 ..... 64
Table 4a. Latino and White Voter Registration, 1980-1988 ..... 68
Table 4b. Latino and White Voter Registration, 1990-1998 ..... 70
Table 5a. Latino and White Voter Registration, 1980-1988: California's Top 10 Producing Agricultural, or Rural, Counties ..... 73
Table 5b. Latino and White Voter Registration, 1990-1998: California's Top 10 Producing Agricultural, or Rural, Counties ..... 74
Table 6a. Latino and White Voter Registration, 1980-1988:
Urban Counties with Latino VAP > 0.20 ..... 76
Table 6b. Latino and White Voter Registration, 1990-1998:
Urban Counties with Latino VAP > 0.20 ..... 77
Table 7a. Latino and White Voter Registration, 1980-1988, Classified by County Latino VAP Percentage ..... 80
Table 7b. Latino and White Voter Registration, 1990-1998 Classified by County Latino VAP Percentage ..... 81
Table 8. Latino and White Turnout, 1990-1998 ..... 85
Table 9. Latino and White Voter Turnout, 1990-1998: California's Top 10 Producing Agricultural, or Rural, Counties ..... 88
Table 10. Latino and White Turnout, 1990-1998:
Urban Counties with Latino VAP > 0.20 ..... 89
Table 11. Latino and White Turnout, 1990-1998, Classified by County Latino VAP Percentage ..... 91
Figure 4. Los Angeles County Latino Registration, 1998-2020 ..... 96
Figure 5. Los Angeles County Latino Turnout, 1998-2020 ..... 97
Table 12. Grouped Logit Analysis of Latino and White Registration Rates for California Counties ..... 106
Table 13. Grouped Logit Analysis of Latino and White Turnout Rates for California Counties ..... 111
Table 14a. Latino Voter Registration by Political Party, 1990-1998 ..... 124
Table 14b. White Voter Registration by Political Party, 1990-1998 ..... 125
Table 15a. Latino Voter Registration by Political Party, Democrat, 1990-1998: California's Top 10 Producing Agricultural, or Rural, Counties ..... 127
Table 15b. White Voter Registration by Political Party, Democrat, 1990-1998: California's Top 10 Producing Agricultural, or Rural, Counties ..... 128
Table 16a. Latino Voter Registration by Political Party, Republican, 1990-1998: California's Top 10 Producing Agricultural, or Rural, Counties ..... 129
Table 16b. White Voter Registration by Political Party, Republican, 1990-1998: California's Top 10 Producing Agricultural, or Rural, Counties ..... 130
Table 17a. Latino Voter Democratic Party Registration, 1990-1998: Urban Counties with Latino VAP $>0.20$ ..... 131
Table 17b. White Voter Democratic Party Registration, 1990-1998: Urban Counties with Latino VAP $>0.20$ ..... 132
Table 18a. Latino Voter Republican Party Registration, 1990-1998: Urban Counties with Latino VAP $>0.20$ ..... 133
Table 18b. White Voter Republican Party Registration, 1990-1998: Urban Counties with Latino VAP $>0.20$ ..... 134
Table 19. Grouped Logit Analysis of Latino Political Party Registration Rates for California Counties ..... 141
Table 20. Grouped Logit Analysis of White Political Party Registration Rates for California Counties ..... 148
Table 21. Texas Latino and White VAP as a Percent of Total VAP, 1990-1998 ..... 157
Table 22. Texas Latino and White Voter Registration, 1990-1998 ..... 161
Table 23. Texas Latino and White Voter Turnout, 1990-1998 ..... 163
Figure A1. California Latino Registration 1990, Scattercross Plot ..... 192
Figure A2. California Latino Registration 1990, Plot of Deterministic Bounds by County ..... 194
Figure A3. California Latino Registration 1990, Scatter Plot with Goodman's Regression Line ..... 196
Figure A4. California Latino Registration 1990, Tomography Plot ..... 197
Figure A5. California Latino Registration 1990, Plot of Deterministic Bounds by $\mathrm{X}_{i}$ ..... 199
Figure A6. California Latino Registration 1990, Tomography Plot with Contours ..... 201
Figure A7. California Latino Registration 1990, Plot of Deterministic Bounds with ei estimates ..... 202
Table A1. Latino and White VAP as a Percent of Total VAP, 1980-1988 ..... 203-205
Table A2. Latino and White VAP as a Percent of Total VAP, 1990-1998 ..... 206-208
Table A3. Latino and White Voter Registration, 1980-1988 ..... 209-213
Table A4. Latino and White Voter Registration, 1990-1998 ..... 214-218
Table A5. Latino and White Voter Turnout, 1990-1998 ..... 219-223
Table A6. Latino Voter Registration by Party, 1990-1998 ..... 224-228
Table A7. White Voter Registration by Party, 1990-1998 ..... 229-233
Table A8. Texas Latino and White VAP as a Percent of Total VAP, 1990-1998 ..... 234-243
Table A9. Latino and White Voter Registration in Texas, 1990-1998 ..... 244-263
Table A10. Latino and White Voter Turnout in Texas, 1990-1998 ..... 264-283

## Chapter 1. Introduction: Latino Citizenship and Participation in California Politics

For some time now the Latino voice has been gradually gaining strength in American politics and finding an increasingly receptive audience among American politicians. In such states as California, Florida, Illinois, New York, and Texas, where large numbers of electoral votes are at stake, immigration of new Latino residents and births among existing Latino residents are increasing the Latino population to the level of a critical political mass, one that candidates and parties must reckon with. As a consequence, during the 2000 presidential election, both Democrats and Republicans took note of the Latino interest in education, concern about job opportunities, and emphasis on family values and wrote platforms containing planks to address these concerns and appeal to this increasingly important constituency. However, once the conventions were over and the spotlight shifted to campaigning, both major political parties chose largely to ignore the Latino electorate. ${ }^{1}$

Although the Latino influence on American politics is evident in several states, nowhere is it more apparent than in California. The Golden State shares a border with Mexico and was under Mexican rule from 1822 until the signing of

[^0]the Treaty of Guadalupe Hidalgo ended the Mexican War in $1848 .{ }^{2}$ As a result, for nearly two hundred years, the economic destinies of California and Mexico have been inextricably intertwined. In good times and bad, California has reached deep into Mexico for the cheap labor needed to support its agricultural industry, and Mexican laborers and their families have immigrated to California seeking jobs in its fields and factories, education in its schools, and opportunity in its cities and countryside.

During the past century, many Californians have viewed these immigrants as second-class citizens whom they welcomed in their fields but were reluctant to admit to full participation in the political process. This view is changing because of the numbers of Mexican and other Latino immigrants who live in California. The Golden State is home to more than one-third of the United States Latino population, and this population is increasing rapidly. ${ }^{3}$ In 1990, the statewide population of Latinos was 7.8 million; by 2000, this number had risen
${ }^{2}$ This treaty set the Rio Grande as the new boundary of the United States of America and granted this country territory comprising the present states of California, Nevada, Utah, New Mexico, Arizona, and parts of Wyoming and Colorado. Two years later, on September 9, 1850, California became the thirtyfirst state to enter the union.
${ }^{3}$ The words Hispanic and Latino have been used interchangeably in the literature to name a person of Latin-American origin living in the United States. For the sake of consistency, I have chosen to use the word Latino throughout this paper, except, of course, when I am quoting directly from another source.
to more than 10.7 million, 31 percent of California's population. ${ }^{4}$ Within the next few decades, Latinos will constitute the largest single racial/ethnic group in the state. Because most of this increase will be the result of births in California, not immigration, the vast majority of these Latinos will be entitled to all rights of citizenship, including both registering to vote and casting their ballots.

This dramatic increase in population suggests that Latinos may soon enjoy the increase in political power that has eluded them thus far. During the 1990s, the issues discussed in California's state capital and the initiatives passed in its precincts concerned eliminating affirmative action in public hiring and school admissions, denying public education and health care to the children of illegal immigrants, and eliminating bilingual education. Because these issues do not reflect the Latino agenda and may, in fact, be contrary to it, they provide evidence that the political power of Latinos has not been commensurate with their numbers (de la Garza, 1996; Uhlaner, 1996; Verba et al., 1995). Additional evidence comes from Capitol Hill, where legislative actions taken by both major political parties during 2000 have ignored key legislative priorities of Latino immigrants. This continuing discrepancy between large population figures and

[^1]minimal political influence is the riddle my research seeks to solve, and the solution may lie in explaining why Latinos fail to participate fully in the political process.

In a representative democracy, voting is both the primary means by which citizens acquire political power and the fundamental way in which they exercise it. Yet, researchers have repeatedly found relatively low voter turnout rates among Latinos. For example, Uhlaner, Cain, and Kiewiet observed that in California only 60 percent of the eligible Latinos voted in 1984, compared with 76 percent of their white counterparts (Uhlaner et al., 1989). Participants in the electoral process are predominantly white, middle-aged or older, employed, of higher income, and of higher educational attainment. ${ }^{5}$ As a result, many elected officials "are not descriptively representative of the populations from which they are drawn. Instead, they are more likely to be male, affluent, educated, and of the dominant racial and ethnic groups" (Verba et al, 1995, p. 165), which may help to explain why the issues these public officials espouse and the laws they enact often do not coincide with the interests and preferences of Latinos.

[^2]But the issues of immigration and affirmative action may have awakened what some political observers have called "a sleeping giant" and energized previously apathetic Latino voters, causing many young Latinos to express their political opinions by demonstrating and many Latino immigrants to become citizens and acquire the right to vote. ${ }^{6}$ For example, the Marchistas walked from Sacramento to San Diego to protest Proposition 209, the initiative to prohibit preferential treatment on the basis of race, sex, ethnicity, or national origin in public employment, education, and contracting; and youth leaders in the Movimiento Estudiantil Chicano de Aztlan (MEChA) in San Diego County organized demonstrations against Proposition 187, the initiative to deny certain publicly funded social and health care services to illegal immigrants and to prevent their enrollment in tax-supported educational institutions. At the time of the 1997 mayoral election in Los Angeles, one in three adult residents was not a citizen. Now, nearly half of the 25,000 citizenship applications received by the Los Angeles district office of the Immigration and Naturalization Service (INS) each month are from Latinos.

Thus, the balance of political power may be shifting. There is growing anecdotal evidence that Latino participation and influence in California politics are increasing. For example, in 1996, Sally Morales Havice (East Los Angeles),

[^3]Deborah Ortiz (Sacramento), and Tony Cardenas (San Fernando Valley) were all elected to the state Assembly. Also in 1996, Cruz Bustamante, a Democrat from Fresno, became the first Latino speaker of the Assembly; he was succeeded in February 1998 by another Latino, Antonio Villaraigosa, a Democrat from Los Angeles. Likewise in 1996, Democrat Loretta Sanchez became the first Latina to represent Orange County in the nation's capital when she defeated Republican Bob Dornan in California's $46^{\text {th }}$ Congressional District. Further evidence that Latino political power is increasing came in November 1998, when Representative Sanchez was reelected to this congressional seat and Cruz Bustamante was elected lieutenant governor of California, thereby becoming the first Latino elected to office by statewide vote in more than one hundred years. Currently, a Latino caucus of nineteen California legislators has been flexing its political muscle in Sacramento, and Antonio Villaraigosa is vying to become the first Latino mayor of Los Angeles in modern times.

This research examines Latino participation in California politics. Through this research, I hope to gain an understanding of what percentage of the eligible Latino population registers to vote, with what political party they register, how many registered Latinos go to the polls on election day, what factors might increase their participation in politics, and whether increased political participation will lead to greater political power for Latinos.

## Case Study

I focus on Latino political participation in the state of California, thereby making this work a case study. As with any case study, this approach will allow a better and more in-depth understanding of the subject-in this case, Latino registration and turnout in California-but at the expense of applicability to the larger population. In this instance, the benefit of focusing on California is the ability to use aggregate instead of survey data, which allows the study of Latino participation over a longer period of time than before and should guarantee more accurate results and findings.

The methodological literature has warned against attempting to rely on one observation or case to empirically test political theories because of the mistake of causal inference and the danger of making inappropriate comparisons (King et al., 1994, Chapter 6). To avoid the first problem, I select the county as my unit of analysis, thereby increasing the number of observations from one to fifty-eight. To avoid the second problem, I broaden my study to include Latino registration and turnout during the 1990s in the state of Texas, which is similar to California in that it has a large Latino population that is predominantly Mexican American and shares a border with Mexico.

In addition, studying Latino political participation in California during these ten elections (1980-1998) affords me an opportunity to test the importance of a variety of different influences on Latino participation including initiatives and a change in the federal voter registration law. For example, I can consider the
effects of Proposition 187, the anti-immigrant initiative, and Proposition 209, the anti-affirmative action initiative, on Latino registration and turnout. Although these initiatives may be unique to California, the question of whether or not divisive issues and propositions can mobilize Latinos is not. I can also consider how the implementation of federal "motor voter" legislation may have mobilized the Latino electorate in California and elsewhere.

Further, because California's Latino population is divided among 58 diverse counties, I can study how various characteristics of these counties, such as the size of the Latino voting-age population, the age composition, the educational attainment, the median income, the number of Spanish-speaking households, and whether the county is urban or rural, each influence Latino voting. Therefore, I would argue that this study should provide insight into Latino political behavior in general.

However, California's geographic location and the composition of its Latino population may make some of the conclusions less applicable to other states. California shares a border with Mexico, and its Latino population is 80 percent Mexican American. ${ }^{7}$ The two primary reasons these results would not be applicable to political participation are the differences between Mexican Americans living in California and in other states and the fact that other Latino

[^4]populations, such as Puerto Ricans and Cubans, participate differently from Mexican Americans.

For example, although the Latino population of New Mexico is also primarily Mexican (57 percent), the political participation of Latinos in New Mexico has been noticeably different. ${ }^{8}$ In New Mexico, Latinos are much more incorporated into the social and economic fabric of the state than is commonly true elsewhere and are considered to be major players in the Democratic Party (Garcia, 1996). These facts suggest that Latino participation may be very different in New Mexico from what it is in California.

In states such as New York and Florida, where the Latino populations are predominately Puerto Rican (49 percent) and Cuban (43 percent), I would expect that some of my findings would not be applicable. ${ }^{9}$ Although members of these groups must become citizens to vote and participate fully in the political process, these observed differences may be attributed to variances in naturalization rates and political status. For example, Mexican Americans have the second lowest naturalization rate among all immigrants (de la Garza, 1996), and Puerto Ricans who are residents of the United States but not citizens still enjoy some limited voting rights. In addition, researchers have found that the three dominate Latino populations-Mexican Americans, Puerto Ricans, and Cubans-participate at

[^5]different rates (de la Garza et al., 1992), with Cubans participating the most consistently, Puerto Ricans the least, and Mexican Americans somewhere in between. These three racial groups also typically disagree on issues and party affiliation, with Cubans preferring the Republican Party while other Latinos register with the Democratic Party (de la Garza et al., 1992; Uhlaner, 1996).

Because of these differences within the Latino community, I also include a chapter about Texas in which I study the Latino voter registration and turnout in this state for the five general elections of the 1990s and compare these results with my California findings. Texas has the second largest Latino population in the United States and is home to nearly 20 percent of the nation's Latinos. Like California, its population is predominately Mexican American (90 percent). By considering both of these states, I am able to gain an understanding of the political behavior of half of the nation's Latino population.

Even if the generalizability of these results is questioned, this research can begin to explain the nation's largest and fastest-growing Latino population and its influence on politics in a state that regularly plays a major role on the national political stage with its governors often seeking the presidency and its 54 electors helping to select the President.

## Scope of this Research

As with any research of this kind, the results are limited by the available data and the researcher is limited by a deadline. The project must be defined before it can
be approached, and the problem must be refined before answers can be sought. Within any single work or any finite period of time, not all interesting aspects of a problem can be explored or all challenging questions answered. For these reasons, I focus my research on Latino voter registration and turnout in California and Texas. I study Latinos as a group, rather than dividing them by country of origin or considering the ethnic subsets of this group. And I use aggregate data rather than telephone survey data so that I can study Latino voting patterns over an eighteen-year period. My choices and their consequences are discussed in the paragraphs that follow.

Focus on Voter Registration and Turnout. Although political participation takes many forms, including walking precincts, making political contributions, demonstrating for a cause or a candidate, contacting elected officials, and holding local office, I focus my research on a citizen's most fundamental form of political participation, voting. Understanding voting behavior is important because the United States democratic political process is predicated upon the fundamental right of each citizen to vote and to have his vote be equal in value to each other vote cast. However, if the preferences of the voting public are not representative of the voting-eligible population, equality in voting rights may not yield equality of voting results. During the previous twenty years, Latinos have repeatedly been found to vote at lower rates than whites (several examples are Wolfinger and Rosenstone, 1980; Calvo and Rosenstone, 1989; Uhlaner et al.,

1989; and Alvarez and Butterfield, 1999) and to have different issue concerns (de la Garza, 1996; Uhlaner, 1996; Verba et al., 1995). Therefore, it is imperative to understand the rate at which the Latino population is turning out and why Latinos continue not to vote and not to let their voices be heard in the halls of government.

I offer several new approaches to studying Latino voting. I consider both aspects of voting, registration and turnout. In addition, by focusing my study on the aspects of voting, I can analyze these rates over a longer period of time (that is, the ten elections in the years 1980 through 1998) and consider them during both midterm and presidential elections. In addition, I also benefit by relying on a new data source and a new statistical method, which will allow me to avoid the problems that plague survey data of either not contacting enough Latinos or misreporting. Certainly, by limiting my research in this way, I cannot fully explain Latino political participation; however, I can better understand to what extent Latinos register and vote and why they do so, which is a necessary first step and may help explain other political behavior.

Latinos. The United States Latino population is a heterogeneous population made up of Mexican Americans (62 percent), Puerto Ricans (15 percent), Cubans (5 percent), and Central and South Americans (18 percent) with economic, social, and historical differences that have caused some scholars to argue that its individual ethnic populations must be studied separately to understand Latino political participation (Calvo and Rosenstone, 1989; Nelson
and Tienda, 1985; de la Garza et al., 1992). Unfortunately, the data that would permit me to study the voting behavior of these ethnic subsets separately are currently not available. However, other scholars have found that studying Latinos as a single population may be appropriate.

While researchers agree that differences exist within the Latino population, they also argue that viewing Latinos as a single political group may become more appropriate as this population grows, their differences lessen (Caplan, 1987), and their policy concerns converge on such issues as education, employment, and health care (Moore and Pachon, 1985). Other researchers suggest that viewing separate Latino populations as a single group is not a problem if the focus is on shared concerns rather than on distinguishing characteristics. For example, Peter Skerry (1997) argues that these populations share a common language, faith, and emphasis on family. Further, it could be argued that all of the racial categories used to classify individuals for political purposes are the sum of heterogeneous groups. For example, whites can be individuals who are recent immigrants or sixth-generation Americans. They can speak English, French, Gaelic, German, or any number of other languages. Whites hold advanced college degrees or may not have completed grade school. They can practice any number of religious faiths. So, perhaps the aggregation of Latinos is no different from the aggregation of individuals or groups within any other racial category.

In addition, Latino lobbying organizations and political publications have chosen to aggregate themselves to increase their reach and their political clout. Examples include the Hispanic Caucus; Hispanic Link, a weekly newsletter culling news of interest to all Hispanics; Hispanic, a general-interest Englishlanguage monthly; and the National Coalition of Hispanic Health and Human Services Organizations (Skerry, 1997). When asked, individual Latinos often indicate that they think of themselves first as "Hispanics" and then as Americans, which suggests that not only do politically savvy groups view themselves as Hispanic or Latino but individual voters do as well (Hero, 1992, p. 59). Also, my focus on California supports this aggregation because California's Latino population is racially homogeneous. Eighty percent of California's Latino population is Mexican. ${ }^{10}$ Therefore, although, the efficacy of studying Latinos as an aggregated group has been questioned and my doing so may limit my conclusions in some way, this approach is supported by the literature, by practical experience, and by Latinos themselves.

Latino Data Sources. In this section, I examine the traditional sources of information about Latino political involvement, summarize my reasons for seeking alternatives, and describe the one I ultimately select.

The study of Latino political participation has been hampered by a lack of reliable and consistent data sources. For example, the University of Michigan's

[^6]Center for Political Studies' American National Elections Studies (NES) has been gathering data for every midterm and presidential election since 1952; however, NES systematically undersamples lower socioeconomic populations (Abramson et al., 1990), which means that many minority groups, including Latinos, are underrepresented (Estrada et al., 1988; Miller, 1991). This shortcoming of the NES data makes this minority political behavior and Latino political behavior specifically difficult to study.

An alternative data source is the U.S. Bureau of the Census. Although, the United States has conducted a decennial census since 1790 (for more than 200 years), the Census Bureau did not attempt to count Latinos until 1930. In addition, the bureau has changed its method of classifying this particular population several times. In the 1930 census, the classification was by race and included the category Mexican. In 1940, the race question was replaced by one that asked if Spanish was the mother tongue, which resulted in an aggregation of the Spanish-speaking population. In the 1950 and 1960 censuses, the question was no longer about language but was, instead, about last name, which resulted in an aggregation of respondents with Spanish surnames. As with other methods of aggregated classification, this method resulted in the grouping together of a very heterogeneous population and made impossible the examination of subsets of this population. Beginning in 1970, classification was done by origin of descent. In 1980, this classification method was expanded to race. For example, Mexican Americans are classified by Spanish origin and then
by race or type, in this case, Mexican. The changing nature of the classification of this population makes longitudinal studies nearly impossible because the researcher is not comparing the same populations. ${ }^{11}$ Even though the census data suffer from inconsistent classification methods and the limitations that characterize any self-administered written survey, they can be used to determine general trends in the population's composition. ${ }^{12}$

Between censuses, very little effort is made to document the Hispanic population. ${ }^{13}$ The Bureau of the Census issues annual Current Population Surveys. One of these deals specifically with the United States Hispanic population. The survey includes data about such socioeconomic characteristics as income and education like the decennial census. Recent editions of this survey separate the data by race, including Mexican. Thus, this survey provides valuable data about the Hispanic population. In 1964, the Census Bureau began issuing data about voting behavior for each midterm and presidential election as

[^7]well. However, neither registration and turnout rates nor Latino voting behavior has been consistently reported. ${ }^{14}$ The shortcomings of these data are that they were collected only at the national level. Currently, there are no equivalent statelevel data. In addition, longitudinal studies are impossible because of the changing classifications of Latinos as noted above.

More recently, researchers have had two new sources of data, the Latino National Political Survey (LNPS) and the Citizen Participation Study (CPA). The LNPS was the first national sample of Latinos conducted in the United States. The LNPS was administered during an eight-month period between August 1989 and April 1990 in forty standard metropolitan statistical areas. The survey data were gathered using in-home interviews in either English or Spanish. ${ }^{15}$ This study allowed for the first time the in-depth study and comparison of Mexican, Puerto Rican, and Cuban political behavior. The CPA was conducted approximately at the same time as the LNPS in the months before and after the 1990 presidential election. Although the primary focus of this survey was not Hispanics, it does contain a significant portion of Latinos. The survey consisted of two portions, a brief telephone interview followed by an extended in-person

[^8]interview. The benefit of this survey was that the researchers defined political participation broadly and considered new ways of measuring it.

Because of the lack of available data sources, researchers have often sought new ones. They have even conducted their own surveys in the hope of better understanding Latino political participation and have narrowed their focus from the national to the state level (Uhlaner, Cain, and Kiewiet, 1989; Cain et al., 1991). ${ }^{16}$ One data collection method researchers have relied on is large telephone surveys. A benefit of this method is the ability to obtain detailed information about a respondent's socioeconomic characteristics and political opinions and involvement. The breadth of these data enables the researcher to test what factors are important in determining an individual's decisions to register and to vote.

However, when used for this purpose, telephone surveys have two significant flaws. First, they overstate the proportions of voters who register and turn out. For example, in the widely cited and well-known recent work about political participation by Verba, Schlozman, and Brady, entitled Voice and Equality, the authors find that 71 percent of their telephone survey sample reported voting in the 1988 U.S. presidential election. However, only about 50

[^9]percent of the national electorate turned out to vote in that election. This overreporting of turnout is endemic in studies that employ telephone surveys, and it dramatically influences a researcher's ability to determine accurately the levels of turnout and the reasons some eligible individuals did not vote (Teixeira, 1992).

Second, although the typical telephone survey attempts to be representative of the national American electorate, it does not adequately sample racial or ethnic groups, making it impossible to draw reliable inferences about their political behavior. To address this problem, some researchers have advocated the oversampling of minority groups (de la Garza et al., 1992; Uhlaner et al., 1989). However, intentional oversampling may bias the data if racial or ethnic group respondents are concentrated in a single neighborhood or geographic area and does not solve the participation overreporting problem.

In addition, both the census data and the telephone survey data currently available force the researcher to study Latino political behavior at one point in time. To study Latino political behavior over time, researchers are forced to compare the results of several different telephone surveys taken at different times (see, for example, Uhlaner, 1996). However, because of the differences in the survey wording and the ethnic, geographic, and demographic composition of the respondents, results from two different surveys even with careful analysis are difficult to compare and could be misleading.

Because of the flaws inherent in relying on telephone survey data and comparing several different surveys, I offer a different approach (Alvarez and Butterfield, 1999) and several new, alternative data sources. By focusing my research on the California Latino population instead of attempting to do a national study, I can use aggregate data instead of individual data. Specifically, I use the Demographic Research Unit of the California Department of Finance's data set entitled Race/Ethnic Population with Age and Sex Detail, 1970-2040, which is available at the department's Web site, www.dof.ca.gov. These data were used because the Demographic Research Unit of the California Department of Finance is designated as the single official source of demographic data for state planning and budgeting, and these data provided me with the necessary yearly projections of county-level total populations classified by ethnicity. I also relied on total registration, party registration, and turnout figures published by the California Secretary of State's office in the "Statement of the Vote." I supplemented these data with county-level estimates of such individual characteristics as citizenship status and age and with incarcerated population data from the U.S. Census Bureau. Therefore, I use California county-level estimates of Latino and white voting-age populations, of registration, and of turnout to produce estimates of Latino and white voter registration for each county during the general elections of the 1980s (1980, 1982, 1984, 1986, and 1988) and the 1990s (1990, 1992, 1994, 1996, and 1998) and turnout for each county during the general elections of the 1990s, employing the method of
generalized bounds (King, 1997). I look at these last two decades of the twentieth century because the Latino population in the United States has increased rapidly during this time and has been presented with several opportunities to respond to critical issues and institutional change. My analysis of this period should provide both a greater understanding of past behavior and a basis for predicting future patterns.

## Research Questions

Because historically data about Latino political participation has been lacking, the studies and conclusions about Latino participation have been limited and mixed. In general, Latinos have been found to register and turn out at rates that are significantly lower than those of whites (for example, see Wolfinger and Rosenstone, 1980; Calvo and Rosenstone, 1989). These differences have been attributed to citizenship status, language, and socioeconomic factors such as income, education, and age. Latinos with the exception of Cuban Americans have also identified strongly with the Democratic Party (for example, Uhlaner, 1996). My work should help to clarify and verify these previous results.

First, by studying 10 elections, I can begin to answer some general questions about Latino registration and turnout. Specifically, how has Latino registration and turnout changed during the previous twenty years? Has registration increased? And if so, by how much? Has turnout increased? And what is the magnitude of this change? How does Latino participation fluctuate
between presidential and midterm elections? In what counties is Latino registration and turnout the highest? In what counties are these rates increasing most rapidly? With what party do Latinos register? And is this party registration consistent?

Once I have answered these questions about the registration and turnout rates of Latinos, then I can consider the demographic, cultural, institutional, and contextual factors that may be causing these observed rates and changes.

Party Registration. Previous research has found that, with the exception of Cuban Americans, Latinos consistently register as Democrats. Does this registration pattern still persist? In addition, I can consider the fluctuation in party registration to determine if it was influenced by the surfacing of Proposition 187, an anti-immigration initiative, and Proposition 209, an anti-affirmative-action initiative, and their being supported by Republican candidates. I would expect these initiatives to cause Latinos to register with the Democratic Party at a higher rate.

Institutional Changes and Motor Voter Legislation. Researchers have often argued that cumbersome voter registration procedures are an obstacle to Latino participation (Calvo and Rosenstone, 1989). However, the extension of the Voting Rights Act and the passage of motor voter legislation should have reduced these obstacles. For example, de la Garza and DeSipio (1993) argue that the Voting Rights Act has been a central element in Latinos' gaining political power. How has the passage of motor voter legislation changed Latino
participation? I would argue that implementation of the motor voter law would increase Latino registration and, perhaps, turnout.

Standard Socioeconomic Factors. When studying political participation, researchers have consistently found that socioeconomic factors, such as education, income, and occupation, influence an individual's decision regarding whether to vote or not (Wolfinger and Rosenstone, 1980). However, these factors have been found to be less important for Latinos (Calvo and Rosenstone, 1989). More recent research has found that these socioeconomic, or class, variables are important in determining Latino political participation (Arvizu and Garcia, 1996). I would expect that these factors would be important in determining whether or not a Latino decides to register and to turn out as this population becomes more assimilated into the political culture.

Age. Registration and turnout rates have traditionally been viewed as low among the youngest voters and increasing with age and declining in very old age for both whites and Latinos (Wolfinger and Rosenstone, 1980; Calvo and Rosenstone, 1989).

Partisanship. If partisanship is defined as firm adherence to a political party, then it is interesting to ask how group partisanship influences the political participation of individual Latinos. I would expect that strong group partisanship in counties would discourage participation by any individuals who feel that they cannot influence the political process or have a voice in it.

Cultural Differences. Are cultural differences still important in determining Latino participation? Earlier research suggested that lower Latino registration and turnout rates could be explained, in part, by language and nativity differences (Wolfinger and Rosenstone, 1980, Calvo and Rosenstone, 1989). I would expect these influences on registration and turnout to diminish as more and more of this population is native born and becomes fluent in English.

Latino Voting-Age Population Size. I would argue that the size of the Latino VAP may influence white voter participation. Feeling the threat posed by the presence of a large and politically active Latino population may encourage whites to participate.

Issue Voting. Researchers have found that Latinos are less likely to turn out in initiative elections than in candidate elections and offer as an explanation the fact that complex issues tend to discourage participation (Hero, 1992, p. 64). I submit that this may be true when the issues are not of personal concern but would argue that Latinos will turn out in initiative elections if they perceive that the issues being voted upon are relevant to them. For example, Latina women have had long histories of being active in community movements over issues that have concerned them, such as schools and safety (Pardo, 1997; HardyFanta, 1997). Therefore, I would argue that Latino registration and turnout should be high in 1994 because of the presence of Proposition 187 on the ballot even though it was a midterm and an issue-oriented election.

Area of Residence. There has long been a theory that an individual's place of residence, farm or city, could influence whether or not he turns out to vote (Lane, 1959, pp. 49-50; Nie et al., 1969, p. 368; Verba and Nie, 1972, pp. 237-38, 243; Wolfinger and Rosenstone, 1980, p. 30). Wolfinger and Rosenstone find that, while farmers participate at the same levels as other individuals, farm workers participate at lower levels than other workers even when other socioeconomic factors are controlled for. This result suggests that rural counties may not have the necessary infrastructure to mobilize these individuals to participate politically; therefore, I would expect Latinos to participate at lower levels in rural counties than in urban counties.

This research should give scholars a clearer understanding of the longterm trends in Latino participation and, specifically, the reasons Latinos decide to register and to vote. Further, this research should help identify methods that may be effective in encouraging Latino participation.

## Overview

This work is composed of five parts: an introduction (Chapter 1); a discussion of statistical methods (Chapter 2); preliminary estimation of Latino voting-age population, registration and turnout rates, and discussion of findings (Chapters $3-5)$; further analysis of registration and turnout rates, including party registration rates, estimation of future projections, and a comparison with similar data from the state of Texas (Chapters 6-9); and finally, a conclusion and discussion of
future research (Chapter 10). First, in Chapter 2, I discuss what method I will use to estimate Latino and white registration and turnout rates. In Chapter 3, I calculate the Latino and white voting-age populations (VAPs) for all counties in California for each general election from 1980 through 1998. In Chapters 4 and 5, using the methods discussed in Chapter 2, I combine the VAP calculations of Chapter 3 with county-level estimates of registration and turnout to produce accurate estimates of Latino and white registration and turnout rates. In Chapter 6, I focus my analysis on Los Angeles County and offer projections of Latino voter registration and turnout in that county from 2000 to 2020 because of the important implications these dramatic changes hold for the composition of the electorate. In Chapter 7, I use the registration and turnout results in secondary analyses to determine what factors influence these decisions. In Chapter 8, I consider how party registration varies among whites and Latinos and across the counties of California and what factors determine it. In Chapter 9, I consider the Latino participation in Texas and compare it with that in California. Finally, in Chapter 10, I conclude with a discussion of my results and their implications for Latinos, politics, and California's and the nation's political future.

## Chapter 2. The Calculation of Latino Voter Registration and Turnout, 1980-1988

As discussed in Chapter 1, because longitudinal data about individual Latino voter registration and turnout are not available and survey data collected about Latinos can be unreliable, I use aggregate data. To analyze the trends in Latino registration and turnout rates and to determine what demographic, socioeconomic, cultural, institutional, and contextual factors are influencing these rates, I must first produce accurate estimates of Latino voter registration and turnout for each county in California. However, to produce these estimates, I need an accurate method of inferring individual behavior from aggregate data, ecological inference. For this purpose, I select Gary King's method of generalized bounds (King, 1997).

Ecological inference (ei) is a means of estimating an unknown joint probability from known marginal probabilities. In this case, I know the proportion of Latinos in the voting-age population (VAP) for each county and the proportion of registered voters, but what I want to know is the proportion of Latinos registered in a county. Using ecological inference, I estimate the unknown joint probability (that is, the proportion of Latinos registered in a particular county) from the known marginal probabilities (that is, Latino VAP proportion and the proportion of registered voters in a county). The use of ecological inference in this way can best be illustrated by the following table:

## Example for One California County in a Particular Election

|  | Registered | Nonregistered | VAP |
| :--- | :--- | :--- | :--- |
| Latinos | LR | LNR | L |
| Non-Latinos | NLR | NLNR | NL |
| Voter Registration | R | NR | 1 |

I obtained the aggregate county-level proportions of the Latino and nonLatino populations as estimated by the California Department of Finance, and from these numbers I extrapolated the voting-age populations of Latinos and non-Latinos (L and NL, respectively) for each county. From the California Secretary of State's "Statement of the Vote," I obtained the aggregate proportions of total registered ( R ) and nonregistered (NR) voters in each county. Because the entries in this table are proportions, specific relationships exist among them. The rows can be summed horizontally (for example, $L R+L N R=$ L). The columns can be summed vertically (for example, LR + NLR = R). The aggregate county-level data of the voting-age population (VAP) and the voter registration each sum to one (for example, $R+N R=1$, and $L+N L=1$ ).

I want to estimate the quantities in the interior cells of this table, that is, the proportions of registered and nonregistered Latino voters (LR and LNR, respectively) and the proportions of registered and nonregistered non-Latino voters (NLR and NLNR, respectively). However, because these numbers are
proportions and I know the aggregate proportions (R and NR), I need estimate only two of them (LR and LNR) and can then determine the others by subtraction. I can repeat this process for each county and each election, for registration and turnout, and for both Latinos and whites to make my comparisons possible. However, given these aggregate data and the need to make ecological inferences, what is the best method for estimating these proportions?

Since the early 20th century, political scientists have sought an easy and accurate ecological inference method believing that there must exist an indirect method to estimate individual behavior from aggregate data (Bulmer, 1984; Gow, 1985; King, 1997). However, historically ecological inference methods have been plagued by problems of relying on questionable assumptions and generating unrealistic results. The proliferation of such dubious methods has caused many scholars to avoid analyzing aggregate data in an effort not to make "ecological fallacy" instead of inference (Robinson, 1950).

The first significant breakthrough came with Goodman's regression (Goodman, 1953). In the intervening 48 years, Goodman's method of using linear regression to solve the ecological inference dilemma has been used extensively in the literature because of its straightforward approach and ease of application. However, Goodman's method relies on a generalizing assumption that the proportions being estimated are constant across the units of analysis
and does not guarantee that the estimated proportions will be on the interval [0,1].

Since the introduction of Goodman's regression, because of these questionable assumptions and results, scholars have offered alternative methods for making ecological inferences, but none of these proposed alternatives has been widely accepted or consistently used (Achen and Shively, 1995; Grofman et al., 1985; Kousser, 1973; and Prais and Aitchison, 1954). The quest has led some frustrated scholars to observe that a methodological solution to this problem was as elusive as "alchemist's gold" (Flanigan and Zingale, 1985). Yet King's method of generalized bounds (King, 1997) offers a workable solution.

King's approach to making ecological inferences generalizes the models proposed in the literature over the past 25 years and avoids the many pitfalls of previous approaches, including making generalizing assumptions about the proportions being estimated and creating estimates that have proportions outside the $[0,1]$ interval (Achen and Shively, 1995; Claggett and Van Wingen, 1993; Duncan and Davis, 1953; Dykstra, 1986; Flanigan and Zingale, 1985; Kousser, 1986; Shively, 1974; Shively, 1991; Sigelman, 1991). This method of producing estimates and its differences from Goodman's regression can best be illustrated by first considering the following table. ${ }^{17}$

[^10]
## Turnout Decision

| Race | Vote | No Vote | VAP |
| :--- | :--- | :--- | :--- |
| Blacks | $\beta_{i}^{b} \mathrm{X}_{i}$ | $\left(1-\beta_{i}^{b}\right) \mathrm{X}_{i}$ | $\mathrm{X}_{i}$ |
| Whites | $\beta_{i}^{w}\left(1-\mathrm{X}_{i}\right)$ | $\left(1-\beta_{i}^{w}\right)\left(1-\mathrm{X}_{i}\right)$ | $1-\mathrm{X}_{i}$ |
| Voter Turnout | $\mathrm{T}_{i}$ | $1-\mathrm{T}_{i}$ | 1 |

where
$\mathrm{T}_{i}$ is the proportion of the voting-age population (VAP) turning out to vote $\left(\mathrm{N}_{i}{ }^{\top} / \mathrm{N}_{i}\right)$ in precinct $i$,
$\mathrm{X}_{i}$ is the proportion of the voting-age population (VAP) who are black $\left(\mathrm{N}_{i}^{b} / \mathrm{N}_{i}\right)$ in precinct $i$,
$\left(1-X_{i}\right)$ is the proportion of the voting-age population (VAP) who are white $\left(N_{i}^{w} / N_{i}\right)$ in precinct $i$,
$\mathrm{N}_{i}$ is the number of people of voting age in precinct $i$,
$\beta_{i}^{b}$ is the proportion of voting-age blacks who vote $\left(N_{i}^{b T} / N_{i}^{b}\right)$, and
$\beta_{i}^{w}$ is the proportion of voting-age whites who vote $\left(N_{i}{ }^{w T} / N_{i}{ }^{w}\right)$.
Note: This table is based on the assumption that each precinct is made up of only whites and blacks.

The following simple accounting identity ${ }^{18}$ summarizes the relationship between the known quantities and the quantities that I am attempting to estimate:

$$
\mathrm{T}_{i}=\beta_{i}^{b} \mathrm{X}_{i}+\beta_{i}^{w}\left(1-\mathrm{X}_{i}\right)
$$

Although the relationship can be represented by a simple equation, the solution to this equation is not easy because, with one equation and two unknowns, $\beta_{i}^{b}$ and $\beta_{i}^{w}$, a unique solution cannot be found. For each county, I have two unknowns to solve for, or a total of 116 unknowns, and only 58 observations, making the task daunting at best.

In the past, researchers have attempted to skirt this problem by reducing the number of parameters being estimated. For example, Goodman (1953a) solves this problem by assuming that $\beta_{i}^{b}=\beta^{b}$ and $\beta_{i}^{w}=\beta^{w}$ for all i. This

[^11]assumption simplifies the problem dramatically because the researcher now needs to solve only for two values given n observations, where n is the number of precincts in this case. However, this assumption implies that the proportions of blacks and whites turning out are constant across all precincts, which is doubtful.

Given this assumption, Goodman's method involves simply running a linear regression of $T_{i}$ [the proportion of the voting-age population (VAP) turning out to vote, $\left(N_{i}^{\top} / N_{i}\right)$ in precinct I] on $X_{i}$ [the proportion of the voting-age population (VAP) who are black, $\left(\mathrm{N}_{i} / \mathrm{N}_{i}\right)$ in precinct $I$ ] and $\left(1-\mathrm{X}_{i}\right)$ [the proportion of the voting-age population (VAP) who are white] to obtain estimates of $\beta^{b}$ and $\beta^{w}$. It should be noted that the estimates of $\beta^{b}$ and $\beta^{w}$ do not necessarily approximate an average of the precinct rates or the district rate, the sum of the precinct rates. In addition, Goodman's regression does not guarantee that these estimates for $\beta^{b}$ and $\beta^{w}$ are on the unit interval $[0,1]$, meaning that his method can produce a nonsensical result such as a negative turnout rate or a turnout rate that is greater than 100 percent.

Instead of reducing the number of parameters to estimate by misguided assumptions, King (1997) offers an alternative approach arguing that all of the parameters can be estimated if some additional information which the researcher knows (that is, the bounds on the parameters being estimated for each unit of analysis, in this example, the precinct) is used.

Simply, bounds can be calculated for the unknown parameters by exploiting the relationships explicitly defined in the table above and the values of the known parameters using a little algebra. For example, to derive the upper bound for $\beta_{i}^{b}$, recall that $\beta_{i}^{b}$ is defined as the proportion of voting-age blacks who vote, $\left(\mathbf{N}_{i}{ }^{\mathrm{bT}} / \mathbf{N}_{i}^{b}\right)$. However, $\mathrm{N}_{i}^{b}$ (the total number of blacks of voting age in precinct $i)$ is known, and $\mathrm{N}_{i}{ }^{\text {tT }}$ (the total number of blacks of voting age who turned out in precinct i) cannot be greater than either $\mathrm{N}_{i}{ }^{\top}$ (the total number of voting-age individuals who turned out in precinct $i$, because $\mathrm{N}_{i}{ }^{\top}=\mathrm{N}_{i}{ }^{b T}+\mathrm{N}_{i}{ }^{\omega T}$ by definition) or the total number of blacks of voting-age in precinct $i\left(\mathrm{~N}_{i}^{b}\right)$. Therefore,

$$
\max \left(\mathbf{N}_{i}^{b T}\right)=\min \left(\mathbf{N}_{i}^{T}, \mathbf{N}_{i}^{b}\right)
$$

Dividing this equation by $N_{i}^{b}$, an upper bound for $\beta_{i}^{b}$ can be obtained.

$$
\max \left(\beta_{i}^{b}\right)=\max \left(\mathbf{N}_{i}^{b T} / \mathbb{N}_{i}^{b}\right)=\min \left(\mathbf{N}_{i}^{T} / \mathbf{N}_{i}^{b}, N_{i}^{b} / \mathbb{N}_{i}^{b}\right)
$$

Recalling that the definition of $T_{i}$ is the proportion of the voting-age population (VAP) turning out to vote, $\left(\mathrm{N}_{i}^{\top} / \mathrm{N}_{i}\right)$ in precinct $I$, and $\mathrm{X}_{i}$ is the proportion of the voting-age population (VAP) who are black, $\left(N_{i}^{b} / N_{i}\right)$ in precinct $i$. Given these definitions, the above equation can be rewritten in terms of $T_{i}$ and $X_{i}$, two known quantities.

$$
\max \left(\beta_{i}^{b}\right)=\min \left(\mathrm{T}_{i} / X_{i}, 1\right)
$$

To calculate the lower bound of $\beta_{i}^{b}$, recall that $\beta_{i}^{b}$ is defined as the proportion of voting-age blacks who vote, $\left(\mathrm{N}_{i}^{b T} / \mathrm{N}_{i}^{b}\right)$. $\mathrm{N}_{i}^{b}$ (the total number of blacks of voting age in precinct $i$ ) is known, and by definition, $\mathbf{N}_{i}^{b T}=\mathbf{N}_{i}^{T}-\mathbf{N}_{i}{ }^{\omega T}$. Therefore,

$$
\begin{gathered}
\min \left(\mathbf{N}_{i}^{b T}\right)=\mathbf{N}_{i}^{T}-\max \left(\mathbf{N}_{i}^{\omega T}\right) \\
=\mathbf{N}_{i}^{T}-\min \left(\mathbf{N}_{i}^{\top}, \mathbf{N}_{i}^{w}\right)
\end{gathered}
$$

Dividing by $\mathrm{N}_{i}^{b}$ yields the lower bound for $\beta_{i}^{b}$.

$$
\min \left(\beta_{i}^{b}\right)=\min \left(N_{i}^{b T} / N_{i}^{b}\right)=\left(N_{i}^{\top} / N_{i}^{b}\right)-\min \left(N_{i}^{\top} / N_{i}^{b}, N_{i}^{\omega} / N_{i}^{b}\right)
$$

Next, if all the numerators and denominators in the above equation are divided by $\mathrm{N}_{i}$, then this equation can be rewritten in terms of $\mathrm{T}_{i}$ and $\mathrm{X}_{i}$, two known quantities.

$$
=\mathbf{N}_{i}^{\top}-\min \left(\mathbf{N}_{i}^{\top}, \mathbf{N}_{i}^{W}\right)
$$

Dividing by $\mathrm{N}_{i}^{b}$ yields the lower bound for $\beta_{i}^{b}$.

$$
\min \left(\beta_{i}^{b}\right)=\min \left(N_{i}^{b T} / N_{i}^{b}\right)=\left(\mathbf{N}_{i}^{\top} / N_{i}^{b}\right)-\min \left(N_{i}^{\top} / N_{i}^{b}, N_{i}^{w} / N_{i}^{b}\right)
$$

Next, if all the numerators and denominators in the above equation are divided by $\mathrm{N}_{i,}$, then this equation can be rewritten in terms of $\mathrm{T}_{i}$ and $\mathrm{X}_{i}$, two known quantities.

$$
\begin{aligned}
& =\left[T_{i}-\min \left(T_{i},\left(1-X_{i}\right)\right)\right] / X_{i} \\
& =\max \left(0,\left(T_{i}-\left(1-X_{i}\right)\right) / X_{i}\right)
\end{aligned}
$$

Similar arguments can be made to calculate the upper and lower bounds for $\beta_{i}{ }^{w} .{ }^{19}$ Therefore, the possible values that $\beta_{i}^{b}$ and $\beta_{i}^{w}$ can assume are summarized by the following two inequalities and in terms of $T_{i}$ and $X_{i}$, two known quantities.

$$
\begin{aligned}
& \max \left(0,\left(T_{i}-\left(1-X_{i}\right)\right) / X_{i}\right) \leq \beta_{i}^{b} \leq \min \left(T_{i} / X_{i}, 1\right) \\
& \max \left(0,\left(T_{i}-X_{i}\right) /\left(1-X_{i}\right)\right) \leq \beta_{i}^{w} \leq \min \left(T_{i} /\left(1-X_{i}\right), 1\right)
\end{aligned}
$$

Given these bounds, the accounting identity that expresses the relationship between the known quantities and the unknown quantities that I want to estimate can be considered again:

$$
\mathrm{T}_{i}=\beta_{i}^{b} \mathrm{X}_{i}+\beta_{i}^{w}\left(1-\mathrm{X}_{i}\right)
$$

This simple equation provides some additional information that can be used in estimating $\beta_{i}^{b}$ and $\beta_{i}^{w}$, that $\beta_{i}^{b}$ and $\beta_{i}^{w}$ are linearly related in terms of the known

[^12]aggregate data. Therefore, with a little algebraic manipulation, this equation can be written with either unknown, $\beta_{i}^{b}$ or $\beta_{i}{ }^{w}$, written in terms of the other unknown and the known aggregate data quantities of $T_{i}$ and $X_{i}$. For example, solving for $\beta_{i}^{w}$ in terms of $\beta_{i}^{b}, \mathrm{~T}_{i}$, and $\mathrm{X}_{i}$ :
$$
\beta_{i}^{w}=\left(T_{i} /\left(1-X_{i}\right)\right)-\left(X_{i} /\left(1-X_{i}\right)\right) \beta_{i}^{b}
$$

This equation is simply the equation of a line with slope $-X_{i} /\left(1-X_{i}\right)$, which is always negative. The negative slope of this line implies that as $\beta_{\mathrm{i}}{ }^{\mathrm{b}}$ increases toward its maximum value, $\beta_{i}^{w}$ must decrease toward its minimum value. Without making any questionable assumptions and simply by using the known aggregate data and the accounting identity, the possible values of $\beta_{i}^{w}$ and $\beta_{i}^{b}$ for each $i$ have been restricted to a unique line in the unit square incorporating the calculated bounds. This fact can best be understood by means of Figure 1, which represents a data set (see Figure 1).

Now, it is easy to see that finding a solution to this problem-that is, the values of $\beta_{i}^{w}$ and $\beta_{i}^{b}$ for each $i$-is similar to classic regression analysis, although more complicated because of the number of dimensions. I observe a set of data lines, instead of points, and I want to find a regression contour, instead of a line, that best fits the data, in this case, the intersection of the data lines (see Figures 2 and 3 for an example). Figure 1 shows the data lines with a fitted regression contour, and Figure 3 illustrates how the contour is derived.

Generally, to estimate the mean and standard error for each $\beta_{i}{ }^{\omega}$ and $\beta_{i}^{b}$, which is the goal, King's method assumes that the unknown parameters, $\beta_{i}^{w}$ and $\beta_{i}^{b}$, are drawn from a truncated bivariate normal distribution (for example, see Figure 3). This distribution has a set of parameters-means, standard deviations, and correlation-that can be estimated given the known aggregate data, $\mathrm{T}_{i}$, and $X_{i}$. Given this estimated bivariate distribution, a truncated univariate normal distribution conditional on the other data lines can be derived for each unit of analysis, in this case, the precinct. This truncated univariate normal distribution is the posterior distribution of $\beta_{i}$ and is simply the two-dimensional cross section cut by each data line through the bivariate distribution (see Figure 3).


Figure 1. A Data Summary
This figure appears as Figure 5.1 on page 81 in A Solution to the Ecological Inference Problem: Reconstructing Individual Behavior From Aggregate Data by Gary King (Princeton: Princeton University Press, 1997).


Figure 2. A Tomography Plot
This figure appears as Figure 6.3 on page 114 in A Solution to the Ecological Inference Problem: Reconstructing Individual Behavior From Aggregate Data by Gary King (Princeton: Princeton University Press, 1997).


Figure 3. A Truncated Bivariate Normal Surface Plot
This figure appears as Figure 6.4 on page 116 in A Solution to the Ecological Inference Problem: Reconstructing Individual Behavior From Aggregate Data by Gary King (Princeton: Princeton University Press, 1997).

Given this general explanation of King's model, the specific details of how the estimation is accomplished can be considered. King's ecological method relies only on three assumptions, two reparameterizations, and a two-step procedure that combines a maximum likelihood technique and a repeated sampling technique to estimate the desired parameters. King's ecological inference method of generalized bounds requires three assumptions (King, 1997). ${ }^{20}$

Assumption 1. $\beta_{i}^{w}$ and $\beta_{i}^{b}$ are generated by a truncated bivariate normal distribution, conditional on $X_{i}$ with truncation limits $\beta_{i}^{w} \in[0,1]$ and $\beta_{i}^{b} \in$ $[0,1]$.

$$
\mathrm{P}\left(\beta_{i}^{b}, \beta_{i}^{w}\right)=\mathrm{TN}\left(\beta_{i}^{b}, \beta_{i}^{m} \mathrm{~B}, \Sigma\right),
$$

where

$$
\begin{aligned}
& \mathrm{B}=\left[\begin{array}{c}
\mathrm{B}^{\mathrm{b}} \\
\mathrm{~B}^{\mathrm{w}}
\end{array}\right]=\left[\begin{array}{l}
\left.\beta_{i}^{b}\right\rceil \\
\beta_{i}^{w}
\end{array}\right] \\
& \Sigma=\left[\left.\begin{array}{cc}
\sigma_{b}{ }^{2} & \left.\sigma_{b w}\right\rceil \\
\sigma_{b w} & \left.\sigma_{w}{ }^{2}\right\rfloor
\end{array} \right\rvert\,=\operatorname{Var}\left[\begin{array}{l}
\beta_{i}^{b} \\
\left\lfloor\beta_{i}^{w}\right.
\end{array}\right]\right.
\end{aligned}
$$

[^13]Assumption 2. $\beta_{i}^{w}$ and $\beta_{i}^{b}$ are mean independent of $X_{i}$.
Assumption 3. The values of $\mathrm{T}_{i}$ in different precincts are independent after conditioning on $\mathrm{X}_{i}$.

When I apply these assumptions to my problem of calculating the proportion of the Latino VAP who registers to vote in each county, I see that the first assumption implies that the Latino registration rate for each county is drawn from a univariate normal distribution truncated on the unit interval $[0,1]$ or on the bounds as calculated above, whichever is narrower. It is important to note what this assumption does not require. Specifically, the aggregate data on which these calculations are based, the Latino VAP, and the total number of individuals registered in a county do not have to be normally distributed. This unimodal assumption implies that $\beta_{i}^{w}$ and $\beta_{i}^{b}$, while not constant over all counties, do cluster around a single mode with a wide variance. This assumption appears reasonable because some commonality would be expected among the county rates based on the facts that they are all from the same state, the same election is held in all the counties with the exception of local officials or initiatives, and all the counties are governed by the same state and federal laws. Also, normality is a common assumption used often in political science methodology with such models as the probit model and the linear regression model because of its reasonableness and its simplification of statistical calculations.

The second assumption means that the Latino registration rate in each county is independent of the size of the Latino VAP in that county. Put differently, there is little correlation between the proportion of Latino registered voters in a county and the proportion of the Latino voting-age population in a county. This assumption is reasonable as long as the size of the Latino population is not what is motivating political participation but rather the characteristics of this population and the county in which it lives, which is what I would expect. Put another way, increasing the number of Latinos in a county from say 10,000 to 15,000 should not increase participation because it is the characteristics of the individuals who make up this population which matter. Simply, the number of educated and older Latinos would have to increase for registration rates to change. This assumption is equivalent to assuming that there is no aggregation bias and guarantees consistent estimates of $B$ and $\Sigma .^{21}$

Assumption 3 states that the total turnout rate of county $i$ is independent of the total turnout rate of any other county $j$ after controlling for differences in the size of the Latino voting-age population. This assumption is equivalent to assuming that there is no spatial dependence. It is a common assumption in ecological inference models. This assumption is used in the model to compute the full likelihood function by taking the products of the probability distributions over all of the observations. ${ }^{22}$ It is important to note that this model does allow $\beta_{i}^{w}$ and $\beta_{i}^{b}$, the parameters of interest, to vary over counties in this case. In

[^14]addition, from a political and practical standpoint, this assumption seems reasonable in this application because one would expect registration rates to be independent across counties. Because the unit of analysis of this research is the county, this assumption does not seem to be inappropriate given that each county has a registrar of voters; and if implementation of policies varies across counties, this model does not restrict this variation. Therefore, none of these three assumptions is incredibly stringent or that unusual.

Given these assumptions, the statistical model can be developed further. First, the truncated bivariate normal distribution as defined in Assumption 1 above has five parameters of $\beta_{i}^{w}$ and $\beta_{i}^{b}$ : two means, two standard deviations, and a correlation parameter. Let this parameter vector be denoted by $\psi$ where $\psi$ $=\left\{B^{b}, B^{w}, \sigma_{b}, \sigma_{w}, \rho\right\}=\{B, \Sigma\}$. Clearly, to derive the desired estimates of the $\beta^{\prime} s$, a simple and direct method to estimate these parameters is needed using the known data, $\mathrm{T}_{i}$, the proportion of the voting-age population (VAP) turning out to vote, and $X_{i}$, the proportion of the voting-age population (VAP) who are black, $\left(N_{i} / N_{i}\right)$ in precinct $i$. To make these calculations easier, King suggests two straightforward reparameterizations of the $\psi$. First, instead of considering $\psi$ directly, King suggests consideration of the vector $\psi^{*}$, which is the parameter vector of the untruncated bivariate normal distribution. Therefore, rewriting the truncated bivariate normal distribution in terms of the untruncated bivariate normal with its untruncated parameters, $\psi^{*}$,

[^15]$\operatorname{TN}\left(\beta_{i}^{b}, \beta_{i}^{m} \mathrm{~B}^{*}, \Sigma^{*}\right)=\mathrm{N}\left(\beta_{i}^{b}, \beta_{i}^{m} \mathrm{~B}^{*}, \Sigma^{*}\right)\left(1\left(\beta_{i}^{b}, \beta_{i}^{w}\right) / \mathrm{R}\left(\mathrm{B}^{*}, \Sigma^{*}\right)\right)$
where $R\left(B^{*}, \Sigma^{*}\right)=\iint N\left(\beta^{b}, \beta^{m} B^{*}, \Sigma^{*}\right) d \beta^{b} d \beta^{m}$
and the bounds of integration are from (0 to 1)

Now, the extra factor, added to the right-hand side, consists of two parts. The numerator, $\left(1\left(\beta_{i}^{b}, \beta_{i}^{w}\right)\right.$, is an indicator function, which ensures that the values of $\beta_{i}^{b}$ and $\beta_{i}^{w}$ are restricted to the unit interval $[0,1]$. The function equals one when $\beta_{i}^{b} \in[0,1]$ and $\beta_{i}^{w} \in[0,1]$ and zero otherwise. The denominator, $R\left(B^{*}, \Sigma^{\star}\right)$, rescales the volume under the truncated distribution so that it equals one.

Therefore, given this reparameterization and the model assumptions, the conditional distribution of $\beta_{i}^{b}$ on $T$ and $\psi^{*}$ can be written as a univariate truncated normal distribution (for $X_{i}>0$ ): ${ }^{23}$
$\mathrm{P}\left(\beta_{i}^{b} \mid \mathrm{T}_{i}, \psi^{\star}\right)=\mathrm{N}\left(\beta_{i}^{b} \mid \mathrm{B}_{i}^{b *}+\left(\omega_{i} / \sigma_{i}^{2}\right) \varepsilon_{i}, \sigma_{b}{ }^{* 2}-\left(\omega_{i}^{2} / \sigma_{i}^{2}\right)\right) \mathbf{1}\left(\beta_{i}^{b}\right) / \mathrm{S}\left(\mathrm{B}^{*}, \Sigma^{\star}\right)$
Where

$$
\begin{aligned}
& \omega_{i}=\sigma_{b}^{2} \mathrm{X}_{i}+\sigma_{b w}\left(1-\mathrm{X}_{i}\right) \\
& \varepsilon_{i}=\mathrm{T}_{i}-\mathrm{B}^{b^{*}} \mathrm{X}_{i}-\mathrm{B}^{w^{*}}\left(1-\mathrm{X}_{i}\right)
\end{aligned}
$$

[^16]$\beta_{i}^{b} \in\left(\max \left(0,\left(T_{i}-\left(1-X_{i}\right)\right) / X_{i}\right), \min \left(T_{i} / X_{i}, 1\right)\right)$
$\mathrm{S}\left(\mathrm{B}^{\star}, \Sigma^{\star}\right)=\int \mathrm{N}\left(\beta_{i}^{b} \mid \mathrm{B}_{i}^{b \star}+\left(\omega_{i} / \sigma_{i}^{2}\right) \varepsilon_{i}, \sigma_{b}{ }^{2}-\left(\omega_{i}^{2} / \sigma_{i}^{2}\right)\right) d \beta^{b}$, where the upper bound of integration is $\max \left(0,\left(T_{i}-\left(1-X_{i}\right)\right) / X_{i}\right)$, and the lower bound of integration is $\min \left(T / X_{i}, 1\right)$ ).

The restriction on the bounds of $\beta_{i}^{b}$ truncates the normal distribution, and the $\mathrm{S}\left(\mathrm{B}^{*}, \Sigma^{*}\right)$ serves to renormalize the distribution given the bounds so that it integrates to one as required by definition. It should be noted that the bounds of integration are simply the bounds calculated previously for $\beta_{i}^{b}$.

Now, given that the distribution is conditional on $\psi^{*}$, a method of estimating $\psi^{*}$ is needed using only the known aggregate data, $\mathrm{T}_{i}$ and $\mathrm{X}_{i}$. Once $\psi^{*}$ is estimated, then the actual quantities of interest, $\psi$, can be derived. Next, King uses the fact that

$$
\begin{aligned}
& \mathrm{P}\left(\psi^{*} \mid \mathrm{T}\right) \propto \mathrm{P}\left(\psi^{*}\right) \mathrm{P}\left(\mathrm{~T} \mid \psi^{*}\right), \\
& \text { where } \mathrm{P}\left(\mathrm{~T} \mid \psi^{\star}\right)=\underset{\mathrm{x}_{i} \in(0,1)}{\mathrm{L}\left(\psi^{*} \mid \mathrm{T}\right)}=\Pi \mathrm{N}\left(\mathrm{~T}_{i} \mid \mu_{i}, \sigma_{i}^{2}\right) \mathrm{S}\left(\mathrm{~B}^{\star}, \Sigma^{\star}\right) / \mathrm{R}\left(\mathrm{~B}^{\star}, \Sigma^{\star}\right)
\end{aligned}
$$

$\mathrm{P}\left(\psi^{*}\right)$ is the prior

Then, $\psi^{*}$ is transformed to $\phi=\left\{\phi_{1}, \phi_{2}, \phi_{3}, \phi_{4}, \phi_{5}\right\}$, where

$$
\begin{aligned}
& \phi_{1}=\left(\mathrm{B}^{b^{*}}-0.5\right) /\left(\sigma_{b}^{2}+0.25\right) \\
& \phi_{2}=\left(\mathrm{B}^{w^{*}}-0.5\right) /\left(\sigma_{w}{ }^{2}+0.25\right)
\end{aligned}
$$

$$
\begin{aligned}
& \phi_{3}=\ln \left(\sigma_{b}^{*}\right) \\
& \phi_{4}=\ln \left(\sigma_{w}^{*}\right) \\
& \phi_{5}=0.5 \ln \left(\left(1+\rho^{*}\right) /\left(1-\rho^{*}\right)\right)
\end{aligned}
$$

to ease estimation of the maximum likelihood function. Given this transformation, $\phi$ can be easily calculated using the technique of Bayesian updating from the known data, $\mathrm{T}_{i}$. Recall that the posterior of $\phi$ given T is defined as $P(\phi \mid T)=P(\phi) P(T \mid \phi)$, where $P(\phi)$ is the prior, and $P(T \mid \phi)$ is the likelihood function. Now, the prior distribution is given and the maximum likelihood function can be calculated easily given the above transformation. ${ }^{24}$ Therefore, the posterior of $\phi$ given T can be calculated.

Given these results, $\mathrm{P}(\mathrm{T} \mid \phi)$ and $\mathrm{P}\left(\beta_{i}^{b} \mid \mathrm{T}, \phi\right)$ have been solved for; however, what is required is the unconditional posterior distribution of $\beta_{i}^{b}$, $P\left(\beta_{i} \mid \mathrm{T}\right)$. To solve for this posterior directly, a five-dimensional integration would be required,

$$
\mathrm{P}\left(\beta_{i}^{b} \mid \mathrm{T}\right) \propto \int \mathrm{P}\left(\beta_{i}^{b}, \phi \mid \mathrm{T}\right) d \phi
$$

[^17]To avoid this time-consuming integration process, King suggests a Monte Carlo method to simulate the posterior distribution. First, this integration above can be rewritten in terms of $\psi^{*}$ because $\phi$ is a deterministic function of $\psi^{*}$.

$$
\mathrm{P}\left(\beta_{i}^{b} \mid \mathrm{T}\right)=\int_{-\infty}^{+\infty} \mathrm{P}(\phi \mid \mathrm{T}) \mathrm{P}\left(\beta_{i}^{b} \mid \mathrm{T}, \psi^{*}\right) d \psi^{*}
$$

$P(\phi \mid T)$ and $P\left(\beta_{i}^{b} \mid T, \psi^{*}\right)$ are known so, instead of attempting to carry out the integration, the following three steps are performed: (1) One value of $\phi$ is drawn from its posterior $\mathrm{P}(\phi \mid \mathrm{T})$ and label it $\phi^{*}$; (2) $\phi^{*}$ is reparameterized into the untruncated scale, producing a simulated value of $\psi^{*}$, denoted $\psi^{* *}$; and (3) $\psi^{* *}$ is inserted into the conditional posterior distribution of $\beta_{i}^{b}$ as given above, and a value of $\beta_{i}^{b}$ is randomly drawn from it. This three-step process is repeated many times. Given sufficient simulations, $\mathrm{P}\left(\beta_{i}^{b} \mid \mathrm{T}, \psi^{*}\right)$ should be equivalent to $\mathrm{P}\left(\beta_{i}^{b} \mid \mathrm{T}\right)$. Therefore, by repeating this process many times, the computer simulates the integration process by producing a kernal density of the unconditional distribution. Now, the mean of this distribution should be the point estimate of the turnout rate of blacks in the precinct in King's example or, in my case, the registration rate of Latinos in a county.

Therefore, by simply using all of the information that the known aggregate data yield, making three reasonable assumptions, using several reparameterizations, and combining two statistical techniques (maximum likelihood and

Monte Carlo simulation), the unknown quantities of interest and their errors can be estimated.

In Chapter 3, I begin by estimating the voting-age population for Latinos and whites in Los Angeles and other California counties in the general elections held during the 1980s and 1990s. Using these county-level VAP estimates, I then extrapolate the Latino and white voting-age populations for California and for its six different regions (Southern California, Bay Area, Central Coast, Central Valley, Mountains, and Northern California). Then in Chapters 4 and 5, I use the VAP estimates combined with county-level data of registration and turnout rates to make county-level estimates of Latino and white registration and turnout rates using the method of generalized bounds (for a brief discussion of applying the method of generalized bounds to this problem, see the Appendix).

## Chapter 3. The California White and Latino Voting-Age Populations

The California Latino population is growing rapidly. To begin to understand how this growth will influence national, state, and local politics, in this chapter, I calculate the size and compare the characteristics of California's white and Latino voting-age populations (VAPs) for each county and each general election between 1980 and 1998. By examining 10 election cycles, I hope to gain a better understanding of the long-term growth in the Latino voting-age population. I examine the Latino and white VAPs by geographic region and then by urban versus rural environment to determine the Latino concentration and political potential in California and to identify regional and county differences in the Latino and white VAPs. First, I consider the voting-age population for whites and Latinos for the five general elections of the 1980s. Then, I consider these populations for the five general elections of the 1990s. Finally, I compare these findings and consider what they imply for Latino political power in the Golden State.

Recognizing that voting-age population size and concentration represent only the potential but not the actual political participation rates of these populations, in the next two chapters, I use these county-level estimates of Latino and white voting-age populations coupled with county-level figures of registration and turnout to produce estimates of Latino and white voter registration during the ten general elections of the 1980s and 1990s and turnout
for each county during the five general elections of the 1990s employing the method of generalized bounds.

I begin by estimating the voting-age population for Latinos and whites in California's 58 counties for the 10 general elections of the 1980 s and 1990 s. To estimate the VAP for each county, I perform a two-stage procedure. First, I calculate the VAP proportion for each county and then, using this proportion, I calculate the Latino and white VAPs for Latinos for each county and each election.

To calculate the VAP proportion for each county, I needed county-level data and a method that would allow me to control for age, citizenship, and felony convictions. Unfortunately, I was unable to rely on 1980 U.S. Census data because adequate data regarding age and citizenship status were not available at the county level. ${ }^{25}$ Therefore, instead, I used the total voting-age population as estimated by the California Secretary of State's office in the "Statement of the Vote." For the 1990 general elections, to calculate the VAP proportion for each county, I use 1990 U.S. Census data. ${ }^{26}$ First, I calculate the voting-eligible population for each county by controlling for age, citizenship, and felony

[^18]convictions. ${ }^{27}$ Then, I divide this voting-eligible population by the total population of the county to obtain the VAP proportion. ${ }^{28}$ I assume the VAP proportion for each county remains constant from 1990 to $1998 .{ }^{29} 30 \quad 31$


#### Abstract

${ }^{27}$ The exact calculation is has follows. For each county, I added the number of native-born and naturalized citizens eighteen years old and older and, from this population, subtracted the number of individuals in correctional institutions. I divided this voting-eligible population by the total population of the county to obtain the VAP proportion. The number of individuals in correctional institutions is a good approximation of felony convictions. As of November 1999, less than 2 percent of the California prison population were not felony convictions. See the California Department of Corrections Web site, www.cdc.state.ca.us.


${ }^{28}$ For each county's total population, I used the Demographic Research Unit of the California Department of Finance's data set entitled Race/Ethnic Population with Age and Sex Detail, 1970-2040, which is available at the department's Web site, www.dof.ca.gov. These data were used because the Demographic Research Unit of the California Department of Finance is designated as the single official source of demographic data for state planning and budgeting, and these data provided me with the necessary yearly projections of county-level total populations classified by ethnicity.
${ }^{29}$ The U.S. Bureau of the Census does not provide intercensus updates on these county populations, making updated estimates impossible to obtain.
${ }^{30}$ My ecological inference calculations and grouped logit analyses are based on these VAP calculations. A change in this method or these calculations would alter the results.
${ }^{31}$ Admittedly, my VAP calculation is somewhat limited by the available data. Inherent, in my calculation is the assumption that citizenship rates do not vary across the subpopulations within a county. I made this assumption because county-level information about citizenship by ethnicity is not available. I believed that citizenship rates would vary from county to county, making it important to use the information available from individual counties; therefore, I relied on the 1990 Census, which is the only source of county-level citizenship data. However, existing survey evidence suggests that there may be a difference between Latino and white citizenship rates. For example, the Current Population Report (P20-504) entitled Voting and Registration in the Election of November 1996 of the Current Population Survey found that the total California Hispanic

To calculate the Latino and white VAPs for each county, I multiply the total Latino and white populations for each county as estimated by the California Department of Finance by the VAP proportion for each election year. Using these county-level VAP estimates, I then extrapolate the Latino and white votingage populations for California and its six different geographic regions (Southern California, Bay Area, Central Coast, Central Valley, Mountains, and Northern California). The estimates for the 1980 elections are provided in Table 1a (for individual county estimates, see Table A1 in the Appendix). I have also included Los Angeles County in Table 1a because it has the largest Latino voting-age

[^19]population of any metropolitan county in California and the fastest growing Latino voting-age population in the state.

Table 1a shows that, while the Latino voting-eligible population increased each election year in each region, the white voting-eligible population decreased in each election year in every region. This stunning result is best illustrated by considering Los Angeles County. When the Los Angeles County voting-age populations of Latinos and of whites are considered, we see that the proportion of voting-age Latinos was 28 percent in 1980 and increased to 36 percent in eight years, which is more than twice the level for the state as a whole (17 percent in 1988). These election year increases are gradual and consistent in size, with an average increase of 2 percent per year. During the same period, the white voting-eligible population in Los Angeles County decreased by 10 percent, from 53 percent to 43 percent. As this example shows, the relative potential political power of Latinos was increasing throughout the state. However, the increase was unevenly distributed across the state's six geographic regions, with the voting-eligible populations of Latinos concentrated in the Central Valley, the Central Coast, and Southern California. All three of these regions experienced significant percentage increases in the 1980s, with an average increase of 5 percent over the five elections. During this eight-year
Table 1a: Latino and White VAP as a Percent of Total VAP, 1980-1988

|  | Latinos |  |  |  |  | Whites |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Geographic Regions | 1980 | 1982 | 1984 | 1986 | 1988 | 1980 | 1982 | 1984 | 1986 | 1988 |
| California | $\begin{gathered} \hline 0.133 \\ {[0.108]} \end{gathered}$ | $\begin{gathered} \hline 0.142 \\ {[0.112]} \end{gathered}$ | $\begin{gathered} \hline 0.151 \\ {[0.116]} \end{gathered}$ | $\begin{gathered} \hline 0.160 \\ {[0.120]} \end{gathered}$ | $\begin{gathered} \hline 0.168 \\ {[0.124]} \end{gathered}$ | $\begin{gathered} \hline \hline 0.792 \\ {[0.129]} \end{gathered}$ | $\begin{gathered} \hline \hline 0.776 \\ {[0.135]} \end{gathered}$ | $\begin{gathered} \hline 0.761 \\ {[0.140]} \end{gathered}$ | $\begin{gathered} \hline \hline 0.747 \\ {[0.145]} \end{gathered}$ | $\begin{gathered} \hline 0.734 \\ {[0.150]} \end{gathered}$ |
| Southern | $\begin{gathered} \hline 0.253 \\ {[0.158]} \end{gathered}$ | $\begin{gathered} \hline 0.274 \\ {[0.159]} \end{gathered}$ | $\begin{gathered} \hline 0.291 \\ {[0.163]} \end{gathered}$ | $\begin{gathered} \hline 0.308 \\ {[0.164]} \end{gathered}$ | $\begin{gathered} 0.323 \\ {[0.167]} \end{gathered}$ | $\begin{gathered} 0.653 \\ {[0.157]} \end{gathered}$ | $\begin{gathered} 0.625 \\ {[0.155]} \end{gathered}$ | $\begin{gathered} \hline 0.602 \\ {[0.156]} \end{gathered}$ | $\begin{gathered} \hline 0.578 \\ {[0.153]} \end{gathered}$ | $\begin{gathered} \hline 0.559 \\ {[0.153]} \end{gathered}$ |
| Bay Area | $\begin{gathered} 0.106 \\ {[0.044]} \end{gathered}$ | $\begin{gathered} 0.108 \\ {[0.038]} \end{gathered}$ | $\begin{gathered} 0.116 \\ {[0.039]} \end{gathered}$ | $\begin{gathered} 0.122 \\ {[0.039]} \end{gathered}$ | $\begin{gathered} 0.128 \\ {[0.040]} \end{gathered}$ | $\begin{gathered} 0.747 \\ {[0.127]} \end{gathered}$ | $\begin{gathered} 0.728 \\ {[0.129]} \end{gathered}$ | $\begin{gathered} 0.711 \\ {[0.132]} \end{gathered}$ | $\begin{gathered} 0.695 \\ {[0.135]} \end{gathered}$ | $\begin{gathered} 0.679 \\ {[0.137]} \end{gathered}$ |
| Central Coast | $\begin{gathered} 0.228 \\ {[0.126]} \end{gathered}$ | $\begin{gathered} 0.240 \\ {[0.123]} \end{gathered}$ | $\begin{gathered} 0.250 \\ {[0.119]} \end{gathered}$ | $\begin{gathered} 0.260 \\ {[0.116]} \end{gathered}$ | $\begin{gathered} \hline 0.269 \\ {[0.114]} \end{gathered}$ | $\begin{gathered} 0.712 \\ {[0.129]} \end{gathered}$ | $\begin{gathered} 0.698 \\ {[0.125]} \end{gathered}$ | $\begin{gathered} 0.685 \\ {[0.123]} \end{gathered}$ | $\begin{gathered} 0.673 \\ {[0.121]} \end{gathered}$ | $\begin{gathered} 0.662 \\ {[0.119]} \end{gathered}$ |
| Central Valley | $\begin{gathered} 0.222 \\ {[0.068]} \end{gathered}$ | $\begin{gathered} 0.237 \\ {[0.072]} \end{gathered}$ | $\begin{gathered} 0.250 \\ {[0.076]} \end{gathered}$ | $\begin{gathered} 0.262 \\ {[0.080]} \end{gathered}$ | $\begin{gathered} 0.272 \\ {[0.083]} \end{gathered}$ | $\begin{gathered} 0.699 \\ {[0.060]} \end{gathered}$ | $\begin{gathered} 0.675 \\ {[0.063]} \end{gathered}$ | $\begin{gathered} 0.653 \\ {[0.067]} \end{gathered}$ | $\begin{gathered} 0.635 \\ {[0.069]} \end{gathered}$ | $\begin{gathered} \hline 0.615 \\ {[0.074]} \end{gathered}$ |
| Mountains | $\begin{gathered} 0.066 \\ {[0.042]} \end{gathered}$ | $\begin{gathered} 0.073 \\ {[0.048]} \end{gathered}$ | $\begin{gathered} 0.079 \\ {[0.055]} \end{gathered}$ | $\begin{gathered} 0.085 \\ {[0.061]} \end{gathered}$ | $\begin{gathered} 0.090 \\ {[0.066]} \end{gathered}$ | $\begin{gathered} 0.885 \\ {[0.058]} \end{gathered}$ | $\begin{gathered} \hline 0.873 \\ {[0.066]} \end{gathered}$ | $\begin{gathered} \hline 0.862 \\ {[0.073]} \end{gathered}$ | $\begin{gathered} \hline 0.852 \\ {[0.080]} \end{gathered}$ | $\begin{gathered} \hline 0.843 \\ {[0.087]} \end{gathered}$ |
| Northern | $\begin{gathered} \hline 0.054 \\ {[0.025]} \end{gathered}$ | $\begin{gathered} 0.061 \\ {[0.030]} \end{gathered}$ | $\begin{gathered} 0.067 \\ {[0.055]} \end{gathered}$ | $\begin{gathered} \hline 0.073 \\ {[0.039]} \end{gathered}$ | $\begin{gathered} 0.078 \\ {[0.043]} \end{gathered}$ | $\begin{gathered} 0.899 \\ {[0.028]} \end{gathered}$ | $\begin{gathered} \hline 0.889 \\ {[0.032]} \end{gathered}$ | $\begin{gathered} \hline 0.880 \\ {[0.037]} \end{gathered}$ | $\begin{gathered} \hline 0.871 \\ {[0.042]} \end{gathered}$ | $\begin{gathered} 0.863 \\ {[0.046]} \end{gathered}$ |
| Los Angeles | 0.279 | 0.302 | 0.324 | 0.344 | 0.363 | 0.534 | 0.505 | 0.478 | 0.453 | 0.430 |

Note: The stardard error for each estimate is shown in brackets.
period, the Latino VAP in the Southern California region was the largest and grew more rapidly than that of any other region in the state. In 1980, the Southern California region had a Latino VAP of 25 percent, which grew to 32 percent in 1988.

Now, I turn my attention to the Latino and white voting-eligible populations of the five general elections in the 1990s (for individual county estimates, see Table A2 in the Appendix). Table 1b clearly demonstrates a similar pattern of Latino VAP growth and concentration. Again as found in the 1980s, the Latino voting-eligible population continued to increase in each election year in each region, while the white voting-eligible population decreased in each election year in every region. As was true during the 1980s, there is a substantial increase in the Latino VAP in Los Angeles County. The proportion of voting-age Latinos was 38 percent in 1990 and increased to 44 percent by 1998, which is more than twice the level for the state as a whole ( 20 percent in 1998). During the same period, the white voting-eligible population in Los Angeles County decreased by 7 percent, from 41 percent to 34 percent. Simply, in only 18 years and 10 election cycles, whites went from having a majority of the voting-age population in Los Angeles (53 percent in 1980) to having only one-third of the voting-age population by 1998. At this rate, Latinos should constitute a majority of the voting-age population in Los Angeles County by the year 2004.
Table 1b: Latino and White VAP as a Percent of Total VAP, 1990-1998

|  | Latinos |  |  |  |  |  | Whites |  |  |  |  |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Geographic Regions | 1990 | 1992 | 1994 | 1996 | 1998 |  | 1990 | 1992 | 1994 | 1996 | 1998 |
| California | 0.176 | 0.182 | 0.188 | 0.194 | 0.201 |  | 0.722 | 0.713 | 0.704 | 0.695 | 0.685 |
|  | $[0.127]$ | $[0.130]$ | $[0.133]$ | $[0.135]$ | $[0.138]$ |  | $[0.153]$ | $[0.158]$ | $[0.162]$ | $[0.166]$ | $[0.170]$ |$]$

Note: The stardard error for each estimate is shown in brackets.

However, as found in the 1980s, the Latino VAP continues to be concentrated in the Central Valley, the Central Coast, and Southern California. Southern California continues to have the largest Latino VAP and the fastest growing Latino VAP of any region in the state. By 1998, the Latino VAP in this region was 38 percent, an increase of 13 percent from what it was in 1980 (25 percent).

The observed concentration of the Latino voting-eligible population in the Central Valley, Central Coast, and Southern California can be explained in part by the fact that these three regions contain the top 10 producing agricultural counties in the state (Tables 2 a and 2 b ). ${ }^{32}$ Historically, California has relied on Mexico as source of inexpensive labor to work in its fields. ${ }^{33}$

[^20]Table 2a: Latino and White VAP as a Percent of Total VAP, 1980-1988 California's Top 10 Producing Agricultural, or Rural, Counties

|  | Latinos |  |  |  |  | Whites |  |  |  |  |  |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| County | $\mathbf{1 9 8 0}$ | $\mathbf{1 9 8 2}$ | $\mathbf{1 9 8 4}$ | $\mathbf{1 9 8 6}$ | $\mathbf{1 9 8 8}$ |  | $\mathbf{1 9 8 0}$ | $\mathbf{1 9 8 2}$ | $\mathbf{1 9 8 4}$ | $\mathbf{1 9 8 6}$ | $\mathbf{1 9 8 8}$ |
| Fresno | 0.294 | 0.31 | 0.323 | 0.335 | 0.346 |  | 0.619 | 0.592 | 0.568 | 0.546 | 0.526 |
| Imperial | 0.561 | 0.584 | 0.605 | 0.624 | 0.643 |  | 0.387 | 0.365 | 0.344 | 0.325 | 0.307 |
| Kern | 0.218 | 0.234 | 0.248 | 0.26 | 0.271 |  | 0.7 | 0.682 | 0.666 | 0.652 | 0.639 |
| Merced | 0.255 | 0.273 | 0.289 | 0.303 | 0.316 |  | 0.665 | 0.635 | 0.608 | 0.583 | 0.562 |
| Monterey | 0.261 | 0.279 | 0.3 | 0.311 | 0.325 |  | 0.605 | 0.586 | 0.569 | 0.553 | 0.538 |
| Riverside | 0.191 | 0.213 | 0.23 | 0.244 | 0.255 |  | 0.74 | 0.711 | 0.689 | 0.671 | 0.657 |
| San Diego | 0.15 | 0.161 | 0.176 | 0.187 | 0.197 |  | 0.742 | 0.72 | 0.7 | 0.683 | 0.667 |
| San Joaquin | 0.193 | 0.204 | 0.213 | 0.221 | 0.229 |  | 0.689 | 0.663 | 0.641 | 0.621 | 0.604 |
| Stanislaus | 0.152 | 0.17 | 0.185 | 0.198 | 0.209 |  | 0.807 | 0.781 | 0.758 | 0.738 | 0.721 |
| Tulare | 0.301 | 0.322 | 0.342 | 0.359 | 0.375 |  | 0.655 | 0.629 | 0.605 | 0.584 | 0.564 |

Table 2b: Latino and White VAP as a Percent of Total VAP, 1990-1998 California's Top 10 Producing Agricultural, or Rural, Counties

|  | Latinos |  |  |  |  |  | Whites |  |  |  |  |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| County | 1990 | 1992 | $\mathbf{1 9 9 4}$ | $\mathbf{1 9 9 6}$ | $\mathbf{1 9 9 8}$ |  | 1990 | 1992 | 1994 | 1996 | 1998 |
| Fresno | 0.357 | 0.364 | 0.371 | 0.378 | 0.386 |  | 0.508 | 0.493 | 0.479 | 0.466 | 0.455 |
| Imperial | 0.66 | 0.668 | 0.684 | 0.691 | 0.713 |  | 0.29 | 0.274 | 0.26 | 0.247 | 0.225 |
| Kern | 0.281 | 0.291 | 0.299 | 0.308 | 0.32 |  | 0.628 | 0.616 | 0.605 | 0.594 | 0.579 |
| Merced | 0.327 | 0.337 | 0.346 | 0.354 | 0.36 |  | 0.543 | 0.527 | 0.513 | 0.5 | 0.492 |
| Monterey | 0.338 | 0.351 | 0.365 | 0.377 | 0.391 |  | 0.524 | 0.51 | 0.495 | 0.481 | 0.47 |
| Riverside | 0.264 | 0.271 | 0.277 | 0.283 | 0.29 |  | 0.645 | 0.635 | 0.626 | 0.618 | 0.608 |
| San Diego | 0.206 | 0.215 | 0.223 | 0.231 | 0.241 |  | 0.654 | 0.641 | 0.629 | 0.618 | 0.605 |
| San Joaquin | 0.235 | 0.24 | 0.245 | 0.249 | 0.254 |  | 0.588 | 0.576 | 0.565 | 0.555 | 0.544 |
| Stanislaus | 0.219 | 0.228 | 0.235 | 0.242 | 0.249 |  | 0.705 | 0.692 | 0.681 | 0.67 | 0.66 |
| Tulare | 0.389 | 0.402 | 0.413 | 0.424 | 0.437 |  | 0.546 | 0.531 | 0.518 | 0.505 | 0.491 |

All of these counties have substantial Latino voting-eligible populations, and in none of these counties was the proportion of voting-eligible Latinos less than 30 percent in 1998 , which is one and one-half times the level for the state (20 percent). It is also important to note that an agricultural county, Imperial County, has the largest proportion of voting-eligible Latinos in the state (71 percent in 1998). This relatively high Latino VAP is more than three and one-half times the level for the state as a whole and more than one and one-half times the level for Los Angeles County, which has the largest Latino voting-age population of any metropolitan county in California (44 percent). Since 1980, more than half of Imperial County's voting-age population has been Latino.

Next, I consider which metropolitan, or urban, counties have significant Latino voting-eligible populations (Tables $3 a$ and $3 b$ ). In 1980, only two metropolitan counties, Los Angeles and Ventura, had Latino voting-eligible populations greater than 20 percent. By 1990, there were seven metropolitan counties with Latino voting-eligible populations greater than 20 percent. Three of these counties are located in the Southern California and Central Coast regions, and one of them is in the Bay Area region. ${ }^{34}$ Los Angeles has the largest Latino voting-eligible population of any of these counties, with 44 percent in 1998. The next largest Latino voting-eligible population can be found in Santa Barbara

[^21]Table 3a: Latino and White VAP as a Percent of Total VAP, 1980-1988
Urban Counties with Latino VAP > 0.20

|  | Latinos |  |  |  |  | Whites |  |  |  |  |  |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| County | 1980 | 1982 | 1984 | 1986 | 1988 |  | 1980 | 1982 | 1984 | 1986 | 1988 |
| Los Angeles | 0.279 | 0.302 | 0.324 | 0.344 | 0.363 |  | 0.534 | 0.505 | 0.478 | 0.453 | 0.43 |
| Ventura | 0.215 | 0.227 | 0.238 | 0.248 | 0.257 |  | 0.817 | 0.799 | 0.782 | 0.766 | 0.751 |

Note: I automatically excluded the top 10 agricultural, or rural, counties. For the remaining counties with a Latino VAP proportion greater than 0.20 , I used the 1980 Census Data and calculated the ratio of the
proportion living inside and outside urbanized areas. If this ratio was
greater than 1 to 10 (10 percent), I excluded the county.
Table 3b: Latino and White VAP as a Percent of Total VAP, 1990-1998 Urban Counties with Latino VAP $\mathbf{>} \mathbf{0 . 2 0}$

|  | Latinos |  |  |  |  | Whites |  |  |  |  |  |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| County | $\mathbf{1 9 9 0}$ | $\mathbf{1 9 9 2}$ | $\mathbf{1 9 9 4}$ | $\mathbf{1 9 9 6}$ | $\mathbf{1 9 9 8}$ |  | 1990 | 1992 | 1994 | 1996 | 1998 |
| Los Angeles | 0.38 | 0.396 | 0.41 | 0.424 | 0.44 |  | 0.408 | 0.388 | 0.368 | 0.35 | 0.335 |
| Orange | 0.236 | 0.249 | 0.261 | 0.272 | 0.286 |  | 0.643 | 0.624 | 0.606 | 0.589 | 0.57 |
| San Bernardino | 0.268 | 0.279 | 0.289 | 0.297 | 0.311 |  | 0.608 | 0.592 | 0.578 | 0.566 | 0.547 |
| Santa Barbara | 0.267 | 0.279 | 0.291 | 0.301 | 0.316 |  | 0.661 | 0.647 | 0.634 | 0.622 | 0.606 |
| Santa Clara | 0.211 | 0.218 | 0.224 | 0.23 | 0.238 |  | 0.58 | 0.559 | 0.539 | 0.52 | 0.497 |
| Santa Cruz | 0.205 | 0.214 | 0.222 | 0.23 | 0.238 |  | 0.746 | 0.735 | 0.725 | 0.715 | 0.706 |
| Ventura | 0.266 | 0.274 | 0.282 | 0.289 | 0.3 |  | 0.658 | 0.647 | 0.637 | 0.627 | 0.612 |

Note: I automatically excluded the top 10 agricultural, or rural, counties. For the remaining counties with a Latino VAP proportion greater than 0.20 , I used the 1990 Census Data, Database C90STF3A, and calculated the ratio of the proportion living inside and outside urbanized areas. If this ratio was greater than 1 to 10 ( 10 percent), I excluded the county.

County with 32 percent in 1998. The results in Tables $2 a$ and $2 b$, and Tables $3 a$ and 3b emphasize the fact there are more agricultural, or rural, counties with a Latino voting-eligible population of at least 20 percent than there are metropolitan, or urban, counties with Latino VAPs that are this high. However, these results also clearly show that the Latino voting-eligible population is growing rapidly in urban, or metropolitan, areas as well, with seven urban counties having Latino voting-eligible populations ranging from 24 percent to 44 percent in 1998 while eight years earlier (in 1980), only two urban counties had Latino voting-eligible populations of greater than 20 percent.

As of 1998 , there are a total of 22 counties with Latino voting-eligible populations of at least 20 percent (see Table A1 in the Appendix). Of these 22 counties, 15 are rural counties (including the top 10 producing agricultural counties in the California, see Table 2 a and 2 b ) and seven are metropolitan, or urban, counties (see Tables 3 a and $3 b$ ). ${ }^{35}$

Throughout the state in both urban and rural counties, during the previous 10 general elections (from 1980 to 1998), the Latino VAP in California has consistently and gradually grown larger while, at the same time, the white VAP has declined. The Latino VAP has increasingly concentrated itself in three regions of California-Southern California, Central Valley, and Central Coastand in urban counties. In 1998, there were twice as many rural counties with significant Latino VAPs as there were urban counties. However, there is a
growing and significant presence of Latinos in urban counties, with seven counties having Latino VAPs of greater than 20 percent in 1990, which represents an increase of three and one-half times the number in 1980, when there were only two such counties. To see if Latinos are taking advantage of this increase in relative numbers and potential political power, in the following two chapters, I calculate and analyze Latino registration and turnout rates.

[^22]
## Chapter 4. Latino and White Registration, 1980-1998

Recognizing that voting-age population indicates only the potential but not the actual political participation rates of these populations, in this chapter, I consider registration. I use county-level estimates of the voting-age population calculated in the previous chapter and of voter registration to estimate the registration rates for Latinos and whites in California and present these estimates for the state, the six regions, and Los Angeles County. The estimates for the five general elections in the 1980s are presented in Table 4a (for a brief discussion of applying the method of generalized bounds to this problem, see the Appendix and for individual county estimates, see Table A3 in the Appendix).

Latino voter registration was volatile in the 1980s in each region and throughout the state (see Table 4a). California's Latino voter registration rate nearly doubled from 1980 to 1982. Between 1982 and 1984, again there were significant increases in Latino registration in the state and in each region. For example, California's Latino registration rate nearly tripled between 1980 and 1984. This rate jumped from 19 percent in 1980 to 36 percent in 1982 and had increased to 57 percent by 1984. However, the Latino registration rate peaks in 1984 and decreases in the following two elections, settling to a level similar to that of Latino registration in 1982. Although the Latino registration rate rises and falls during the five elections and certainly could be labeled unstable, there is a significant and permanent increase in Latino registration between 1980 and
Table 4a: Latino and White Voter Registration, 1980-1988

|  | Latinos |  |  |  |  |  | Whites |  |  |  |  |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Geographic Regions | 1980 | 1982 | 1984 | 1986 | 1988 |  | 1980 | 1982 | 1984 | 1986 | 1988 |
| California | 0.189 | 0.361 | 0.572 | 0.464 | 0.378 |  | 0.894 | 0.779 | 0.816 | 0.799 | 0.78 |
|  | $[0.095]$ | $[0.081]$ | $[0.003]$ | $[0.005]$ | $[0.001]$ |  | $[0.005]$ | $[0.003]$ | $[0.004]$ | $[0.006]$ | $[0.007]$ |
| Southern | 0.181 | 0.363 | 0.564 | 0.482 | 0.38 |  | 0.899 | 0.779 | 0.802 | 0.81 | 0.778 |
|  | $[0.123]$ | $[0.037]$ | $[0.001]$ | $[0.004]$ | $[0.007]$ |  | $[0.001]$ | $[0.001]$ | $[0.001]$ | $[0.002]$ | $[0.003]$ |
| Bay Area | 0.226 | 0.388 | 0.6 | 0.467 | 0.372 |  | 0.905 | 0.801 | 0.857 | 0.826 | 0.814 |
|  | $[0.080]$ | $[0.017]$ | $[0.001]$ | $[0.001]$ | $[0.0003]$ |  | $[0.001]$ | $[0.001]$ | $[0.002]$ | $[0.002]$ | $[0.001]$ |
| Central Coast | 0.23 | 0.424 | 0.635 | 0.36 | 0.417 |  | 0.906 | 0.789 | 0.84 | 0.706 | 0.766 |
|  | $[0.079]$ | $[0.015]$ | $[0.002]$ | $[0.045]$ | $[0.002]$ |  | $[0.001]$ | $[0.002]$ | $[0.002]$ | $[0.027]$ | $[0.007]$ |
| Central Valley | 0.165 | 0.292 | 0.545 | 0.443 | 0.357 |  | 0.866 | 0.754 | 0.795 | 0.792 | 0.759 |
|  | $[0.122]$ | $[0.052]$ | $[0.004]$ | $[0.004]$ | $[.0009]$ |  | $[0.004]$ | $[0.001]$ | $[0.004]$ | $[0.003]$ | $[0.005]$ |
| Mountains | 0.253 | 0.342 | 0.577 | 0.45 | 0.369 |  | 0.875 | 0.755 | 0.814 | 0.775 | 0.746 |
|  | $[0.073]$ | $[0.019]$ | $[0.005]$ | $[0.001]$ | $[0.001]$ |  | $[0.008]$ | $[0.003]$ | $[0.005]$ | $[0.003]$ | $[0.010]$ |
| Northern | 0.225 | 0.35 | 0.556 | 0.449 | 0.376 |  | 0.841 | 0.758 | 0.782 | 0.763 | 0.742 |
|  | $[0.065]$ | $[0.018]$ | $[0.001]$ | $[0.001]$ | $[0.001]$ |  | $[0.006]$ | $[0.005]$ | $[0.005]$ | $[0.005]$ | $[0.009]$ |
| Los Angeles | 0.169 | 0.354 | 0.556 | 0.4682 | 0.382 |  | 0.894 | 0.764 | 0.794 | 0.794 | 0.764 |

Note: Because throughout this statistical material I am controlling for population size, all of these proportions have been weighted to reflect relative numbers of Latinos and whites living in these regions. The standard errors for the geographic region estimates are given in brackets below the estimates.
1988. Statewide, the Latino registration rate doubles in this period, from 19 percent to 38 percent.

During this same period, there are two significant differences between white and Latino registration rates. First, the white registration rate is much less volatile than the Latino rate, which suggests that the white electorate is more consistent and predictable and may also be less susceptible to campaign messages and issues. For example, the white state registration rate changed an average of 4 percent each election while the Latino state registration rate changed an average of 14 percent, more than three times the rate of change for white registration. Second, the white registration rate is much higher. For example, in 1988, the state white registration rate was more than double the state Latino registration rate (78 percent as compared with 38 percent). However, although whites consistently registered at a higher rate than Latinos, the increase in Latino participation was greater. The state white registration rate actually decreased from 89 percent in 1980 to 78 percent in 1988 , while the state Latino registration rate increased from 19 percent to 38 percent.

Now, I consider the Latino and white registration rates of the five general elections during the 1990s (see Table 4b; for individual county estimates, see Table A4).
Table 4b: Latino and White Voter Registration, 1990-1998

|  | Latinos |  |  |  |  |  | Whites |  |  |  |  |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Geographic Regions | 1990 | 1992 | 1994 | 1996 | 1998 |  | 1990 | 1992 | 1994 | 1996 | 1998 |
| California | 0.523 | 0.594 | 0.611 | 0.607 | 0.528 |  | 0.812 | 0.866 | 0.815 | 0.88 | 0.83 |
|  | $[0.003]$ | $[0.006]$ | $[0.002]$ | $[0.002]$ | $[0.006]$ |  | $[0.002]$ | $[0.002]$ | $[0.003]$ | $[0.001]$ | $[0.002]$ |
| Southern | 0.537 | 0.589 | 0.611 | 0.605 | 0.54 |  | 0.804 | 0.856 | 0.803 | 0.874 | 0.821 |
|  | $[0.007]$ | $[0.002]$ | $[0.001]$ | $[0.001]$ | $[0.012]$ |  | $[0.0003]$ | $[0.003]$ | $[0.001]$ | $[0.0001]$ | $[0.0003]$ |
| Bay Area | 0.499 | 0.649 | 0.608 | 0.615 | 0.474 |  | 0.842 | 0.89 | 0.842 | 0.895 | 0.829 |
|  | $[0.001]$ | $[0.010]$ | $[0.001]$ | $[0.002]$ | $[0.003]$ |  | $[0.001]$ | $[0.001]$ | $[0.001]$ | $[0.001]$ | $[0.0003]$ |
| Central Coast | 0.503 | 0.654 | 0.646 | 0.695 | 0.628 |  | 0.814 | 0.884 | 0.841 | 0.905 | 0.861 |
|  | $[0.003]$ | $[0.009]$ | $[0.002]$ | $[0.005]$ | $[0.017]$ |  | $[0.001]$ | $[0.002]$ | $[0.002]$ | $[0.001]$ | $[0.001]$ |
| Central Valley | 0.495 | 0.534 | 0.598 | 0.561 | 0.478 |  | 0.806 | 0.852 | 0.805 | 0.863 | 0.823 |
|  | $[0.004]$ | $[0.007]$ | $[0.002]$ | $[0.001]$ | $[.004]$ |  | $[0.001]$ | $[0.001]$ | $[0.001]$ | $[0.0002]$ | $[0.0003]$ |
| Mountains | 0.48 | 0.564 | 0.597 | 0.6 | 0.516 |  | 0.798 | 0.855 | 0.815 | 0.884 | 0.851 |
|  | $[0.001]$ | $[0.003]$ | $[0.002]$ | $[0.001]$ | $[0.003]$ |  | $[0.004]$ | $[0.002]$ | $[0.004]$ | $[0.001]$ | $[0.002]$ |
| Northern | 0.474 | 0.56 | 0.584 | 0.587 | 0.47 |  | 0.774 | 0.822 | 0.788 | 0.868 | 0.789 |
|  | $[0.0002]$ | $[0.002]$ | $[0.001]$ | $[0.001]$ | $[0.002]$ |  | $[0.003]$ | $[0.002]$ | $[0.006]$ | $[0.003]$ | $[0.003]$ |
| Los Angeles | 0.583 | 0.602 | 0.627 | 0.625 | 0.607 |  | 0.816 | 0.854 | 0.798 | 0.885 | 0.836 |

Note: Because throughout this statistical material I am controlling for population size, all of these proportions have been weighted to reflect relative numbers of Latinos and whites living in these regions. The standard errors for the geographic region estimates are given in brackets below the estimates.

First, during the 1990s, the Latino voter registration rate appears to be more stable and to mirror more closely the minor fluctuations seen in the white registration rate with an average change of only 4.5 percent during each election. Second, as in the 1980s, there appears to be a significant and permanent increase in Latino registration between 1988 and 1990. In 1980, the state Latino registration rate is only 38 percent, but in 1990, it jumps to 52 percent, an increase of 14 percent. Although the Latino registration rate experiences small increases, reaching a high of 61 percent in 1996, it does not drop below this majority registration rate throughout the 1990s. It is important to note that the minor increases in Latino registration during the 1994 and 1996 elections and the continued registration of Latinos at such a high level compared with their registration during the 1980s may in part be caused by the surfacing of several divisive issues in California politics, namely, immigration and affirmative action.

Although there appears to be a significant and permanent increase in Latino registration, the white registration rate is still considerably higher. In 1998, the state white registration rate was 83 percent, and the Latino registration rate was only 52 percent. Again, as during the 1980s, whites registered at a higher rate than did Latinos, but the increase in Latino registration was greater.

Now, recalling that the Latino VAP is concentrated in the Southern California, Central Coast, and Central Valley regions (see Tables 1a and 1b), it is
interesting to note that the Latino registration rate in the Central Valley is below the state rate in all 10 elections. In the previous four elections (1992-1998), the Latino registration rate in the Central Coast region exceeded the state rate, and the Latino registration rate in the Southern California region fluctuated around the state average. These results suggest that Latinos are not taking full advantage of their political potential.

Now, given these Latino and white registration rates, I can begin to compare registration rates between urban and rural counties and test if the size of a county's Latino VAP influences registration as predicted in Chapter 1. In Chapter 1, I hypothesized that registration rates would be higher in the urban counties than in rural counties because of the availability of resources and support groups. When the registration rates are considered in California's top ten producing agricultural counties, Tables 5 a and 5 b show that Imperial County, the county with the largest Latino VAP in the state, has had consistently high registration rates since 1980. The Latino registration rate was 58 percent in 1980 and, eighteen years later, in 1998, was still 58 percent, suggesting that the magnitude of the Latino VAP in a county may positively influence the Latino registration rate more than whether or not the county is classified as urban or rural.
Table 5a: Latino and White Voter Registration, 1980-1988
California's Top 10 Producing Agricultural, or Rural, Counties

|  | Latinos |  |  |  |  |  | Whites |  |  |  |  |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| County | 1980 | $\mathbf{1 9 8 2}$ | $\mathbf{1 9 8 4}$ | $\mathbf{1 9 8 6}$ | $\mathbf{1 9 8 8}$ |  | 1980 | 1982 | 1984 | 1986 | 1988 |
| Fresno | 0.1842 | 0.3231 | 0.5888 | 0.4988 | 0.3915 |  | 0.9034 | 0.757 | 0.8013 | 0.7891 | 0.7836 |
| Imperial | 0.5848 | 0.5097 | 0.585 | 0.5716 | 0.5538 |  | 0.8855 | 0.7769 | 0.7858 | 0.7812 | 0.7785 |
| Kern | 0.1356 | 0.2519 | 0.5574 | 0.4441 | 0.3516 |  | 0.838 | 0.7228 | 0.7751 | 0.7726 | 0.7313 |
| Merced | 0.1011 | 0.2332 | 0.4412 | 0.3488 | 0.2971 |  | 0.7952 | 0.7447 | 0.7198 | 0.7047 | 0.6416 |
| Monterey | 0.1099 | 0.3825 | 0.5962 | 0.1124 | 0.3804 |  | 0.8565 | 0.7788 | 0.8129 | 0.4307 | 0.7267 |
| Riverside | 0.2038 | 0.2873 | 0.5792 | 0.5171 | 0.343 |  | 0.904 | 0.7363 | 0.7844 | 0.8215 | 0.7351 |
| San Diego | 0.2107 | 0.4372 | 0.627 | 0.5678 | 0.3766 |  | 0.9253 | 0.8195 | 0.844 | 0.8615 | 0.8492 |
| San Joaquin | 0.1386 | 0.2628 | 0.5423 | 0.4425 | 0.3485 |  | 0.8911 | 0.7577 | 0.7728 | 0.7714 | 0.695 |
| Stanislaus | 0.1502 | 0.2691 | 0.4816 | 0.4306 | 0.3707 |  | 0.7352 | 0.6769 | 0.698 | 0.7481 | 0.7032 |
| Tulare | 0.1562 | 0.2685 | 0.4966 | 0.3477 | 0.3253 |  | 0.8694 | 0.7598 | 0.7487 | 0.7271 | 0.696 |

Table 5b: Latino and White Voter Registration, 1990-1998
California's Top 10 Producing Agricultural, or Rural, Counties

|  | Latinos |  |  |  |  |  | Whites |  |  |  |  |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| County | 1990 | 1992 | 1994 | 1996 | 1998 |  | 1990 | 1992 | 1994 | 1996 | 1998 |
| Fresno | 0.5701 | 0.5733 | 0.6405 | 0.5779 | 0.4991 |  | 0.8238 | 0.8506 | 0.8213 | 0.8683 | 0.815 |
| Imperial | 0.6106 | 0.6194 | 0.6254 | 0.6155 | 0.5847 |  | 0.8091 | 0.8433 | 0.8011 | 0.8688 | 0.8282 |
| Kern | 0.4903 | 0.4831 | 0.5821 | 0.5661 | 0.4996 |  | 0.7916 | 0.8134 | 0.7803 | 0.8539 | 0.822 |
| Merced | 0.456 | 0.4647 | 0.6017 | 0.5271 | 0.5831 |  | 0.7856 | 0.8246 | 0.7941 | 0.8543 | 0.8453 |
| Monterey | 0.4646 | 0.5598 | 0.5768 | 0.6318 | 0.4322 |  | 0.7869 | 0.847 | 0.7966 | 0.8774 | 0.8034 |
| Riverside | 0.4336 | 0.5335 | 0.5527 | 0.5441 | 0.3887 |  | 0.7657 | 0.8342 | 0.7586 | 0.8503 | 0.791 |
| San Diego | 0.4714 | 0.589 | 0.6102 | 0.5711 | 0.4556 |  | 0.8032 | 0.8705 | 0.8148 | 0.87 | 0.825 |
| San Joaquin | 0.464 | 0.5319 | 0.5889 | 0.5614 | 0.4326 |  | 0.7959 | 0.8508 | 0.7987 | 0.8758 | 0.811 |
| Stanislaus | 0.4155 | 0.5088 | 0.5725 | 0.549 | 0.4911 |  | 0.7533 | 0.8192 | 0.7637 | 0.8378 | 0.8226 |
| Tulare | 0.4927 | 0.4694 | 0.5705 | 0.5198 | 0.37 |  | 0.7686 | 0.8085 | 0.762 | 0.8486 | 0.7927 |

Half of these rural counties-Kern, Merced, San Joaquin, Stanislaus, and Tulare-have consistently had Latino registration rates below the state rate during all ten elections. This result suggests that Latinos are not taking full advantage of their political potential, which may be in part because of a lack of resources-time, money, and institutions.

When I consider the urban counties that have Latino VAPs of greater than 20 percent (see Tables 6a and 6b), I find that only Ventura County has consistently had registration rates above the state average in the past eighteen years with the exception of one election, 1990. During the 1990s, both Los Angeles and Santa Cruz Counties have had rates above the state average in each election. These preliminary results suggest that, contrary to the hypothesis, urban or rural residence may not be an important factor in Latino registration rates.
Table 6a: Latino and White Voter Registration, 1980-1988 Urban Counties with Latino VAP > 0.20

|  | Latinos |  |  |  | Whites |  |  |  |  |  |  |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| County | 1980 | 1982 | 1984 | 1986 | 1988 |  | 1980 | 1982 | 1984 | 1986 | 1988 |
| Los Angeles | 0.1693 | 0.3543 | 0.5559 | 0.4682 | 0.3819 |  | 0.8935 | 0.7643 | 0.7936 | 0.7939 | 0.764 |
| Ventura | 0.2458 | 0.405 | 0.6279 | 0.5718 | 0.4519 |  | 0.9254 | 0.7742 | 0.8368 | 0.8519 | 0.8445 |

Note: I automatically excluded the top 10 agricultural, or rural, counties. For the remaining counties with a Latino VAP proportion greater than 0.20 , I used the 1980 Census Data and calculated the ratio of the
proportion living inside and outside urbanized areas. If this ratio was greater than 1 to 10 (10 percent), I excluded the county.
Table 6b: Latino and White Voter Registration, 1990-1998
Urban Counties with Latino VAP > 0.20

|  | Latinos |  |  |  |  |  | Whites |  |  |  |  |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| County | 1990 | 1992 | 1994 | 1996 | 1998 |  | 1990 | 1992 | 1994 | 1996 | 1998 |
| Los Angeles | 0.5834 | 0.6016 | 0.6265 | 0.6253 | 0.6066 |  | 0.8164 | 0.854 | 0.8175 | 0.8846 | 0.8361 |
| Orange | 0.4754 | 0.6124 | 0.5885 | 0.5788 | 0.4607 |  | 0.8044 | 0.8694 | 0.7988 | 0.8752 | 0.8172 |
| San Bernardino | 0.4375 | 0.5044 | 0.5713 | 0.5955 | 0.4155 |  | 0.7916 | 0.8344 | 0.7806 | 0.8685 | 0.8029 |
| Santa Barbara | 0.5108 | 0.6872 | 0.7028 | 0.7921 | 0.7045 |  | 0.8062 | 0.8834 | 0.8706 | 0.9309 | 0.8785 |
| Santa Clara | 0.5213 | 0.6443 | 0.6062 | 0.5894 | 0.4164 |  | 0.8361 | 0.8919 | 0.8317 | 0.877 | 0.8142 |
| Santa Cruz | 0.5784 | 0.8247 | 0.6888 | 0.7021 | 0.6002 |  | 0.8744 | 0.9505 | 0.8982 | 0.9306 | 0.8675 |
| Ventura | 0.5038 | 0.6622 | 0.6486 | 0.6898 | 0.7246 |  | 0.8128 | 0.8859 | 0.8354 | 0.9067 | 0.8861 |

Note: I automatically excluded the top 10 agricultural, or rural, counties. For the remaining counties with a Latino VAP proportion greater than 0.20 , I used the 1990 Census Data, Database C90STF3A, and calculated the ratio of the proportion living inside and outside urbanized areas. If this ratio was greater than 1 to 10 ( 10 percent), I excluded the county.

Finally, I consider if Latinos are taking advantage of their political potential and if white registration rates are influenced by increasing Latino political participation. To answer these questions, I divide the counties into four categories based upon the size of the county's Latino VAP in 1980 for the elections of the 1980s and the size of the county's Latino VAP in 1990 for the elections of the 1990s. The four categories are as follows: (1) the Latino VAP is less than or equal to 10 percent, (2) the Latino VAP is more than 10 percent but less than or equal to 20 percent, (3) the Latino VAP is greater than 20 percent but less than or equal to 30 percent, and (4) the Latino VAP is greater than 30 percent. ${ }^{36}$


#### Abstract

${ }^{36}$ The 1980s categories are as follows. The counties with a Latino VAP of less than or equal to 10 percent in 1980 were Alameda, Alpine, Amador, Butte, Calaveras, Contra Costa, Del Norte, El Dorado, Humboldt, Inyo, Lake, Lassen, Marin, Mariposa, Mendocino, Modoc, Mono, Napa, Nevada, Placer, Plumas, Sacramento, San Luis Obispo, Shasta, Sierra, Siskiyou, Sonoma, Tehama, Trinity, Tuolumne, and Yuba. The counties with a Latino VAP of greater than 10 percent but less than or equal to 20 percent were Colusa, Glenn, Orange, Riverside, San Bernardino. San Diego, San Francisco, San Joaquin, San Mateo, Santa Barbara, Santa Clara, Santa Cruz, Solano, Stanislaus, Sutter, and Yolo. The counties with Latino VAPs with Latino VAPs greater than 20 percent and less than or equal to 30 percent were Fresno, Kern, Kings, Los Angeles, Madera, Merced, Monterey, Tulare, and Ventura. The counties with a Latino VAP of greater than 30 percent were Imperial and San Benito. San Benito County is the only county with a Latino VAP of more than 40 and less than 50 percent. Imperial County is the only county with a Latino VAP of more than 50 percent.


The 1990s categories are as follows. The counties with a Latino VAP of less than or equal to 10 percent were Alpine, Amador, Butte, Calaveras, Del Norte, El Dorado, Humboldt, Inyo, Lake, Lassen, Marin, Mariposa, Mendocino, Modoc,

Tables 7a and 7b show that Latino registration rates during the 1980s and 1990s were consistently higher and less volatile in the counties with Latino VAPs of greater than 30 percent. However, as more Latinos began to participate in the 1990s, the differences and the rates of change decreased. For example, these counties had average Latino registration rates that ranged between 48 percent in 1980 and 63 percent in 1992. During this time, the Latino registration rate ranged from a low of 23 percent in 1980 to a high of 61 percent in 1994 in those counties that had a Latino VAP of less than or equal to 10 percent. In the 1980s, the average election change in registration in the counties with a Latino VAP of less than or equal to 10 percent was 15 percent each election while the registration rates in the counties with Latino VAPs of greater than 30 percent only experienced an average election change of less than half of that figure (6 percent). These findings suggest that Latinos in counties with larger Latino VAPs are beginning to take advantage of their political numbers. White

Nevada, Placer, Plumas, Shasta, Sierra, Siskiyou, Tehama, Trinity, and Tuolumne. The counties with a Latino VAP of greater than 10 percent but less than or equal to 20 percent were Alameda, Contra Costa, Glenn, Mono, Napa, Sacramento, San Francisco, San Luis Obispo, San Mateo, Solano, Sonoma, Sutter, Yolo, and Yuba. The counties with a Latino VAP of greater than 20 percent but less than or equal to 30 percent were Kern, Orange, Riverside, San Bernardino, San Diego, San Joaquin, Santa Barbara, Santa Clara, Santa Cruz, Stanislaus, and Ventura. The counties with a Latino VAP equal to or greater than 30 were Colusa, Fresno, Imperial, Kings, Los Angeles, Madera, Merced, Monterey, San Benito, and Tulare. San Benito is the only county with a Latino VAP of more than 40 percent and less than or equal to 50 percent. Imperial County is the only county with a Latino VAP of more than 50 percent.
Table 7a: Latino and White Voter Registration, 1980-1988, Classified by County Latino VAP Percentage

|  | Latinos |  |  |  |  | Whites |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Counties with: | 1980 | 1982 | 1984 | 1986 | 1988 | 1980 | 1982 | 1984 | 1986 | 1988 |
| Latino VAP percentage < $=10$ | $\begin{gathered} 0.227 \\ {[0.022]} \end{gathered}$ | $\begin{gathered} 0.359 \\ {[0.001]} \end{gathered}$ | $\begin{gathered} 0.594 \\ {[0.003]} \end{gathered}$ | $\begin{gathered} 0.479 \\ {[0.001]} \end{gathered}$ | $\begin{gathered} 0.368 \\ {[0.0005]} \end{gathered}$ | $\begin{gathered} 0.888 \\ {[0.006]} \end{gathered}$ | $\begin{gathered} 0.784 \\ {[0.004]} \end{gathered}$ | $\begin{gathered} 0.851 \\ {[0.007]} \end{gathered}$ | $\begin{gathered} 0.826 \\ {[0.006]} \end{gathered}$ | $\begin{gathered} 0.8 \\ {[0.010]} \end{gathered}$ |
| Latino VAP percentage $>10$ and $<=20$ | $\begin{gathered} 0.206 \\ {[0.003]} \end{gathered}$ | $\begin{gathered} 0.383 \\ {[0.007]} \end{gathered}$ | $\begin{gathered} 0.588 \\ {[0.003]} \end{gathered}$ | $\begin{gathered} 0.491 \\ {[0.002]} \end{gathered}$ | $\begin{gathered} 0.373 \\ {[0.001]} \end{gathered}$ | $\begin{gathered} 0.901 \\ {[0.004]} \end{gathered}$ | $\begin{gathered} 0.79 \\ {[0.002]} \end{gathered}$ | $\begin{gathered} 0.815 \\ {[0.003]} \end{gathered}$ | $\begin{gathered} 0.81 \\ {[0.002]} \end{gathered}$ | $\begin{gathered} 0.781 \\ {[0.003]} \end{gathered}$ |
| Latino VAP percentage $>20$ and $<=30$ | $\begin{gathered} 0.169 \\ {[0.003]} \end{gathered}$ | $\begin{gathered} 0.347 \\ {[0.007]} \end{gathered}$ | $\begin{gathered} 0.558 \\ {[0.005]} \end{gathered}$ | $\begin{gathered} 0.445 \\ {[0.019]} \end{gathered}$ | $\begin{gathered} 0.381 \\ {[0.003]} \end{gathered}$ | $\begin{gathered} 0.889 \\ {[0.003]} \end{gathered}$ | $\begin{gathered} 0.761 \\ {[0.0005]} \end{gathered}$ | $\begin{gathered} 0.793 \\ {[0.002]} \end{gathered}$ | $\begin{gathered} 0.765 \\ {[0.016]} \end{gathered}$ | $\begin{gathered} 0.763 \\ {[0.004]} \end{gathered}$ |
| Latino VAP > 30 | $\begin{gathered} \hline 0.532 \\ {[0.039]} \end{gathered}$ | $\begin{gathered} \hline 0.477 \\ {[0.017]} \end{gathered}$ | $\begin{gathered} 0.594 \\ {[0.001]} \end{gathered}$ | $\begin{gathered} 0.578 \\ {[0.001]} \end{gathered}$ | $\begin{gathered} 0.521 \\ {[0.014]} \end{gathered}$ | $\begin{array}{\|c\|} \hline 0.887 \\ {[0.00002]} \end{array}$ | $\left.\begin{array}{\|c\|} \hline 0.778 \\ {[0.000003]} \end{array}\right]$ | $\begin{gathered} 0.792 \\ {[0.0002]} \end{gathered}$ | $\begin{gathered} 0.789 \\ {[0.0003]} \end{gathered}$ | $\begin{gathered} \hline 0.759 \\ {[0.001]} \end{gathered}$ |

Note: Because throughout this statistical material I am controlling for population size, all of these proportions have been weighted to reflect relative numbers of Latinos and whites living in these regions. San Benito County is the only county with a Latino VAP more than 40 and less than 50 percent, and Imperial County is the only county with a Latino VAP of more than 50 percent. The standard errors for the estimates are given in brackets below the estimates.
Table 7b: Latino and White Voter Registration, 1990-1998, Classified by County Latino VAP Percentage

|  | Latinos |  |  |  |  | Whites |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Counties with: | 1990 | 1992 | 1994 | 1996 | 1998 | 1990 | 1992 | 1994 | 1996 | 1998 |
| Latino VAP percentage < $=10$ | $\begin{gathered} 0.487 \\ {[0.0001]} \end{gathered}$ | $\begin{gathered} 0.594 \\ {[0.0005]} \end{gathered}$ | $\begin{gathered} 0.605 \\ {[0.002]} \end{gathered}$ | $\begin{gathered} 0.612 \\ {[0.001]} \end{gathered}$ | $\begin{gathered} \hline 0.525 \\ {[0.002]} \end{gathered}$ | $\begin{gathered} \hline 0.809 \\ {[0.003]} \end{gathered}$ | $\begin{gathered} 0.862 \\ {[0.002]} \end{gathered}$ | $\begin{gathered} 0.843 \\ {[0.003]} \end{gathered}$ | $\begin{gathered} 0.87 \\ {[0.002]} \end{gathered}$ | $\begin{gathered} 0.838 \\ {[0.003]} \end{gathered}$ |
| Latino VAP percentage $>10$ and $<=20$ | $\begin{gathered} 0.486 \\ {[0.001]} \end{gathered}$ | $\begin{gathered} 0.611 \\ {[0.007]} \end{gathered}$ | $\begin{gathered} 0.607 \\ {[0.002]} \end{gathered}$ | $\begin{gathered} 0.617 \\ {[0.003]} \end{gathered}$ | $\begin{gathered} 0.495 \\ {[0.003]} \end{gathered}$ | $\begin{gathered} 0.833 \\ {[0.004]} \end{gathered}$ | $\begin{gathered} 0.89 \\ {[0.004]} \end{gathered}$ | $\begin{gathered} 0.86 \\ {[0.005]} \end{gathered}$ | $\begin{gathered} 0.88 \\ {[0.001]} \end{gathered}$ | $\begin{gathered} 0.829 \\ {[0.001]} \end{gathered}$ |
| Latino VAP percentage $>20$ and $<=30$ | $\begin{gathered} 0.474 \\ {[0.002]} \end{gathered}$ | $\begin{gathered} 0.582 \\ {[0.008]} \end{gathered}$ | $\begin{gathered} 0.597 \\ {[0.002]} \end{gathered}$ | $\begin{gathered} 0.591 \\ {[0.006]} \end{gathered}$ | $\begin{gathered} 0.47 \\ {[0.013]} \end{gathered}$ | $\begin{gathered} 0.802 \\ {[0.001]} \end{gathered}$ | $\begin{gathered} 0.863 \\ {[0.002]} \end{gathered}$ | $\begin{gathered} 0.827 \\ {[0.002]} \end{gathered}$ | $\begin{gathered} 0.88 \\ {[0.001]} \end{gathered}$ | $\begin{gathered} 0.822 \\ {[0.001]} \end{gathered}$ |
| Latino VAP > 30 | $\begin{gathered} 0.572 \\ {[0.010]} \end{gathered}$ | $\begin{gathered} 0.633 \\ {[0.012]} \end{gathered}$ | $\begin{gathered} 0.622 \\ {[0.004]} \end{gathered}$ | $\begin{gathered} 0.616 \\ {[0.004]} \end{gathered}$ | $\begin{gathered} 0.584 \\ {[0.015]} \end{gathered}$ | $\begin{gathered} 0.812 \\ {[0.001]} \end{gathered}$ | $\begin{gathered} 0.85 \\ {[0.001]} \end{gathered}$ | $\begin{gathered} 0.798 \\ {[0.014]} \end{gathered}$ | $\begin{gathered} 0.911 \\ {[0.002]} \end{gathered}$ | $\begin{gathered} 0.831 \\ {[0.001]} \end{gathered}$ |

Note: Because throughout this statistical material I am controlling for population size, all of these proportions have been weighted
to reflect relative numbers of Latinos and whites living in these regions. San Benito County is the only county with a Latino VAP more than 40 and less than 50 percent, and Imperial County is the only county with a Latino VAP of more than 50 percent. The standard errors for the estimates are given in brackets below the estimates.
registration rates are consistent with the state average and do not appear to be positively or negatively affected by the Latino VAP.

Thus, during the 1980s and 1990s, there were significant and permanent increases in Latino registration rates. In eighteen years, the state Latino registration rate increased two and one-half times, from only 19 percent in 1980 to 52 percent in 1998. At the same time, Latino registration rates, which were volatile during the 1980s, became more stable, exhibiting only minor fluctuations during the 1990s. Both of these changes in the Latino registration rate suggest that Latinos are becoming a more predictable, reliable, and viable political force in California politics. However, registration remains lower than the state average in several of the regions where the Latino VAP is concentrated. This fact suggests that Latinos are not taking full advantage of their political potential. Further, Latino political participation is not predictable or consistent between urban and rural counties. In the 1990s, only two urban counties with significant Latino voting-age populations had registration rates above or equal to the state average for these five elections. When rural counties are considered, only five out of ten counties achieved such rates. However, it is interesting to note that both Imperial County, the rural county with the largest Latino VAP, and Los Angeles County, the urban county with the largest Latino VAP, experienced above-average Latino registration rates, which suggests that Latinos are beginning to take advantage of their political potential in these counties. While
these results suggest that Latinos may be experiencing some relative gains in political power, these gains are small given the large difference in actual registration rates between Latinos and whites and the low rates of registration in several of the regions and counties were Latino VAP is concentrated.

Realizing that political participation is a two-step process which requires an individual to register and then to turn out on election day, I next consider what proportions of Latinos and whites who are registered to vote actually turned out during the 1980s and 1990s.

## Chapter 5. Latino and White Turnout, 1990-1998

Given the registration results reported in Chapter 4, I now estimate the proportions of registered Latino and white voters who actually turned out in the four general elections between 1990 and 1998. In Table 8, I present a summary of my county-level turnout estimates for the entire state, the six different regions, and Los Angeles County for the five general elections of the 1990s (for the individual county estimates, see Table A5 in the Appendix).

These figures highlight the fact that Latinos are politically disadvantaged because they turn out to vote at substantially lower rates than do whites and their political participation from one election to the next is less predictable. However, their disadvantage is slowly decreasing throughout the state. Los Angeles County Latino turnout rates reflect this change. For example, if the midterm elections are compared, in 1990, the turnout rate among Latino voters in Los Angeles County was 47 percent lower than that for white voters ( 28 percent compared with 75 percent). Between 1990 and 1994, there is a substantial increase (16 percent), which may be attributed to the presence of Proposition 187, an anti-immigrant initiative, on the 1994 ballot. Between 1990 and 1998, this disparity in Latino and white turnout had decreased by 32 percent ( 37 percent compared with 69 percent). These results suggest that there has been
Table 8: Latino and White Turnout, 1990-1998

|  | Latinos |  |  |  |  |  | Whites |  |  |  |  |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Geographic Regions | 1990 | 1992 | 1994 | 1996 | 1998 |  | 1990 | 1992 | 1994 | 1996 | 1998 |
| California | 0.247 | 0.571 | 0.418 | 0.504 | 0.373 |  | 0.732 | 0.852 | 0.729 | 0.753 | 0.687 |
|  | $[0.010]$ | $[0.002]$ | $[0.003]$ | $[0.002]$ | $[0.003]$ |  | $[0.001]$ | $[0.0001]$ | $[0.001]$ | $[0.002]$ | $[0.004]$ |
| Southern | 0.254 | 0.586 | 0.425 | 0.51 | 0.373 |  | 0.73 | 0.856 | 0.731 | 0.753 | 0.682 |
|  | $[0.014]$ | $[0.004]$ | $[0.006]$ | $[0.003]$ | $[0.004]$ |  | $[0.001]$ | $[0.0001]$ | $[0.0002]$ | $[0.001]$ | $[0.002]$ |
| Bay Area | 0.199 | 0.526 | 0.38 | 0.489 | 0.374 |  | 0.743 | 0.855 | 0.733 | 0.762 | 0.723 |
|  | $[0.007]$ | $[0.004]$ | $[0.002]$ | $[0.002]$ | $[0.002]$ |  | $[0.0003]$ | $[0.0002]$ | $[0.0003]$ | $[0.001]$ | $[0.002]$ |
| Central Coast | 0.324 | 0.587 | 0.45 | 0.516 | 0.382 |  | 0.736 | 0.857 | 0.733 | 0.761 | 0.668 |
|  | $[0.008]$ | $[0.001]$ | $[0.003]$ | $[0.001]$ | $[0.003]$ |  | $[0.001]$ | $[0.00002]$ | $[0.0001]$ | $[0.001]$ | $[0.003]$ |
| Central Valley | 0.214 | 0.535 | 0.404 | 0.481 | 0.363 |  | 0.721 | 0.845 | 0.722 | 0.742 | 0.668 |
|  | $[0.004]$ | $[0.001]$ | $[0.002]$ | $[0.001]$ | $[0.004]$ |  | $[0.0003]$ | $[0.00004]$ | $[0.0001]$ | $[0.001]$ | $[0.003]$ |
| Mountains | 0.292 | 0.57 | 0.442 | 0.511 | 0.34 |  | 0.729 | 0.849 | 0.72 | 0.749 | 0.673 |
|  | $[0.008]$ | $[0.002]$ | $[0.003]$ | $[0.002]$ | $[0.002]$ |  | $[0.002]$ | $[0.0002]$ | $[0.002]$ | $[0.003]$ | $[0.007]$ |
| Northern | 0.323 | 0.569 | 0.455 | 0.511 | 0.397 |  | 0.739 | 0.846 | 0.715 | 0.727 | 0.677 |
|  | $[0.007]$ | $[0.001]$ | $[0.001]$ | $[0.001]$ | $[0.001]$ |  | $[0.001]$ | $[0.0002]$ | $[0.002]$ | $[0.003]$ | $[0.002]$ |
| Los Angeles | 0.281 | 0.615 | 0.4383 | 0.528 | 0.374 |  | 0.754 | 0.861 | 0.741 | 0.743 | 0.688 |

Note: Because throughout this statistical material I am controlling for population size, all of these proportions have been weighted
to reflect relative numbers of Latinos and whites living in these regions. The standard errors for the geographic region estimates are given in brackets below the estimates.
a permanent and substantial increase in the Latino turnout rate. At the state level, the increase in the Latino turnout rate between 1990 and 1998 was 12 percent ( 25 percent versus 37 percent). Although the statewide Latino turnout rate experienced almost a 50 percent increase, unfortunately in 1998, whites were still participating at a rate nearly double that of Latinos (37 percent versus 69 percent).

When the years 1992 and 1996 are considered, Latinos appear to be turning out at much higher rates during presidential elections than during midterm elections, with statewide Latino turnout rates of 57 percent and 50 percent during these two elections, respectively. The average change in turnout for Latinos between presidential and midterm elections is 17.5 percent, which is more than twice the comparable average change in turnout for whites (that is, 8 percent).

When the 1990 turnout rates for the six regions are considered, Latino voter turnout is seen as low, ranging from 20 percent to 32 percent in all six regions of California. However, between 1990 and 1998, the Latino turnout rate increased by 11 percent on average in every region, with the largest increases occurring in Southern California, the Bay Area, and the Central Valley. Two of these regions (Southern California and Central Valley) are ones in which the Latino voting-age population is most concentrated (see Table 1). These increases may portend a strengthening of the Latino political voice.

Given these general findings regarding turnout, now I can compare turnout rates between urban and rural counties and test if the size of a county's Latino VAP influences turnout as predicted in Chapter 1. First, I consider how Latino turnout rates vary between urban and rural counties in which the Latino VAP is concentrated. When the turnout rates are considered in California's top ten rural, or agricultural, counties, Table 9 shows that Imperial County, the county with the largest Latino VAP in the state, enjoys consistently high turnout among Latinos, with more than 43 percent of registered Latino voters turning out in each election during the 1990s. This result, combined with the earlier finding of higher registration rates in this county, supports the conclusion that the size of the Latino VAP in a county may influence the Latino registration and turnout rates. Simply, a larger Latino VAP may encourage Latinos to participate in the political process and provide them with the resources and knowledge needed to do so.

At the same time, as was found with registration, four of these rural counties-Kern, Merced, San Joaquin, and Stanislaus—have consistently had Latino turnout rates below the state Latino turnout rate in all five elections. This result again implies that Latinos are not taking full advantage of their political clout. When the urban counties with large Latino VAPs are considered in Table 10, I find that Los Angeles, Orange, and Ventura Counties have had turnout rates above the state average in the previous five elections.
Table 9: Latino and White Voter Turnout, 1990-1998
California's Top 10 Producing Agricultural, or Rural, Counties

|  | Latinos |  |  |  |  |  | Whites |  |  |  |  |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| County | 1990 | 1992 | 1994 | 1996 | $\mathbf{1 9 9 8}$ |  | 1990 | $\mathbf{1 9 9 2}$ | 1994 | 1996 | 1998 |
| Fresno | 0.218 | 0.556 | 0.4125 | 0.506 | 0.383 |  | 0.724 | 0.851 | 0.734 | 0.77 | 0.69 |
| Imperial | 0.431 | 0.62 | 0.5338 | 0.551 | 0.483 |  | 0.762 | 0.852 | 0.737 | 0.766 | 0.724 |
| Kern | 0.151 | 0.549 | 0.4028 | 0.453 | 0.288 |  | 0.69 | 0.846 | 0.72 | 0.718 | 0.596 |
| Merced | 0.205 | 0.537 | 0.3378 | 0.483 | 0.286 |  | 0.721 | 0.85 | 0.72 | 0.744 | 0.592 |
| Monterey | 0.351 | 0.568 | 0.4529 | 0.539 | 0.477 |  | 0.755 | 0.853 | 0.733 | 0.78 | 0.77 |
| Riverside | 0.182 | 0.539 | 0.4057 | 0.45 | 0.365 |  | 0.699 | 0.846 | 0.732 | 0.721 | 0.66 |
| San Diego | 0.177 | 0.509 | 0.3697 | 0.496 | 0.372 |  | 0.709 | 0.842 | 0.716 | 0.745 | 0.675 |
| San Joaquin | 0.16 | 0.498 | 0.3507 | 0.421 | 0.357 |  | 0.727 | 0.851 | 0.717 | 0.709 | 0.679 |
| Stanislaus | 0.207 | 0.516 | 0.3897 | 0.468 | 0.286 |  | 0.704 | 0.835 | 0.707 | 0.727 | 0.588 |
| Tulare | 0.339 | 0.58 | 0.4894 | 0.511 | 0.485 |  | 0.74 | 0.854 | 0.748 | 0.752 | 0.749 |

Table 10: Latino and White Turnout, 1990-1998
Urban Counties with Latino VAP > 0.20

|  | Latinos |  |  |  |  |  | Whites |  |  |  |  |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| County | 1990 | 1992 | 1994 | 1996 | 1998 |  | 1990 | 1992 | 1994 | 1996 | 1998 |
| Los Angeles | 0.281 | 0.615 | 0.4383 | 0.528 | 0.374 |  | 0.754 | 0.861 | 0.741 | 0.776 | 0.688 |
| Orange | 0.313 | 0.599 | 0.4786 | 0.531 | 0.415 |  | 0.748 | 0.862 | 0.746 | 0.775 | 0.73 |
| San Bernardino | 0.105 | 0.496 | 0.3241 | 0.411 | 0.298 |  | 0.681 | 0.843 | 0.701 | 0.686 | 0.612 |
| Santa Barbara | 0.365 | 0.602 | 0.4263 | 0.49 | 0.344 |  | 0.749 | 0.859 | 0.728 | 0.733 | 0.643 |
| Santa Clara | 0.218 | 0.527 | 0.3709 | 0.508 | 0.369 |  | 0.745 | 0.851 | 0.733 | 0.764 | 0.732 |
| Santa Cruz | 0.307 | 0.571 | 0.4571 | 0.516 | 0.402 |  | 0.733 | 0.852 | 0.734 | 0.765 | 0.699 |
| Ventura | 0.293 | 0.585 | 0.449 | 0.509 | 0.327 |  | 0.734 | 0.855 | 0.732 | 0.747 | 0.61 |

[^23]Finally, in Table 11, when I consider whether or not Latinos are taking advantage of their political potential, I find that counties with a Latino VAP of greater than 30 percent have turnout rates that are consistently higher than the average Latino turnout rate for the state. These low turnout rates confirm that Latinos' political voices are not being heard because they are silent on election day. In addition to low turnout rates, the volatility of these rates suggests that Latinos are an unreliable and unpredictable voting bloc. However, this volatility also suggests that Latinos may be more susceptible to campaign messages and issues, a fact that should not be overlooked by political office seekers or elected officials.
Table 11: Latino and White Turnout, 1990-1998, Classified by County Latino VAP Percentage

|  | Latinos |  |  |  |  |  | Whites |  |  |  |  |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Counties with: | 1990 | 1992 | 1994 | 1996 | 1998 |  | 1990 | 1992 | 1994 | 1996 | 1998 |
| $\begin{array}{l}\text { Latino VAP percentage } \\ <=10\end{array}$ | 0.294 | 0.576 | 0.439 | 0.513 | 0.399 |  | 0.735 | 0.853 | 0.724 | 0.754 | 0.69 |
| $[0.004]$ | $[0.002]$ | $[0.001]$ | $[0.0004]$ | $[0.001]$ |  |  |  |  |  |  |  |
| $[0.0002]$ | $[0.002]$ | $[0.002]$ | $[0.005]$ |  |  |  |  |  |  |  |  |$]$

Note: Because throughout this statistical material I am controlling for population size, all of these proportions have been weighted to reflect relative numbers of Latinos and whites living in these regions. San Benito County is the only county with a Latino VAP more than 40 and less than 50 percent, and Imperial County is the only county with a Latino VAP of more than 50 percent. The standard errors for the estimates are given in brackets below the estimates.

## Chapter 6. The Future of Latino Political Participation in Los Angeles County

Because of the size of Los Angeles County and its influence in California, I now consider the future political participation by the Latino population of this county and how this participation will alter the balance of political power within the state. To make these projections for the 2000 through 2020 elections, I utilize my estimates of the Latino voting-age population, registration, and turnout rates for Los Angeles County and the observed change in these rates. From 1990 to 1998, the average increase in the total voting-age population between elections was 96,636 potential voters, the average increase in the Latino voting-age population between elections was 114,479 potential voters, the average increase in the voter registration rate was 1.0 percent, and the average increase in the voter turnout rate was 2.3 percent. In addition, because there are considerable differences in the Latino turnout rates for presidential as compared with midterm elections (see Table 8), I use an average turnout rates for the presidential election year 2000 of 57.2 percent (an average of the 1992 and 1996 rates), and I use an average turnout rate for the midterm election of 2002 of 36.1 percent (an average of the 1990, 1994, and 1998 rates). Using these increases, I produce projections of Latino political participation based on three different scenarios:

1. For each election, I increase the total and Latino voting-age populations at their average rates $(96,636$ and 114,479 potential voters, respectively) and hold Latino registration and turnout rates constant at their 1998 levels.
2. For each election, I increase the Latino voting-age population, registration, and turnout at their average rates (96,636 potential voters, 114,479 potential voters, 1.0 percent, and 2.3 percent, respectively). I also use the average Latino turnout estimates to begin the calculations.
3. For each election, I increase the Latino voting-age population, registration, and turnout at their average rates (96,636 potential voters, 114,479 potential voters, 1.0 percent, and 2.3 percent, respectively) until the year 2008 but then adjust the voting-age population to reflect the dramatic increase in young Latinos who will become eligible to vote in each of these elections (increases of 4.9 percent in 2008 and 2010, 5.9 percent in 2012 and 2014, 6.9 percent in 2016 and 2018, and 7.9 percent in 2020) while keeping the registration and turnout at their average rates. In addition, I use the same base turnout averages for these calculations as stated above.

First, I discuss the projections of the Los Angeles County Latino registration and turnout rates for the years 2000 through 2020 which I use to make my scenario projections. Then, I present the scenario projections (see Figures 4 and 5).

The growth of the Los Angeles Latino VAP is tremendous. By 2008, the Latino VAP will make up 50 percent of Los Angeles voting-age population. In the forty years between 1980 and 2020, the Latino VAP will more than double, growing from 28 percent to 66 percent (assuming Scenario 3) and constitute twothirds of the Los Angeles VAP. However, even assuming more conservative growth among the Latino population, the Latino VAP will constitute a majority of the total voting-age population, 57 percent, in Los Angeles County in 2020.

When Latino registration rates are considered, simply increasing registration by its average, the Latino registration rate in Los Angeles is expected to increase to 67 percent by the year 2010 and to 72 percent by the year 2020 . These findings suggest that Latino registration may reach the same levels as white registration in Los Angeles by the year 2030 if not sooner. Next, I consider the projected turnout rates for the years 2000 to 2020. Latino turnout will continue to be more volatile than white turnout during the next two decades. Although turnout will decrease substantially in midterm elections, midterm turnout will increase to 43 percent in the year 2010 and to 48 percent in the year 2018. When presidential election years are considered, I find that Latinos will have a turnout rate of 67 percent by the year 2012 and 71 percent by the year 2020, a rate approximating white turnout in the 1990s.

The increasing Latino VAP in Los Angeles should continue to foster and encourage Latino political participation so that the registration and turnout rates
may increase faster than projected. In addition, as was seen in the 1990 estimates, critical but divisive issues may encourage a faster growth in the registration and turnout rates. Also, as candidates tailor their campaign messages to Latinos to cultivate this electorate-which they did to a degree during the 2000 presidential election-more Latinos may be encouraged to participate and make their voices heard. These high rates of registration and turnout suggest that Latinos in Los Angeles County should begin to enjoy increased political power early in this century and certainly by the year 2030.

Now, I present the projections for Latino registration and turnout in all three scenarios in Figures 4 and 5. In Figure 4, I see that under Scenario 1 Latino voter registration is projected to increase from the current rate of 27 percent to 34 percent of the total voting-age population in Los Angeles County by the year 2020. Thus, taking a conservative approach and using an average election increase in the voting-age population while holding registration and turnout rates constant yields a significant increase in the proportion of Latinos who register to vote.

Under Scenario 2, I see that if the Latino voting-age population and voter registration continue to increase at the rate at which they increased during the early 1990s, Latino voter registration would be 34 percent of the total voting-age population by the year 2010 (approximately equal to the Scenario 1 estimate for



the year 2020). By the year 2020, Latino voter registration would be 41 percent of the total voting-age population. Finally, under Scenario 3, which takes into account the dramatic increase in young Latinos who will become eligible to vote in each of the elections after 2008, I see that Latino registration would increase significantly more than under Scenario 2, so that by 2020 Latino voter registration would be 48 percent of the total voting-age population.

Finally, I consider how many of these registered Latino voters would actually turn out to vote in future elections. In Figure 5, under Scenario 1, I project that Latino voter turnout will increase by one-third, from the current rate of 10 percent to 13 percent of the total voting-age population in Los Angeles County by the year 2020, solely on the basis of the projected average increase in voting-age population. Under Scenarios 2 and 3, the Latino turnout rate increases dramatically from the current rate of 10 percent to 29 percent of the voting-age population in 2020 (Scenario 2) and to 34 percent of the voting-age population in 2020 (Scenario 3).

These results suggest that Latino voter registration rates as a percent of the total voting-age population could nearly double, from 27 percent to 47 percent, and that Latino voter turnout rates as a percent of the total voting-age population could more than triple, from 10 percent to 34 percent, by the year 2020. Because of these significant increases, Latinos should have a stronger voice in the politics of Los Angeles County and greater control over its political agenda.

## Chapter 7. The Analysis of Registration and Turnout Rates, 1990-1998

Chapters 4 and 5 provided an overview of Latino registration and turnout. The research reported in these chapters found that there were significant and permanent increases in Latino registration and turnout rates. In eighteen years, the state Latino registration rate increased two and one-half times, from only 19 percent in 1980 to 52 percent in 1998. Between 1990 and 1998, the state Latino turnout rate increased 12 percent, from 25 percent to 37 percent. Although the statewide Latino turnout rate experienced almost a 50 percent increase, unfortunately in 1998, whites were still participating at a rate nearly double that of Latinos (37 percent versus 69 percent). In addition, Latino registration and turnout rates were found not to be predictable or consistent between urban and rural counties. However, the size of the Latino voting-age population (VAP) was found to influence registration and turnout rates. In addition, Propositions 187 and 209 appear to be motivating Latinos to register and to turn out. Left unanswered by this analysis is the question: What is causing these observed rates and differences?

To verify the findings reported in Chapters 4 and 5 and further test what demographic, socioeconomic, institutional, electoral, and contextual factors influence Latino registration and turnout rates, I need a statistical method that will allow for the accurate analysis of binary response data that are in a proportions or count format. Usually, binary response data are in the form of an individual's response to a survey question-for example, whether or not an
individual decides to vote on election day-and each observation consists of [ $y_{i}$, $\mathbf{x}_{\mathrm{i}}$ ], the individual's response and a regressor vector representing characteristics of that individual, such as educational attainment, gender, and political party affiliation, which may influence his turnout decision. When using individual binary response data, the researcher wants to estimate the probability that an individual will vote on election day and therefore relies on a probit or logit model to avoid the pitfalls of the linear probability model, which ignores the problem of heteroskedasticity and does not guarantee that the probability estimates will be on the $[0,1]$ interval. ${ }^{37}$

Instead, I have observed the response of $n_{i}$ individuals, all of whom have the same $\mathrm{x}_{\mathrm{i}}$. Therefore, the observed dependent variable will consist of the proportion, $P_{i}$, of the individuals who respond with $y_{i}=1$. An observation then takes the form $\left[\mathrm{n}_{i}, \mathrm{P}_{\mathrm{i}}, \mathrm{x}_{\mathrm{i}}\right]$, for $i=1,2, \ldots, \mathrm{~N}$. Specifically, the observed dependent variables are the proportion of Latinos or whites in a county who register and who vote, the rates that were calculated in Chapters 4 and 5. Next, using the ecological inference estimates of the registration and turnout rates for whites and Latinos in each county in California, I can calculate the number of Latinos or whites in the respective Latino and white VAPs who registered to vote. In addition, I can easily calculate the number of individuals who turned out to vote given the number of Latinos or whites who registered. Therefore, I have the

[^24]observed response of $n_{i}$ individuals, and they all share common characteristics, in this instance, the characteristics of the county in which they reside, such as median income, age disbursement, and educational attainment.

Given that my data are in this form, I want to employ a grouped logit model. Therefore, more formally, the logit function is defined as the log of the odds ratio. Assuming there is only one explanatory variable for simplicity, the model can be written as follows:

$$
\log \left(p_{j} /\left(1-p_{j}\right)\right)=\beta_{0}+\beta_{1} x_{j}+\varepsilon_{j},
$$

where $p_{j}$ is the successes divided by the population for the jth observation. The expectation of $\varepsilon_{\mathrm{j}}$ is zero for large samples and its variance is $\sigma_{j}^{2}=1 /\left(n_{j} p_{j}\left(1-p_{j}\right)\right)$, where $n_{j}$ represents the population for observation j . Given this model, weighted least squares can be applied to the observations with weights proportional to $n_{j} p_{j}$ (1- $p_{j}$ ). The above model implies that $p_{j}=\exp \left(\boldsymbol{\beta}^{\prime} \mathbf{x}_{\mathrm{j}}\right) /\left(\left(1+\exp \left(\boldsymbol{\beta}^{\prime} \mathbf{x}_{\mathrm{j}}\right)\right.\right.$, where $\boldsymbol{\beta}$ and $\mathbf{x}_{\mathrm{j}}$ are the coefficient and regressor vectors.

This method affords me the benefits of using a binary data model, thereby guaranteeing that estimated proportions will lie on the [0, 1] interval. I estimate this model using a weighted least squares method to avoid the assumptions that the maximum likelihood method would require regarding independence of the observed proportions and the errors and to allow me to weight the observations by the size of the voting-age population or the registered population of the county. This method of estimation also permits easy interpretation of the
estimated coefficients because the relative size of the coefficients indicates the magnitude or importance of the coefficient on the proportion. ${ }^{38}$

Given this estimation procedure for the model, I now consider the model specification. Because of the nature of the unit of analysis, county-level data, what I am able to test is limited by the availability of data. Some explanatory variables, such as gender, that are logical at the individual level become meaningless at the county level given that the populations of all counties are split almost evenly between males and females. However, I can test the significance of income, educational attainment, age, partisanship, language, Latino votingage population size, issues, and area of residence as hypothesized in Chapter 1.

For Latino registration and turnout from 1990 to 1998 , I include regional, election-specific, partisanship, and county socioeconomic variables. To allow for possible regional effects on Latino registration and turnout, I include binary variables for four of the five major regions, Southern California, Bay Area, Central Coast, and Central Valley. The Mountain region is the excluded category.

I include four election-specific binary variables in the model to test whether or not the content or characteristics of specific elections, such as Proposition 187 in 1992 and Proposition 209 in 1994, encouraged Latino political

[^25]participation. Next, to test whether or not participation is influenced by age, I include the proportions of Latinos in three of four age categories. The categories are as follows: 18 through 29 years of age, 30 through 44 years of age, 45 through 59 years of age, and 60 years of age and older. The excluded category is the first category. Then, I include two partisan variables, the proportion of individuals registered Republican and the proportion of individuals registered Democratic in a county. These variables should indicate the degree to which group partisanship affects Latino political participation. I also include several county socioeconomic variables to see how these variables influence Latino participation. I include the county's median income divided by the state's median income and six variables to measure the influence of education on Latino voting. These are the proportion of county residents 18 years and older with this educational attainment level. The seven educational attainment levels are less than ninth grade, ninth grade or more but no high school diploma, high school diploma or its equivalent, some college but no degree, an associate's degree, a bachelor's degree, and graduate or professional degree. The excluded category is less than ninth grade. I also include the proportion of the county's population that is living in an urban area. This variable is included to see if political participation is influenced by whether an individual lives in an urban, or metropolitan, area or if he lives in a rural, or agricultural, area. Finally, I include a variable that is the proportion of the population that speaks Spanish at home.

This variable provides insight into whether language is a barrier to or provides support for political participation.

The white registration and turnout models are specified similarly to the Latino models. The only differences are that the age categories are the proportions of whites in the county instead of the proportions of Latinos for each of the age categories. The Spanish language variable is excluded from the white model.

I collected these data from several sources. The Latino VAP of a county is the number I calculated earlier in Chapter 3 using 1990 U.S. Census data. The Latino and white age data come from the California Department of Finance. ${ }^{39}$ The partisanship data is from the California Secretary of State's office in the "Statement of the Vote." The income, educational attainment, urban, and language variables are all from the 1990 U.S. Census. ${ }^{40}$ The median income
${ }^{39}$ State of California, Department of Finance, County Population Projections with Age, Sex and Race/Ethnic Detail, July 1, 1990-2040 in 10-year Increments. I used the 1990 and 2000 projections, assumed a linear relationship, and calculated an average two-year increase to determine the number of Latinos and whites in each of the age categories for the 1992, 1994, 1996, and 1998 elections. The projections also had the age category 15 through 19. To separate out the 18 - and 19 -year-olds, I assumed that there were an equal number of individuals in each of these years.
${ }^{40}$ Specifically, I relied on 1990 U.S. Census Data, database C90STF3A. The census provides the language spoken at home for individuals five years of age and older. I divided the number of Spanish or Spanish Creole speakers by the total population for the language variable. I assumed that the proportion remained constant over the five elections. The census provides educational attainment of individuals 18 years of age and older. I divided the number in each age category by the total of all categories. I assumed that the proportion of
data were from the U.S. Census reports on small area income and poverty estimates based on the Current Population Surveys.

Given this estimation technique, model specification, and data, the factors that influence Latino registration and turnout can be considered. In the next section, I present the estimated results of this model specification. First, I consider the significant variables, and then I consider the relative magnitudes of these variables.

The grouped logit results for Latino registration are presented in Table 12.
First, when the regional variables are considered, Latino participation is independent of region as well with the exception of the Bay Area. The Bay Area variable is significant and negative, meaning that Latinos living in the Bay Area are less likely to register to vote.

Next, when the election year variables are considered, I find that, relative to 1990, Latino registration is increasing except in 1998, which confirms the increase in Latino participation described in Chapter 4. When the individual years are considered, I find that the 1994 coefficient is positive and significant, which suggests that Proposition 187 may have been motivating Latinos to register. When the 1996 coefficient is considered, it is positive and significant,
educational attainment remained constant. To obtain the urban population proportion, I divided the total urban population by the total county population. I assumed this proportion remained constant over the five elections. I relied on U.S. Census data regarding small area income and poverty estimates based on the Current Population Surveys for county median income figures. The data were available for 1990, 1994, and 1996. I used these figures, assumed a linear relationship, and calculated median income for the 1992 and 1998 elections.

Table 12: Grouped Logit Analysis of Latino and White Registration Rates for California Counties

| Item | Latino |  | White |  |
| :---: | :---: | :---: | :---: | :---: |
|  | Coefficient | Standard Error | Coefficient | Standard Error |
| Constant | -2.533 | 1.682 | -1.125 | 1.037 |
| Latino VAP \% |  |  | 0.900** | 0.398 |
| Southern California | -0.186 | 0.145 | -0.0004 | 0.093 |
| Central Coast | 0.120 | 0.147 | 0.210** | 0.010 |
| Central Valley | -0.155 | 0.122 | 0.079 | 0.069 |
| Bay Area | -0.371** | 0.130 | -0.050 | 0.091 |
| 1992 | $0.184^{* *}$ | 0.047 | 0.320** | 0.036 |
| 1994 | $0.212^{* *}$ | 0.058 | -0.065* | 0.037 |
| 1996 | $0.152^{*}$ | 0.086 | $0.434^{* *}$ | 0.057 |
| 1998 | -0.218** | 0.106 | -0.011 | 0.069 |
| Age 30-44 | -0.383 | 0.960 | -0.706* | 0.397 |
| Age 45-59 | $5.371^{* *}$ | 1.445 | 1.211** | 0.572 |
| Age 60 + | 0.443 | 0.563 | -0.328 | 0.407 |
| Democrats | 0.330 | 1.058 | 0.490 | 0.806 |
| Republicans | -0.448 | 1.140 | -0.413 | 0.871 |
| Median Income | -0.186 | 0.198 | -0.251 | 0.171 |
| Urban | 0.203 | 0.239 | -0.060 | 0.132 |
| No high school diploma | 1.276 | 2.005 | 0.976 | 1.422 |
| High school diploma | 2.642* | 1.465 | 3.774** | 0.983 |
| Some college, no degree | -0.147 | 1.626 | 1.479 | 1.104 |
| Associate degree | 2.560 | 3.979 | 1.951 | 2.667 |
| Bachelor's degree | 7.135** | 2.339 | 8.493** | 1.715 |
| Graduate/Professional degree | -0.561 | 3.065 | -0.169 | 1.935 |
| Spanish | 1.565** | 0.676 |  |  |
| Adjusted R-squared = | 0.674 |  | 0.745 |  |

## Number of Observations $=290$

Note: * indicates significance at the $\mathrm{p}=0.10$ and ** indicates significance at the $p=0.05$ level.
which suggests that Proposition 209 and the implementation of motor voter legislation encouraged Latinos to register.

When the age variables are considered, Latinos who are between the age of 45 and 59 are significantly more likely to register to vote. The partisanship variables, the proportions of Republicans and Democrats in a county, are not significant. However, it is interesting to note that the Republican variable does have a negative sign, suggesting that, as the proportion of Republicans increases in a county, Latino registration decreases.

Both the median income and urban variables are not significant. When educational attainment is considered, I find that education encourages registration except when Latinos have some college or a graduate or professional degree. In addition, Latinos with a high school education and Latinos with a college education are much more likely to vote. Finally, when the language variable is considered, the proportion of households that speak Spanish is positive and significant, which suggests that language may not be a barrier to participation.

Now, I consider the relative magnitudes of the effects of the significant variables on the Latino registration rate. Recalling that I used the weighted least squares method to estimate the model, the relative magnitudes of the effects of the coefficients can be easily compared. First, the variables with the largest significant coefficients are age and education. This result suggests that these variables are the primary determinants of Latino registration. All of the other
determinants of registration, such as election years, are of much smaller magnitude.

Table 12 reveals that the primary determinants of Latino registration are age and education level. Latino registration is independent of region, partisanship, income, and language. These results suggest that it is not the characteristics of the community in which Latinos live, such as the number of Spanish-speaking households, affluence, or location, but rather it is the characteristics of the individuals (education and age) that make up these communities which matter. The fact that these characteristics of population cannot be easily changed suggests that Latino registration will not be increasing rapidly until this population ages and educates itself. In addition, electionspecific effects, such as propositions and candidates, and institutional reforms, such as the motor voter legislation, have far less influence on Latino registration than do age and educational attainment. These results suggest the dismal finding that there is very little that political parties can do to influence Latino registration rates significantly unless they can encourage participation among the young or lesser-educated.

To better understand the magnitudes of these different variables on Latino registration, I perform several counterfactuals and consider how changing the educational attainment of this community, the age composition, and the elimination of issues affects Latino registration rates. I focus my analysis on Los Angeles County because of its importance in California and Latino politics. This
county has the largest Latino VAP of any urban county and has the fastestgrowing VAP of any county in the state. For example, the model shows a Latino registration rate of 57 percent in Los Angeles County in 1998. If I change the age distribution of the Latino population to the age distribution projected for 2010, then the registration rate jumps to 68 percent. This result suggests that, as the Latino population increases and its members age, they should register and participate more. Also when I consider the effects of education, if I increase the percentage of individuals who have bachelor's degrees by 10 percent and decrease the percentage of individuals who have an associate's degree and some college each by 5 percent, the Latino registration rate changes from 57 to 71 percent, an increase of 14 percent. Clearly, educational attainment and age are very important in determining Latino registration rates. Alternatively, when I consider the influence of issues on Latino registration rates, I see that it is much smaller. For example, if I assume that Proposition 187 did not occur, registration would have been 50 percent instead of 56 percent, a decrease of only 6 percent. Likewise, when the effects of Proposition 209 are considered, registration increases by only 4 percent, from 51 to 55 percent. The age and education effects are nearly two and three times greater, respectively, than the issues effects. These results confirm that it is not issues that are encouraging individuals to register but rather it is age and educational attainment that are important.

Now, when white registration is considered in Table 12, the results are similar. Age and educational attainment are the primary factors influencing white registration rates. However, white registration is significantly affected by the size of the Latino VAP, which suggests that, as the Latino VAP increases, whites are more likely to register to vote. As was true of Latino registration rates, white registration rates are primarily independent of region with the exception of the Central Coast. As for election year influences, because the coefficient for 1994 is significant and negative, Proposition 187 does not appear to have encouraged registration among whites; however, Proposition 209 and the implementation of motor voter legislation do appear to have positively and significantly increased white registration rates.

Next, when the age variables are considered, whites in the age category of 45 through 59 are more likely to vote as are Latinos in this same age category. The partisanship, income, and urban variables are not significant influences on white registration. As was true of Latinos, whites with a high school education or with a college education are more likely to register to vote.

Now, when Latino turnout is considered in Table 13, it appears to be independent of region with the exception of the Bay Area, where fewer Latinos turned out. When the election variables are considered, they all have positive coefficients each year, suggesting that Latino turnout is increasing with time. Latinos were mobilized in the 1992 presidential election. Also, it appears that the issues of illegal immigration and affirmative action brought them to the polls

Table 13: Grouped Logit Analysis of Latino and White Turnout Rates for California Counties

| Item | Latino |  | White |  |
| :---: | :---: | :---: | :---: | :---: |
|  | Coefficient | Standard Error | Coefficient | Standard Error |
| Constant | 2.001 | 1.799 | 2.897** | 0.868 |
| Latino VAP \% |  |  | 0.203 | 0.332 |
| Southern California | -0.163 | 0.159 | 0.104 | 0.076 |
| Central Coast | -0.291* | 0.162 | -0.007 | 0.081 |
| Central Valley | -0.210 | 0.136 | 0.082 | 0.059 |
| Bay Area | -0.474** | 0.144 | -0.029 | 0.077 |
| 1992 | 1.183** | 0.052 | $0.649^{* *}$ | 0.032 |
| 1994 | $0.542^{* *}$ | 0.064 | -0.102** | 0.032 |
| 1996 | 0.869** | 0.094 | 0.039 | 0.048 |
| 1998 | $0.281 * *$ | 0.117 | -0.297** | 0.059 |
| Age 30-44 | 0.780 | 1.120 | 0.288 | 0.338 |
| Age 45-59 | 0.535 | 1.591 | -0.866* | 0.487 |
| Age 60 + | 0.729 | 0.641 | 1.349** | 0.351 |
| Democrats | -0.722 | 1.171 | -0.233** | 0.672 |
| Republicans | -1.710 | 1.262 | -0.847 | 0.725 |
| Median Income | 0.869** | 0.218 | $0.429^{* *}$ | 0.146 |
| Urban | -0.824** | 0.260 | -0.593** | 0.112 |
| No high school diploma | -6.001** | 2.320 | -4.362** | 1.255 |
| High school diploma | -3.389** | 1.664 | -1.634* | 0.837 |
| Some college, no degree | -0.334 | 1.822 | -3.280** | 0.939 |
| Associate degree | -3.512 | 4.79 | 5.590** | 2.236 |
| Bachelor's degree | -0.555 | 2.709 | -1.374 | 1.494 |
| Graduate/Professional degree | -7.677** | 3.339 | -1.163 | 1.605 |
| Spanish | 1.515** | 1.799 |  |  |
| Adjusted R-squared = | 0.686 |  | 0.853 |  |

## Number of Observations $=290$

Note: * indicates significance at the $\mathrm{p}=0.10$ and ** indicates significance at the $p=0.05$ level.
in 1994 and 1996. Therefore, Proposition 187 and Proposition 209 motivated more Latinos to register (see Table 12) and to go to the polls on election day.

When the age variables are considered, it is interesting to note that once Latinos are registered, turnout appears to be independent of age. Therefore, although Latino registration increases with age (see Table 12), turnout does not. Then, when the partisanship variables are considered, they are found not to have a significant effect on Latino turnout but are both negative, which suggests that a highly partisan county, whether Democrat or Republican, discourages Latino turnout.

Although Latino registration was not significantly affected by the income of the county or the proportion of the county that is considered urban (see Table 12), these two factors do significantly influence turnout. As a county's median income increases, its Latino residents are more likely to turn out. However, Latinos living in urban counties are more likely not to turn out. When education is considered, I find that rather than encouraging turnout, increased education appears to discourage Latinos from turning out to vote. Finally, when the Spanish language variable is considered, I find that as the number of Spanishspeaking households increases, turnout increases. This result suggests that the presence of a large Spanish-speaking community may foster political participation among Latinos.

When the magnitudes of these coefficients are considered, the factors that most encourage Latino turnout are issues, county median income, and the
size of the Spanish-speaking community, while the factors that most discourage Latino turnout are the size of the urban population and educational attainment.

What do these results tell us about Latino turnout? When Latino registration is considered, the demographic and socioeconomic variables of age and educational attainment are the primary determinants. However, when turnout is considered, age is no longer important, and characteristics of the community in which Latinos live, such as affluence, the number of Spanishspeaking households, and whether location is urban or rural, are important. Also, issues are more important in affecting turnout on election day than in encouraging registration. Therefore, issues may not dramatically increase registration but should mobilize registered Latinos to vote. This result suggests the Latino electorate can be mobilized if office seekers speak to their concerns and should be encouraging to politicians. However, the negative influence of living in an urban county is discouraging for Latino turnout and its future political influence because the largest and fastest growing Latino VAP is in Los Angeles, a highly urban county.

When white turnout is considered, I find that, although the size of the Latino VAP influences white registration, with a larger Latino VAP encouraging whites to register, it does not encourage whites to turn out on election day. In addition, white turnout rates appear to be independent of region. As with Latinos, the 1992 presidential election appears to be a mobilizing election while
the issues of illegal immigration and affirmative action appear not to have mobilized whites at all.

White turnout appears to increase with age, with whites over 60 years of age turning out at rates significantly higher than the turnout rates for younger segments of the population. As for the partisanship variables, they are not significant but do influence whites in the same manner as Latinos: increased partisanship in a county discourages turnout. As with Latino turnout, the income and urban variables are now significant with a higher median income in a county encouraging participation while an increased urban population decreases participation. As was true for Latinos, increased education appears to have a negative influence on turnout with the exception of college graduates. As the percentage of college graduates increases in a county, turnout increases.

When the magnitudes of coefficients are considered, the most important factors influencing white turnout are again age and education. Election issues and county characteristics are not as important. Therefore, the most important factors influencing Latino registration and white registration and turnout are age and educational attainment. However, for Latino turnout, these factors change to include issues and characteristics of the counties in which Latinos live.

As I did for registration, to better understand the magnitudes of these different variables on Latino turnout, I perform several counterfacturals and consider how changing educational attainment and eliminating election issues would influence Latino turnout. When I consider the influence of issues on

Latino turnout rates, I see that issues are important in determining Latino turnout. For example, if I assume that Proposition 187 did not occur, turnout would have been 30 percent instead of 42 percent, a decrease of 12 percent. Likewise when the effects of Proposition 209 are considered, turnout increases by 20 percent, from 30 to 50 percent. Also when I consider the effects of education, if I increase the percentage of individuals who have bachelor's degrees by 10 percent and decrease the percentage of individuals who have an associate's degree and some college each by 5 percent, the Latino turnout rate changes from 39 to 42 percent, an increase of only 3 percent. These results confirm the earlier findings that Latinos are a more volatile electorate than whites. Their turnout is more dependent on issues than is the turnout of whites, and it is more dependent on issues than on other factors, such as educational attainment or age. This result is both good and bad for politicians. It suggests that Latinos can be motivated to vote by issues and candidates but may not be a consistent and reliable electorate.

This analysis of Latino registration reveals that the primary determinants of registration are age and educational attainment. Unfortunately, these results do not suggest an easy method by which Latino registration can be increased and are discouraging for any short-term increases in political power. Simply, the Latino population must age, and it must on average attain more education. ${ }^{41}$

[^26]Historically, high school dropout rates in Latino communities have averaged 30 percent, two and one-half times that for blacks and three and one-half times that for whites. ${ }^{42}$ Therefore, these findings suggest that it is imperative to encourage higher levels of educational attainment among Latino youths and to decrease their high rates of dropping out of school by improving language and mentoring programs. This approach is particularly important in California because, beginning with the 1996-97 school year, Latino students comprised a majority of the state's public school population.

When Latino turnout was considered, the characteristics of the communities in which Latinos lived-that is, median income, proportion urban, and number of Spanish-speaking households-were important. I found that election year issues were very important as well. The response of Latinos to issues suggests that they are motivated by issues and candidates, which is good for politicians, but may also be an unreliable electorate if they are uninterested or if the issues discussed are not relevant to them. These results suggest that, in the short term, Latinos will continue to find themselves underrepresented and their influence limited in the halls of California government.

[^27]
## Chapter 8. Latino and White Political Party Registration, 1990-1998

Party registration is the single best indicator of a voter's opinions and of which candidates can expect his support on election day. ${ }^{43}$ Given the size of the California Latino electorate and the rate of its growth, it is important to determine the political party with which members of this electorate typically register. Making this determination is challenging because Latino voters exhibit a split political personality, taking a liberal position on some issues and a conservative one on others. For example, Mexican Americans in California support increased welfare spending and prayer in school and oppose the death penalty and abortion (Uhlaner, 1996).

Both the Democrats and the Republicans have attempted to court Latino voters, viewing them as receptive to political conversion (DeSipio, 1996). Republicans often argue that, because of their party's position on moral and family issues, it should appeal to Latinos. Democrats counter that because of their support for immigrants and the underprivileged, Latinos should favor the Democratic Party. During recent political campaigns, both major party candidates have run ads targeting Latinos, appeared with Latinos, and spoken Spanish in

[^28]the hope of attracting members of this growing electorate. ${ }^{44}$ As a result of these efforts, in California during the past two election cycles, Latinos have tended to support Democratic candidates over Republican candidates: 77 percent of Latinos voted for Dianne Feinstein in the 1994 U.S. Senate race; 71 percent of Latinos voted for Kathleen Brown in the 1994 gubernatorial election; and 75 percent of Latinos supported Bill Clinton's reelection bid in 1996.45 But, while Latino voters have exhibited a political party preference, it is not clear that they have developed a party loyalty.

Thus, two fundamental questions about Latino political party registration need to be answered: (1) What factors are important in determining Latino party registration? (2) Is Latino political party registration stable or can it be changed by election issues and candidate appeals?

Since the publication of The People's Choice by Lazersfeld et al. more than fifty years ago, political scientists have agreed that socioeconomic factors such as income, type of employment, educational attainment, religious affiliation, and ethnicity are accurate and consistent predictors of political party registration
${ }^{44}$ For example, Vice President Al Gore professed a love for all things Latino. According to an article in the Los Angeles Times (October 30, 2000, p. A-17), he "worked hard at honing his pronunciation of 'si se puede' ('yes we can'). He liked to tell Mexican American audiences that he hoped his next grandchild would be born on Cinco de Mayo (because his first was born on the Fourth of July)."
${ }^{45}$ The 1994 estimates come from the Voter News Service California Exit Poll, November 1994. The 1996 estimates are from the Los Angeles Times Poll, Study 389 (Exit Poll of the November 5, 1996, General Election).
(Berelson et al., 1954; Kamienieki, 1985; Knoke, 1976; Miller and Shanks, 1996; Nie et al., 1979). For example, if a voter is black, he is more likely to be registered as a Democrat; if he is white, he is more likely to be registered as a Republican. If a voter has a higher income, he is more likely to be a Republican; if he has a lower income, he is more likely to be a Democrat. If a voter is Catholic, he is more likely to be a Democrat; if he is Protestant, he is more likely to be Republican. The effects of age and gender are less clear. Women have been shown to slightly favor the Democratic Party over the Republican Party. Age alone does not identify a voter's party affiliation, but a voter's allegiance to his party may intensify with age.

From the studies of Latino political party registration, it is clear that ethnicity is one important factor. For example, among the three largest Latino populations in the United States-Cuban Americans, Puerto Ricans, and Mexican Americans-support has been split between the Republican and Democratic Parties. Cuban Americans have registered with the Republican Party while Puerto Ricans and Mexican Americans have registered with the Democratic Party (Cain et al., 1991; de la Garza et al., 1992; de la Garza et al., 1996; Welch and Sigelman, 1993). ${ }^{46}$

[^29]Previously, researchers seeking to explain these political party registration differences among Latinos have relied predominantly on survey data, which has forced them to focus their efforts on one election, one region of the country, or one portion of the Latino population (Cain and Kiewiet, 1984; Cain et al., 1991; Welch and Sigelman, 1993; Kosmin and Keysar, 1995; Uhlaner and Garcia, 1998). For this reason, although their contributions are laudable, they have been unable to agree on which socioeconomic factors are important in determining political party registration and to what degree.

Researchers have looked not only at factors that determine party registration but also at the stability of that registration once it is established. For example, in 1960, Campbell et al. argued in The American Voter that parental socialization was the primary determinant of party registration and, therefore, that party registration is relatively stable throughout life. While some researchers have found support for this position (for example, Jennings and Niemi, 1968; Cassel, 1993), others have argued that registration is not stable but rather responsive to election issues, party positions, and candidate appeals (Jackson, 1975; Page and Jones, 1979; Popkin et al. 1976, Fiorina, 1981).

While examining the long-term stability of party registration is particularly relevant in relation to members of the Latino electorate because of their conflicting issue positions, there has been a paucity of research on this topic. As with party registration, researchers have been hampered by a lack of longitudinal
data and have, therefore, been forced to look at individual elections (for example, DeSipio, 1996).

To answer the fundamental questions about what factors determine Latino political party registration and how stable this registration is, I offer a different approach and several new alternative data sources. Focusing my research on the California Latino population instead of doing a national study enables me to use aggregate data rather than individual data and to study Latino party registration over a longer period of time, five general elections. To avoid the pitfalls inherent in using survey data (see Chapter 1 for a thorough discussion), I rely on the estimates of Latino registration previously calculated and presented in Chapter 4, applying the method of generalized bounds and the county party registration figures published by the California Secretary of State's office in the "Statement of the Vote."

However, my data set and analysis are limited in two ways that should be noted. First, California's Latino population is 80 percent Mexican American; therefore, these results may not be equally applicable to Cubans and Puerto Ricans. Second, while I was able to control for age and citizenship, given the aggregate form of my data, I was unable to control for nativity or term of residence; therefore, these results may not be applicable to all subsets of the Latino community. However, they do provide a set of criteria against which to measure the results of future work.

Thus, I use California county-level estimates of Latino and white registration and county-level party registration figures to produce estimates of Latino and white Democratic and Republican Party registration for each county during the general elections of the 1990s (1990, 1992, 1994, 1996, and 1998) employing the method of generalized bounds (King, 1997) as discussed in Chapter 2.

Because I am using estimates of Latino and white registration rates calculated by the ecological inference method of generalized bounds to derive the Latino and white party registration rates, I must take the standard errors associated with these estimates into account when performing this secondary analysis. To do so, I use the statistical technique of Monte Carlo sampling, or simulation. In essence, by repeating an estimation a large number of times, this technique creates a distribution of possible values for the estimate and the error from which an average value can be estimated. By creating a distribution and not relying on one value for the estimate, I can control the uncertainty in the calculation. In this case, it is simply the repeated duplication of the ecological inference calculation one thousand times. The estimates of the party registration rates and their respective errors are saved after each iteration. Then, the estimates and the errors are averaged to obtain the party registration rates and the errors that I report. This preliminary analysis indicates the party with which Latinos are registering most often and the degree to which this party registration is stable.

First, when California Latino political party registration is considered in Table 14a for the five general elections of the 1990s (for individual county estimates, see Tables A6 and A7 in the Appendix), I see that, as expected because of the ethnic composition of the California's Latino population, Latinos are nearly twice as likely to be registered Democratic as Republican. This result confirms earlier survey findings that Mexican Americans and California Latinos are predominantly Democratic (Cain et al., 1991; de la Garza et al., 1992; de la Garza et al.; 1996, Welch and Sigelman; 1993, Uhlaner, 1991). However, a significant number of California's Latinos (25 percent) do register Republican. In addition, these rates appear to be consistent across all of the regions of California with the exception of the Bay Area, where the Latino Democratic registration rate is higher, and Northern California, where the Democratic registration rate is lower.

Contrary to my hypotheses and to folk wisdom, in spite of the Republican Party's championing controversial initiatives (for example, Proposition 187, the anti-immigrant initiative, and Proposition 209, the anti-affirmative action initiative) and its candidates' endorsing issues that do not reflect the Latino agenda, there does not appear to have been an immediate Latino backlash against the Republican Party, as evidenced by registration rates. The state's Latino Republican registration rate increases from 1992 to 1994 by an average of 4.7
Table 14a: Latino Voter Registration by Political Party, 1990-1998

|  | Democrat |  |  |  |  |  | Republican |  |  |  |  |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Geographic Regions | $\mathbf{1 9 9 0}$ | $\mathbf{1 9 9 2}$ | $\mathbf{1 9 9 4}$ | $\mathbf{1 9 9 6}$ | 1998 |  | 1990 | 1992 | 1994 | 1996 | 1998 |
| California | 0.579 | 0.588 | 0.572 | 0.501 | 0.552 |  | 0.248 | 0.248 | 0.295 | 0.227 | 0.284 |
|  | $[0.001]$ | $[0.007]$ | $[0.026]$ | $[0.021]$ | $[0.034]$ |  | $[0.005]$ | $[0.026]$ | $[0.005]$ | $[0.007]$ | $[0.011]$ |$]$

[^30]Table 14b: White Voter Registration by Political Party, 1990-1998

|  | Democrat |  |  |  |  | Republican |  |  |  |  |  |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Geographic Regions | 1990 | 1992 | 1994 | 1996 | 1998 |  | 1990 | 1992 | 1994 | 1996 | 1998 |
| California | 0.511 | 0.485 | 0.507 | 0.472 | 0.446 |  | 0.349 | 0.348 | 0.326 | 0.31 | 0.393 |
|  | $[0.006]$ | $[0.005]$ | $[0.006]$ | $[0.008]$ | $[0.007]$ |  | $[0.006]$ | $[0.005]$ | $[0.007]$ | $[0.006]$ | $[0.008]$ |$]$

[^31]percent and each region in the state experiences an average increase in Republican registration of 5.3 percent. Each region experiences a decline in Republican registration between the 1994 and the 1996 election with an average decrease of 5.8 percent, which may be a delayed response to the Republican Party's position on Propositions 187 and 209, but this decline was more than made up in 1998, with each county experiencing an average increase of 6.5 percent between the 1996 and the 1998 election.

It is interesting to note that the Republicans enjoy slightly higher Latino registration rates in midterm elections (1990, 1994, and 1998). The California Latino registration rates for these elections are 25 percent, 30 percent, and 29 percent, respectively, while the general election years (1992 and 1996) have rates of 25 percent and 23 percent. This result suggests that Republicans may appeal to and be better able to attract Latinos in off years, when the issues and the candidates are local or, at least, regional.

When Tables $15 \mathrm{a}-18 \mathrm{~b}$ are considered, Latino political party registration appears to be consistent across California's urban and rural counties with large Latino voting-age populations (VAPs). The one exception is Orange County, where there is a steady decline in Latino Democratic registration from a high of 57 percent in 1990 to a low of 26 percent in 1998 and a steady increase in Republican registration from 33 percent in 1990 to 48 percent in 1998. This result is surprising, given that this area is conservative and is the home of some of Proposition 187's strongest advocates. If there were to be a Latino backlash
Table 15a: Latino Voter Registration by Political Party, Democrat, 1990-1998
California's Top 10 Producing Agricultural, or Rural, Counties

|  | Democrat |  |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| County | 1990 |  | 1992 |  | 1994 |  | 1996 |  | 1998 |  |
| Fresno | 0.582 | [0.0363] | 0.6147 | [0.067] | 0.5864 | [0.0745] | 0.486 | [0.1581] | 0.5583 | [0.0812] |
| Imperial | 0.5793 | [0.0362] | 0.62 | [0.0631] | 0.6633 | [0.0797] | 0.5769 | [0.1467] | 0.6429 | [0.058] |
| Kern | 0.5744 | [0.0391] | 0.5561 | [0.0903] | 0.4766 | [0.0952] | 0.4026 | [0.1536] | 0.4335 | [0.0811] |
| Merced | 0.5847 | [0.0427] | 0.6337 | [0.0888] | 0.6111 | [0.0878] | 0.525 | [0.195] | 0.6869 | [0.0586] |
| Monterey | 0.5762 | [0.037] | 0.5858 | [0.0716] | 0.5938 | [0.0973] | 0.5359 | [0.1328] | 0.6473 | [0.1063] |
| Riverside | 0.5733 | [0.0397] | 0.5425 | [0.0916] | 0.4593 | [0.1072] | 0.399 | [0.1604] | 0.4098 | [0.1261] |
| San Diego | 0.5721 | [0.0399] | 0.4887 | [0.1032] | 0.387 | [0.0849] | 0.3516 | [0.1461] | 0.3522 | [0.097] |
| San Joaquin | 0.5842 | [0.0384] | 0.6244 | [0.0759] | 0.5977 | [0.0925] | 0.5069 | [0.17] | 0.5957 | [0.1056] |
| Stanislaus | 0.5848 | [0.036] | 0.6328 | [0.082] | 0.639 | [0.0991] | 0.5087 | [0.1772] | 0.5931 | [0.0839] |
| Tulare | 0.5776 | [0.0379] | 0.5812 | [0.0893] | 0.5102 | [0.0997] | 0.4393 | [0.1762] | 0.4883 | [0.1359] |

Note: The standard errors for the estimates are given in brackets next to the estimates
Table 15b: White Voter Registration by Political Party, Democrat, 1990-1998
California's Top 10 Producing Agricultural, or Rural, Counties

|  | Democrat |  |  |  |  |  |  |  |  |  |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| County | 1990 |  | 1992 |  | 1994 |  | 1996 |  | 1998 |  |
| Fresno | 0.5758 | $[0.0405]$ | 0.5452 | $[0.0327]$ | 0.553 | $[0.0369]$ | 0.4851 | $[0.1578]$ | 0.4668 | $[0.0423]$ |
| Imperial | 0.5839 | $[0.0447]$ | 0.5576 | $[0.0336]$ | 0.6162 | $[0.0419]$ | 0.5755 | $[0.1467]$ | 0.5493 | $[0.0434]$ |
| Kern | 0.4884 | $[0.0496]$ | 0.4398 | $[0.0322]$ | 0.4573 | $[0.0363]$ | 0.4024 | $[0.1537]$ | 0.3866 | $[0.044]$ |
| Merced | 0.596 | $[0.0517]$ | 0.5527 | $[0.0344]$ | 0.5622 | $[0.0376]$ | 0.5252 | $[0.1947]$ | 0.5786 | $[0.0378]$ |
| Monterey | 0.5278 | $[0.051]$ | 0.5013 | $[0.0312]$ | 0.5376 | $[0.0333]$ | 0.536 | $[0.133]$ | 0.5016 | $[0.0441]$ |
| Riverside | 0.4639 | $[0.0577]$ | 0.4242 | $[0.0281]$ | 0.4435 | $[0.0397]$ | 0.3999 | $[0.1608]$ | 0.3601 | $[0.0565]$ |
| San Diego | 0.3864 | $[0.0465]$ | 0.3592 | $[0.0227]$ | 0.3908 | $[0.0301]$ | 0.352 | $[0.1467]$ | 0.3336 | $[0.0468]$ |
| San Joaquin | 0.5794 | $[0.0485]$ | 0.5452 | $[0.0277]$ | 0.5391 | $[0.0292]$ | 0.5068 | $[0.1704]$ | 0.4726 | $[0.0482]$ |
| Stanislaus | 0.6018 | $] 0.0619]$ | 0.5532 | $[0.0299]$ | 0.5747 | $[0.0384]$ | 0.5089 | $[0.177]$ | 0.4866 | $[0.0392]$ |
| Tulare | 0.519 | $[0.0567]$ | 0.472 | $[0.0378]$ | 0.4852 | $[0.0434]$ | 0.4379 | $[0.176]$ | 0.3996 | $[0.0559]$ |

Note: The standard errors for the estimates are given in brackets next to the estimates
Table 16a: Latino Voter Registration by Political Party, Republican, 1990-1998
California's Top 10 Producing Agricultural, or Rural, Counties

|  | Republican |  |  |  |  |  |  |  |  |  |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| County | 1990 |  | 1992 |  | 1994 |  | 1996 |  | 1998 |  |
| Fresno | 0.248 | $[0.1061]$ | 0.250 | $[0.0739]$ | 0.315 | $[0.1225]$ | 0.272 | $[0.0215]$ | 0.356 | $[0.115]$ |
| Imperial | 0.231 | $[0.0949]$ | 0.226 | $[0.0657]$ | 0.255 | $[0.1206]$ | 0.149 | $[0.0232]$ | 0.227 | $[0.0709]$ |
| Kern | 0.270 | $[0.128]$ | 0.309 | $[0.1055]$ | 0.366 | $[0.1565]$ | 0.371 | $[0.0201]$ | 0.418 | $[0.1139]$ |
| Merced | 0.221 | $[0.1122]$ | 0.179 | $[0.0849]$ | 0.279 | $[0.1312]$ | 0.131 | $[0.0254]$ | 0.245 | $[0.0678]$ |
| Monterey | 0.228 | $[0.1133]$ | 0.212 | $[0.0703]$ | 0.271 | $[0.1357]$ | 0.183 | $[0.0162]$ | 0.264 | $[0.1058]$ |
| Riverside | 0.274 | $[0.1388]$ | 0.324 | $[0.1073]$ | 0.360 | $[0.1696]$ | 0.355 | $[0.0224]$ | 0.403 | $[0.1393]$ |
| San Diego | 0.287 | $[0.1404]$ | 0.332 | $[0.1056]$ | 0.372 | $[0.1416]$ | 0.315 | $[0.0207]$ | 0.361 | $[0.1198]$ |
| San Joaquin | 0.235 | $[0.1161]$ | 0.235 | $[0.0804]$ | 0.315 | $[0.1445]$ | 0.247 | $[0.0202]$ | 0.335 | $[0.1165]$ |
| Stanislaus | 0.228 | $[0.1175]$ | 0.208 | $[0.0824]$ | 0.294 | $[0.1399]$ | 0.196 | $[0.0245]$ | 0.302 | $[0.1009]$ |
| Tulare | 0.258 | $[0.1219]$ | 0.265 | $[0.0996]$ | 0.343 | $[0.158]$ | 0.292 | $[0.0244]$ | 0.369 | $[0.1377]$ |

Note: The standard errors for the estimates are given in brackets next to the estimates
Table 16b: White Voter Registration by Political Party, Republican, 1990-1998 California's Top 10 Producing Agricultural, or Rural, Counties

|  | Republican |  |  |  |  |  |  |  |  |  |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| County | 1990 |  | 1992 |  | 1994 |  | 1996 |  | 1998 |  |
| Fresno | 0.327 | $[0.0325]$ | 0.322 | $[0.0338]$ | 0.319 | $[0.0237]$ | 0.333 | $[0.0185]$ | 0.434 | $[0.0696]$ |
| Imperial | 0.278 | $[0.0358]$ | 0.289 | $[0.0348]$ | 0.232 | $[0.0268]$ | 0.232 | $[0.02]$ | 0.315 | $[0.0645]$ |
| Kern | 0.389 | $[0.04]$ | 0.413 | $[0.0335]$ | 0.406 | $[0.0233]$ | 0.394 | $[0.0208]$ | 0.488 | $[0.0761]$ |
| Merced | 0.273 | $[0.0414]$ | 0.289 | $[0.0355]$ | 0.275 | $[0.024]$ | 0.256 | $[0.0215]$ | 0.327 | $[0.0578]$ |
| Monterey | 0.293 | $[0.0411]$ | 0.291 | $[0.0323]$ | 0.269 | $[0.0213]$ | 0.256 | $[0.0184]$ | 0.351 | $[0.0675]$ |
| Riverside | 0.415 | $[0.0465]$ | 0.428 | $[0.0293]$ | 0.410 | $[0.0255]$ | 0.388 | $[0.022]$ | 0.500 | $[0.0969]$ |
| San Diego | 0.441 | $[0.0373]$ | 0.436 | $[0.0236]$ | 0.407 | $[0.0192]$ | 0.366 | $[0.019]$ | 0.453 | $[0.0781]$ |
| San Joaquin | 0.314 | $[0.0389]$ | 0.333 | $[0.0287]$ | 0.346 | $[0.0187]$ | 0.328 | $[0.0172]$ | 0.442 | $[0.0791]$ |
| Stanislaus | 0.284 | $[0.0496]$ | 0.315 | $[0.0309]$ | 0.293 | $[0.0246]$ | 0.274 | $[0.0234]$ | 0.390 | $[0.0628]$ |
| Tulare | 0.352 | $[0.0457]$ | 0.371 | $[0.0391]$ | 0.370 | $[0.0278]$ | 0.356 | $[0.0227]$ | 0.478 | $[0.0942]$ |

Note: The standard errors for the estimates are given in brackets next to the estimates
Table 17a: Latino Voter Democratic Party Registration, 1990-1998 Urban Counties with Latino VAP > 0.20

|  | Democrat |  |  |  |  |  |  |  |  |  |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| County | 1990 |  | 1992 |  | 1994 |  | 1996 |  | 1998 |  |
| Los Angeles | 0.5816 | $[0.0377]$ | 0.6336 | $[0.0619]$ | 0.6635 | $[0.0793]$ | 0.585 | $[0.1417]$ | 0.6438 | $[0.0529]$ |
| Orange | 0.5684 | $[0.0307]$ | 0.4533 | $[0.1054]$ | 0.3221 | $[0.0931]$ | 0.3015 | $[0.1377]$ | 0.2596 | $[0.0958]$ |
| San Bernardino | 0.5796 | $[0.0451]$ | 0.5557 | $[0.0846]$ | 0.4911 | $[0.0994]$ | 0.4288 | $[0.1434]$ | 0.5116 | $[0.1129]$ |
| Santa Barbara | 0.5686 | $[0.0414]$ | 0.4996 | $[0.0654]$ | 0.4826 | $[0.0562]$ | 0.4256 | $[0.0567]$ | 0.4492 | $[0.0342]$ |
| Santa Clara | 0.5795 | $[0.0396]$ | 0.5809 | $[0.0681]$ | 0.5662 | $[0.0861]$ | 0.4957 | $[0.1522]$ | 0.5925 | $[0.1127]$ |
| Santa Cruz | 0.5864 | $[0.0387]$ | 0.5975 | $[0.0301]$ | 0.6503 | $[0.0601]$ | 0.6059 | $[0.1003]$ | 0.6407 | $[0.0544]$ |
| Ventura | 0.5741 | $[0.045]$ | 0.48 | $[0.0636]$ | 0.4321 | $[0.072]$ | 0.3827 | $[0.0969]$ | 0.4021 | $[0.031]$ |

Note: I automatically excluded the top 10 agricultural, or rural, counties. For the remaining counties with a Latino VAP proportion greater than 0.20, I used the 1990 Census Data, Database C90STF3A, and calculated the ratio of the proportion living inside and outside urbanized areas. If this ratio was greater than 1 to 10 ( 10 percent), I excluded the county. The standard errors for the estimates are given in brackets next to the estimates.
Table 17b: White Voter Democratic Party Registration, 1990-1998 Urban Counties with Latino VAP > 0.20

|  | Democrat |  |  |  |  |  |  |  |  |  |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| County | 1990 |  | 1992 |  | 1994 |  | 1996 |  | 1998 |  |
|  | Estimate | Error | Estimate | Error | Estimate | Error | Estimate | Error | Estimate | Error |
| Los Angeles | 0.5859 | $[0.0426]$ | 0.5779 | $[0.0342]$ | 0.6108 | $[0.0378]$ | 0.5857 | $[0.1414]$ | 0.5579 | $[0.0452]$ |
| Orange | 0.3341 | $[0.0464]$ | 0.3225 | $[0.0245]$ | 0.3445 | $[0.0347]$ | 0.3027 | $[0.1382]$ | 0.2818 | $[0.0421]$ |
| San Bernardino | 0.4658 | $[0.0497]$ | 0.4481 | $[0.0323]$ | 0.4662 | $[0.0362]$ | 0.4288 | $[0.1439]$ | 0.4215 | $[0.0485]$ |
| Santa Barbara | 0.4348 | $[0.0454]$ | 0.4211 | $[0.0172]$ | 0.4635 | $[0.0173]$ | 0.4259 | $[0.0565]$ | 0.4206 | $[0.0263]$ |
| Santa Clara | 0.5276 | $[0.037]$ | 0.4966 | $[0.0184]$ | 0.5168 | $[0.0253]$ | 0.4957 | $[0.1523]$ | 0.4663 | $[0.0468]$ |
| Santa Cruz | 0.5999 | $[0.0273]$ | 0.5552 | $[0.0051]$ | 0.5862 | $[0.0142]$ | 0.6053 | $[0.1009]$ | 0.5471 | $[0.0285]$ |
| Ventura | 0.4159 | $[0.0436]$ | 0.405 | $[0.0167]$ | 0.4229 | $[0.0227]$ | 0.3828 | $[0.0975]$ | 0.3847 | $[0.0217]$ |

Note: I automatically excluded the top 10 agricultural, or rural, counties.
For the remaining counties with a Latino VAP proportion greater than 0.20 , I used the 1990 Census Data, Database C90STF3A, and calculated the ratio
of the proportion living inside and outside urbanized areas. If this ratio was greater than 1 to 10 ( 10 percent), I excluded the county. The standard
errors for the estimates are given in brackets next to the estimates.
Table 18a: Latino Voter Republican Party Registration, 1990-1998
Urban Counties with Latino VAP > 0.20

|  | Republican |  |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| County | 1990 |  | 1992 |  | 1994 |  | 1996 |  | 1998 |  |
| Los Angeles | 0.2314 | [0.0995] | 0.2016 | [0.0614] | 0.2444 | [0.1179] | 0.135 | [0.0183] | 0.2044 | [0.0624] |
| Orange | 0.3297 | [0.1641] | 0.426 | [0.1219] | 0.4466 | [0.159] | 0.4613 | [0.0219] | 0.4751 | [0.151] |
| San Bernardino | 0.2715 | [0.1366] | 0.311 | [0.0989] | 0.3472 | [0.1583] | 0.3179 | [0.0196] | 0.3514 | [0.1236] |
| Santa Barbara | 0.2692 | [0.1244] | 0.3136 | [0.0652] | 0.3414 | [0.0956] | 0.3327 | [0.0069] | 0.3362 | [0.0508] |
| Santa Clara | 0.2323 | [0.1085] | 0.2241 | [0.0677] | 0.2694 | [0.1276] | 0.1566 | [0.0186] | 0.2478 | [0.0969] |
| Santa Cruz | 0.1917 | [0.0942] | 0.1967 | [0.0288] | 0.1832 | [0.0947] | 0.1064 | [0.0134] | 0.1555 | [0.0676] |
| Ventura | 0.2904 | [0.1365] | 0.3635 | [0.0663] | 0.3791 | [0.1238] | 0.3601 | [0.0117] | 0.3927 | [0.051] |

Note: I automatically excluded the top 10 agricultural, or rural, counties.
For the remaining counties with a Latino VAP proportion greater than 0.20 , used the 1990 Census Data, Database C90STF3A, and calculated the ratio of the proportion living inside and outside urbanized areas. If this ratio was greater than 1 to 10 ( 10 percent), I excluded the county. The standard errors for the estimates are given in brackets next to the estimates.
Table 18b: White Voter Republican Party Registration, 1990-1998 Urban Counties with Latino VAP > 0.20

|  | 19 |  |  |  |  |  |  |  |  |  |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| County | 1990 |  | 1992 |  | 1994 |  | 1996 |  | 1998 |  |
| Los Angeles | 0.2896 | $[0.0342]$ | 0.2592 | $[0.0353]$ | 0.2278 | $[0.0241]$ | 0.2302 | $[0.0178]$ | 0.3036 | $[0.066]$ |
| Orange | 0.5352 | $[0.0371]$ | 0.5173 | $[0.0258]$ | 0.4918 | $[0.0222]$ | 0.4627 | $[0.0165]$ | 0.547 | $[0.0763]$ |
| San Bernardino | 0.4148 | $[0.04]$ | 0.405 | $[0.0336]$ | 0.3836 | $[0.0232]$ | 0.3581 | $[0.0193]$ | 0.4432 | $[0.0799]$ |
| Santa Barbara | 0.3846 | $[0.0366]$ | 0.3811 | $[0.0179]$ | 0.3636 | $[0.0111]$ | 0.3494 | $[0.0096]$ | 0.3876 | $[0.0432]$ |
| Santa Clara | 0.3135 | $[0.0298]$ | 0.3166 | $[0.0191]$ | 0.2907 | $[0.0162]$ | 0.2576 | $[0.0176]$ | 0.3476 | $[0.0709]$ |
| Santa Cruz | 0.2403 | $[0.0219]$ | 0.2507 | $[0.0053]$ | 0.2223 | $[0.0091]$ | 0.2027 | $[0.0097]$ | 0.2421 | $[0.0428]$ |
| Ventura | 0.436 | $[0.035]$ | 0.4233 | $[0.0174]$ | 0.4069 | $[0.0145]$ | 0.3851 | $[0.0145]$ | 0.4346 | $[0.0366]$ |

[^32]against the Republican Party anywhere in the state, it should have been in Orange County.

According to these results, Latino party registration does not appear to be any more volatile than white party registration, with average changes in the statewide registration rates between elections being 4 percent for Latinos and 3 percent for whites. These results are both good and bad for the political parties. They suggest that the Democratic Party has a consistent and reliable base of 50 to 60 percent of California registered Latinos. At the same time, Republicans can rely on 25 to 30 percent of registered Latinos. It appears that the advocacy of Proposition 187 and Proposition 209 by the Republicans may not have eroded this base of Latino support. In addition, these findings argue against a high conversion rate and suggest instead that, once registered, Latinos are no more likely to convert than whites. However, politicians may still be able to exploit the so-called split political personalities of Latinos by viewing them as possible crossover voters.

To verify these preliminary findings regarding the stability of Latino party registration and to determine the factors that influence Latino party registration, I perform a secondary analysis using the estimates of Latino political party registration. Specifically, I do a grouped logit analysis (as explained in Chapter 8) and use a weighted least squares method to estimate the model, which will
allow me to test the hypotheses enumerated below. ${ }^{47}$
Because California's Latino population is 80 percent Mexican American and Mexican Americans usually register as Democrats. I have written my hypotheses so that the term Latino refers to a predominantly Mexican-American population.

To gain a better understanding of the socioeconomic and demographic factors influencing Latino party registration in California during the 1990s, I test the following hypotheses:

1. Latinos who are financially better off will join the Republican Party while Latinos who are financially worse off will join the Democratic Party because Republicans favor reduced government and lower taxes.
2. Latinos who have higher levels of educational attainment are more likely to support the Democratic Party because they have the ability to understand that the policies of this party are in their best interest.
3. Latinos who live in predominately Spanish-speaking or urban areas will be more likely to support the Democratic Party because of the political socialization that takes place among the residents of these areas.
4. Latinos who have come of age in the 1990 s will be more likely to register as Democrats because of the anti-immigrant and anti-affirmative action positions taken by the Republican Party during this decade.
[^33]To examine the ways in which election events affect political party registration and the likelihood that Latinos will convert from one of the major political parties to the other, I will test the following hypotheses:
5. Because the Republican gubernatorial and senatorial candidates openly debated and voiced their support for Proposition 187, the anti-immigrant initiative, during the election campaign of 1994, Latinos would be more likely to register as Democrats in 1994.
6. Because the Republican governor and other GOP lawmakers spoke out in favor of Proposition 209, the anti-affirmative action initiative, during the election campaign of 1996, Latinos would be more likely to register as Democrats in 1996. ${ }^{48}$

To test these hypotheses, I specify the following model. I include regional, election-specific, and county socioeconomic variables. To allow for possible regional effects on Latino party registration, I include binary variables for four of the five major regions: Southern California, Bay Area, Central Coast, and Central Valley. The Mountain region is the excluded category.

I include four election-specific binary variables in the model to test whether or not the content or characteristics of specific elections, such as Proposition 187 in 1992 and Proposition 209 in 1994, encouraged Democratic
${ }^{48}$ However, Latinos have been shown to be ambivalent toward affirmative action with some Latino groups adopting the policy position that job and educational opportunities should be based on merit, not on ethnicity (de la Garza et al., 1992).

Latino political party registration. Next, to test whether or not party choice is influenced by age, I include the proportions of Latinos in three of four age categories: 18 through 29 years of age, 30 through 44 years of age, 45 through 59 years of age, and 60 years of age and older. The excluded category is the first category. I also include several county socioeconomic variables to see how these variables would influence Latino political party registration rates. I include the county's median income divided by the state's median income and six variables to measure the influence of education on Latino party registration. These are the proportion of county residents 18 years and older with this educational attainment level. The seven educational attainment levels are less than ninth grade, ninth grade or more but no high school diploma, high school diploma or its equivalent, some college but no degree, an associate's degree, a bachelor's degree, and graduate or professional degree. The excluded category is less than ninth grade. I also include the proportion of the county's population that is living in an urban area. This variable is included to see if party registration is influenced by whether an individual lives in an urban, or metropolitan, area or in a rural, or agricultural, area. Finally, I include a variable that is the proportion of the population that speaks Spanish at home. This variable will provide insight into whether or not a large Spanish-speaking community through political socialization encourages support for the preferred political party-in this case, the Democratic Party.

I specified the white Democratic registration and Republican registration models similarly to the Latino models. The only differences are that the age categories are the proportions of whites in the county instead of the proportions of Latinos for each of the age categories.

I collected these data from several sources. The Latino and white age data come from the California Department of Finance. ${ }^{49}$ The income, educational attainment, urban, and language variables are all from the 1990 U.S. Census. ${ }^{50}$ The median income data were from the U.S. Census reports on small area income and poverty estimates based on the Current Population Surveys.
> ${ }^{49}$ State of California, Department of Finance, County Population Projections with Age, Sex and Race/Ethnic Detail, July 1, 1990-2040 in 10-year Increments. I used the 1990 and 2000 projections, assumed a linear relationship, and calculated an average two-year increase to determine the number of Latinos and whites in each of the age categories for the 1992, 1994, 1996, and 1998 elections. The projections also had the age category 15 through 19. To separate out the 18- and 19-year-olds, I assumed that there was an equal number of individuals in each of these years.

[^34]Given this estimation technique, model specification, and data, the factors that influence Latino political party registration can be considered. In the next section, I present the estimated results of this model specification. First, I consider the significant variables, and then I consider the relative magnitudes of these variables.

The grouped logit results for Latino party registration are presented in Table 19. First, I consider the Democratic Party registration model results. When the regional variables are considered, Latino political party registration is influenced by region, with Latinos who reside in Southern California being more likely not to register as Democrats and those who reside in the Bay Area being more likely to register as Democrats. This result may simply reflect the political composition of these two regions. Southern California is more conservative and is home to more Republicans than the Bay Area.

Next, I consider the election year variables and find that, relative to 1990, Latinos were significantly more likely to register as Democrats in both 1992 and 1994. When the 1996 coefficient is considered, it is negative and significant, which suggests that Proposition 209 and the implementation of motor voter legislation did not significantly increase Latino Democratic registration as Democrats had hoped and Republicans had feared.

When the age variables are considered, Latinos over the age of 60 are significantly more likely not to register as Democrats. This result contradicts an earlier finding by Uhlaner and Garcia (1998) that Latinos and specifically

Table 19: Grouped Logit Analysis of Latino Political Party Registration Rates for California Counties

| Item | Democrat |  | Republican |  |
| :---: | :---: | :---: | :---: | :---: |
|  | Coefficient | Standard Error | Coefficient | Standard Error |
| Constant | -1.812 | 1.876 | -0.062 | 1.868 |
| Southern California | -0.260 | 0.147 | 0.148 | 0.149 |
| Central Coast | 0.073 | 0.147 | -0.132 | 0.149 |
| Central Valley | -0.001 | 0.113 | 0.066 | 0.110 |
| Bay Area | 0.517** | 0.119 | -0.639** | 0.118 |
| 1992 | $0.156^{* *}$ | 0.051 | -0.007 | 0.052 |
| 1994 | 0.120* | 0.065 | $0.261^{* *}$ | 0.064 |
| 1996 | -0.150* | 0.083 | -0.125 | 0.085 |
| 1998 | 0.135 | 0.101 | $0.196{ }^{\text {** }}$ | 0.995 |
| Age 30-44 | -0.386 | 1.395 | -1.813 | 1.331 |
| Age 45-59 | 1.046 | 1.599 | -2.919* | 1.565 |
| Age 60 + | -1.903** | 0.794 | 0.632 | 0.768 |
| Median Income | -1.486** | 0.169 | 1.959** | 0.168 |
| Urban | 0.579** | 0.211 | -0.515** | 0.210 |
| No high school diploma | 4.829* | 2.861 | -2.149 | 2.776 |
| High school diploma | 3.830* | 1.983 | -1.887 | 1.982 |
| Some college, no degree | -3.545* | 2.106 | 4.651** | 2.132 |
| Associate degree | 17.805** | 4.021 | -12.544** | 4.104 |
| Bachelor's degree | -0.176 | 3.221 | 1.687 | 3.161 |
| Graduate/Professional degree | 12.875** | 3.113 | -15.233** | 1.018 |
| Spanish | 1.723* | 0.984 | -0.812 | 1.018 |
| Adjusted R-squared = | 0.552 |  | 0.653 |  |

## Number of Observations $=290$

Note: * indicates significance at the $\mathrm{p}=0.10$ and ** indicates significance at the $\mathrm{p}=0.05$ level.

Mexican Americans would become more attached to their political parties or the party of their ethnic group as they aged because of experience and socialization.

The median income variable is negative and significant, which suggests that, as income increases, Latinos are less likely to register as Democrats. This result agrees with the previous literature on party registration but is contrary to the findings in Uhlaner and Garcia (1998), which suggested that income is irrelevant in predicting Latino party registration.

The urban variable is significant and positive, which indicates that living in a city, or urban environment, increases the rate of registration with the Democratic Party. Given that income and language have been controlled for, this result suggests that there is something else about the urban environment which provides political socialization and encourages registration with the Democratic Party. This additional factor may be ethnic-based resources.

When educational attainment is considered, I find that education encourages Democratic registration. Latinos with an associate's degree and Latino's with a graduate education are much more likely to register as Democrats. Finally, when the language variable is considered, the proportion of households that speak Spanish is positive and significant, which suggests that stronger Latino communities may encourage Democratic registration. This result supports earlier findings by Uhlaner and Garcia (1998).

Now, when Republican Party registration is considered in Table 19, a similar pattern is seen. The Bay Area variable is significant and negative, which reflects the regional politics of the state. Surprisingly, the 1994 election year variable is positive and significant, suggesting that, contrary to common wisdom, Proposition 187 did not have significant influence on Republican Party registration.

The age variables are significant and negative, which suggests that young Latinos are less likely to register Republican. Income is positive and significant, which suggests that Latinos living in areas with higher median incomes are more likely to register Republican.

The urban variable is negative and significant, which suggests that Latinos living in urban areas are less likely to register Republican. The educational variables show that better-educated Latinos-specifically, those with either an associate's degree or a graduate degree—are significantly less likely to vote Republican.

Now, I can consider the relative magnitude of the effects of the significant variables on Latino registration rate. Recalling that I used the weighted least squares method to estimate the model, the relative magnitudes of the effects of the coefficients can be easily compared.

First, the variables with the largest significant coefficients are education, age, and income. This result suggests that these variables are the primary determinants of white and Latino party registration. Table 19 reveals that the
primary determinants of Latino party registration are similar to those for white party registration and are education, age, and income. These results suggest that it is the characteristics of the individuals that matter, not the election-specific issues. Unfortunately for the Republicans, these individual characteristics cannot be easily changed. Thus, if Republicans are to be successful among Latinos, they need to find ways to appeal to younger Latinos and to better- educated Latinos.

To better understand the degree to which these different variables affect Latino registration, I perform several counterfactuals and consider how changing the educational attainment of this community, changing the age composition, and eliminating issues alters Latino Democratic registration rates. I focus my analysis on Los Angeles County because of its importance in California and in Latino politics. This county has the largest Latino voting age population (VAP) of any urban county and has the fastest-growing VAP of any county in the state. For example, the model shows a Latino Democratic registration rate of 64 percent in Los Angeles County in 1998. If I change the age distribution of the Latino population to the age distribution projected for 2010, then the Democratic registration rate increases to 65 percent. This result suggests that the simple aging of the Latino population may not by itself alter Democratic registration rates. Also, when I consider the effects of education, if I increase the percentage of individuals who have associate's degrees and graduate degrees both by 5 percent and decrease the percentage of individuals who have some college but
no degree and a bachelor's degree by 5 percent, the Latino Democratic registration rate changes from 64 to 91 percent, an increase of 27 percent. Clearly, educational attainment is very important in determining Latino registration rates.

Alternatively, when I consider the influence of issues on Latino Democratic registration rates, I see that it is much smaller. For example, if I assume that Proposition 187 did not occur, Democratic registration would have been 61 percent instead of 64 percent, a decrease of only 3 percent. Likewise, when the effects of Proposition 209 are considered, Democratic registration increases by only 4 percent, from 57 to 61 percent. Next, when the effect of income is considered, if the county's median income divided by the state's median income is increased by 10 percent, Democratic registration decreases from 64 percent to 60 percent. The education effects are nearly eight and nine times greater, respectively, than the issue and income effects. These results suggest that it is not issues but educational attainment that influences individuals to register with a particular political party.

To confirm that the above results are not party specific, I repeat the same analysis for the Republican Party. The model shows a Latino Democratic registration rate of 21 percent in Los Angeles County in 1998. If I change the age distribution of the Latino population to the age distribution projected for 2010, then the Republican registration rate falls to 20 percent. As was found for the Democratic Party, aging of the Latino population by itself has little influence
on Republican registration rates. Also when I consider the effects of education, if I increase the percentage of individuals who have associate's degrees and graduate degrees both by 5 percent and decrease the percentage of individuals who have some college but no degree and a bachelor's degree both by 5 percent, the Latino Republican registration rate changes from 21 to 5 percent, a decrease of 16 percent. This result confirms what was shown above, that is, that education is important in determining political party registration.

Again, the influence of issues on Latino political party registration is small. For example, if I assume that Proposition 187 did not occur, registration would have been 24 percent instead of 29 percent, a decrease of only 5 percent. This result also confirms the results obtained from the earlier analysis that Proposition 187 did not dissuade Latinos from registering with the Republican Party. Likewise, when the effects of Proposition 209 are considered, Republican registration decreases by only 2 percent, from 23 to 21 percent.

Next, when the effect of income is considered, if the county's median income divided by the state's median income is increased by 10 percent, Republican registration increases from 21 to 31 percent. The effects of education are nearly eight and nine times greater, respectively, than the effects of issues. It is interesting to note that the income effect appears to be more important for Republicans than for Democrats. These results confirm that educational attainment and income are far more important than issues in persuading individuals to register with a particular political party.

Next, I consider the white Democratic and Republican registration rates and identify the factors that are most important in determining them (see Table 20). When I examine the rate of Democratic registration, I see that, as was true of Latino political party registration, white political party registration is influenced by area of residence, with whites who reside in Southern California being less likely to register as Democrats while those who reside in the Bay Area are more likely to register as Democrats. Unlike Latinos, whites were significantly less likely to register as Democrats in 1992, 1996, and 1998. This finding suggests that the controversial issues of Proposition 187 and Proposition 209, although advocated by the Republican Party, did not cause more whites to register as Democrats in the short term. The long-term implications of the Republican Party's actions are still not known.

When the age variables are considered, whites over the age of sixty, like Latinos, are significantly more inclined not to register with the Democratic Party while younger whites are inclined to register with this party. As with Latino Democratic Party registration, the income and urban variables are now significant: a higher median income in a county discourages Democratic registration, while an increased urban population in a county encourages Democratic registration. As was true for Latinos, increased education appears to have a positive influence on Democratic registration with the exception of individuals who have only some college but have not earned a degree.

Table 20: Grouped Logit Analysis of White Political Party Registration Rates for California Counties

| Item | Democrat |  | Republican |  |
| :---: | :---: | :---: | :---: | :---: |
|  | Coefficient | Standard Error | Coefficient | Standard Error |
| Constant | -4.428** | 1.271 | 0.425 | 1.296 |
| Southern California | -0.248** | 0.109 | 0.179 | 0.110 |
| Central Coast | 0.139 | 0.112 | -0.166 | 0.113 |
| Central Valley | 0.051 | 0.083 | 0.137* | 0.081 |
| Bay Area | $0.678{ }^{* *}$ | 0.099 | -0.692** | 0.099 |
| 1992 | -0.068* | 0.035 | -0.047 | 0.036 |
| 1994 | 0.040 | 0.039 | -0.181** | 0.039 |
| 1996 | -0.080* | 0.044 | -0.295** | 0.044 |
| 1998 | -0.164** | 0.050 | 0.035 | 0.049 |
| Age 30-44 | 1.263** | 0.490 | -1.928** | 0.489 |
| Age 45-59 | 1.705** | 0.689 | -1.237* | 0.687 |
| Age 60 + | -1.256** | 0.462 | 1.792** | 0.465 |
| Median Income | -1.977** | 0.138 | $2.238 * *$ | 0.140 |
| Urban | 0.287* | 0.163 | -0.282* | 0.161 |
| No high school diploma | 7.754** | 1.941 | -3.864** | 1.928 |
| High school diploma | 5.913** | 1.338 | -2.564* | 1.356 |
| Some college, no degree | -0.833 | 1.511 | 2.804* | 1.561 |
| Associate degree | 18.835** | 2.993 | -10.005** | 3.049 |
| Bachelor's degree | 4.476** | 2.160 | -2.158 | 2.154 |
| Graduate/Professional degree | 12.717** | 2.277 | -11.944** | 2.371 |
| Spanish | 3.303** | 0.710 | -1.537** | 0.7467 |
| Adjusted R-squared = | 0.780 |  | 0.804 |  |

## Number of Observations $=290$

Note: * indicates significance at the $\mathrm{p}=0.10$ and ** indicates significance at the $\mathrm{p}=0.05$ level.

When the Republican registration rate model for whites is considered, comparable results are found. For example, whites residing in the Bay Area are less likely to register with the Republican Party. The controversial issues of the 1990s, Proposition 187 and Proposition 209, appear to discourage Republican registration slightly. When the age variables are considered, younger whites are more likely not to register as Republicans, while whites over the age of sixty are more likely to register as Republicans. Again, income is important, with a higher county median income clearly indicating a higher Republican registration rate. The urban variable is negative and significant, suggesting that whites residing in urban areas are considerably less likely to register Republican. The education variables are significant and negative with the exception of those individuals who have some college.

Because of the complementarity of the results, I focus my further discussion of white political party registration on the Democratic registration rates. When the magnitudes of coefficients are considered, the most important factors influencing white Democratic registration are age, income, and education. These results suggest that, as was true of Latinos, it is primarily the characteristics of the individuals themselves that matter most in determining political party registration, not election-specific issues.

Thus, the preliminary and secondary analyses demonstrate that Latino political party registration is stable and that there was not an immediate blacklash against the Republican Party for its support of several controversial
initiatives. These results suggest that contrary to folk wisdom and stability Hypotheses 5 and 6, Latinos did not switch their party registration from Republican to Democrat in the short term. However, what may have occurred is that voters, instead of changing their party registration because of these issues, crossed over to support Democratic candidates on election day. Perhaps Latinos should no longer be viewed as targets of conversion by the major political parties but instead as potential crossover voters. The extent of Latino crossover voting needs to be studied thoroughly to understand the nature of Latino political party registration and partisan support.

When I considered the factors that influence Latino political party registration, I found support for Hypotheses 1, 2, 3, and 4, suggesting that both the characteristics of the individual voter (that is, age, education, and income) and his living environment (that is, the number of Spanish-speaking households and urban) were important in determining his party registration. However, when the magnitude of these effects is considered, it becomes clear that education and income are the dominant factors in determining Latino political party registration. These results are the same for whites, which suggests that Latinos political party registration is similar to that of whites and of the larger electorate.

The importance of education and income suggests that the political parties are entrenched. However, these results do offer some alternatives. It may significantly benefit the major political parties to foster and encourage education in the Latino community. Republicans may want to seek out ways to
attract the younger Latinos. In addition, evidence in Orange County, California, indicates that conservative areas may be able to attract more Latinos to the Republican Party, perhaps, by targeting Latino neighborhoods during registration drives, having candidates who speak to Latino concerns, and encouraging Latino participation in the party leadership.

Democrats and Republicans can expect to enjoy a steady Latino political registration rate of between 50 and 60 percent and 20 and 30 percent, respectively. However, what remains to be seen is if the Latino electorate can be counted on at the ballot box. The findings detailed in preceding chapters suggest that Latinos turn out at rates that are lower than those for whites and, because of their split political personalities, cannot always be counted on to support the party with which they are registered. This result suggests that in close races, politicians would be wise to woo these potential crossover voters. In addition, these findings may explain why Latino political influence in the major political parties continues to be illusive.

Chapter 9. Texas: Latino and White Registration and Turnout, 1990-1998

Like the California Latino population, the Texas Latino population is the state's largest and fastest-growing ethnic group. In 1990, 25 percent of Texas's population was Latino; however, today this number has increased to 32 percent. ${ }^{51}$ Although there are Latino communities throughout the state, the majority of the Texas Latino population lives in five counties: Bexar, Dallas, El Paso, Harris, and Hidalgo. Harris County, which includes the city of Houston, has the largest Latino population in the state. ${ }^{52}$ The largest concentration of Latinos, or the highest percentage of Latinos relative to other ethnic groups, is found in several other counties. In Texas, six counties (Brooks, Jim Hogg, Maverick, Starr, Webb, and Zavala), Latinos constitute more than 90 percent of the population. ${ }^{53}$

To understand how this growth will influence local, state, and national politics, and to compare the Texas experience with that of California, I calculate the size and compare the characteristics of Texas's white and Latino voting-age

[^35]populations (VAPs) for each county and each general election between 1990 and 1998. By examining five general election cycles, I hope to gain a better understanding of the long-term growth in the Latino voting-age population. Recognizing that voting-age population size and concentration represent only the potential but not the actual political participation rates of these populations, I then use these county-level estimates of the Latino and white voting-age populations coupled with county-level figures of registration and turnout to produce estimates of Latino and white voter registration and turnout for each county during the general elections of 1990s, employing the method of generalized bounds.

I begin by estimating the voting-age population for Latinos and whites in Texas's 254 counties for the five general elections of the 1990s. To estimate the VAP for each county, I perform a two-stage procedure. First, I calculate the VAP proportion for each county, and then, using this proportion, I calculate the Latino and white VAPs for Latinos for each county and each election.

To calculate the VAP proportion for each county, I use the same method that I did with the California data (described in Chapter 3), which allowed me to control for age, citizenship, and felony convictions. I used 1990 U.S. Census data. First, I calculate voting-eligible population for each county, controlling for age, citizenship, and felony convictions. Then, I divide this voting-eligible population by the total population of the county to obtain the VAP proportion. I
assume the VAP proportion for each county remains constant from 1990 to 1998.

To calculate the Latino and white VAPs for each county, I mulitpy the total Latino and white populations for each county as estimated by the Texas State Data Center by the VAP proportion for each year. ${ }^{54}$ Using these county-level VAP estimates, I then extrapolate the Latino and white voting-age populations for Texas and its four different geographic and political regions (Frontier West, German Hill, Antebellum East, and Spanish South). ${ }^{55}$

[^36]Frontier West is composed of the following 101 counties: Andrews, Archer, Armstrong, Bailey, Baylor, Borden, Bosque, Briscoe, Brown, Burnet, Callahan, Carson, Castro, Childress, Clay, Cochran, Coke, Coleman, Collingsworth, Comanche, Cooke, Coryell, Cottle, Crane, Crockett, Crosby, Dallam, Dawson, Deaf Smith, Dickens, Donley, Eastland, Ector, Erath, Fisher, Floyd, Foard, Gaines, Garza, Glasscock, Gray, Hale, Hall, Hamilton, Hansford, Hardeman, Hartley, Haskell, Hemphill, Hockley, Hood, Howard, Hutchinson, Jack, Jones, Kent, King, Knox, Lamb, Lampasas, Lipscomb, Loving, Lubbock, Lynn, Martin, Midland, Mills, Mitchell, Montague, Moore, Motley, Nolan, Ochiltree, Oldham, Palo Pinto, Parker, Parmer, Potter, Randall, Reagan, Roberts, Runnels, Schackelford, Scurry, Sherman, Somervell, Stephens, Sterling, Stonewall, Swisher, Taylor, Terry, Throckmorton, Upton, Wheeler, Wichita, Willbarger, Winkler, Wise, Yoakum, and Young.

German Hill is composed of the following 16 counties: Bandera, Blanco, Concho, Gillespie, Irion, Kendall, Kerr, Kimble, Llano, Mason, McCulloch, Menard, San Saba, Scheicher, Sutton, and Tom Green.

The Antebellum East is composed of the following 95 counties: Anderson, Angelina, Aransas, Austin, Bastrop, Bell, Bowie, Brazoria, Brazos, Burleson,

Each of these regions has its own unique political personality. The Spanish South is predominately Latino. This area typically votes Democratic and has begun to elect Latinos to public office (Halter, 1999). The Antebellum East was settled originally by southern cotton growers looking for more and better land. This area is still predominately white and votes Democratic because its residents would never support the party of Lincoln. The Frontier West region of

Caldwell, Calhoun, Camp, Cass, Chambers, Cherokee, Collin, Colorado, Comal, Dallas, Delta, Denton, DeWitt, Ellis, Falls, Fanin, Fayette, Fort Bend, Franklin, Freestone, Galveston, Goliad, Gonzales, Grayson, Gregg, Grimes, Guadalupe, Hardin, Harris, Harrison, Hays, Henderson, Hill, Hopkins, Houston, Hunt, Jackson, Jasper, Jefferson, Johnson, Kaufman, Lamar, Lavaca, Lee, Leon, Liberty, Limestone, Madison, Marion, Matagorda, McLennan, Milam, Montgomery, Morris, Nacogdoches, Navarro, Newton, Orange, Panola, Polk, Rains, Red River, Refugio, Robertson, Rockwall, Rusk, Sabine, San Augustine, San Jacinto, Shelby, Smith, Tarrant, Titus, Travis, Trinity, Tyler, Upshur, Van Zandt, Victoria, Walker, Waller, Washington, Wharton, Williamson, and Wood.

Spanish South is composed of the following 42 counties: Atascosa, Bee, Bexar, Brewster, Brooks, Cameron, Culberson, Dimmit, Duval, Edwards, El Paso, Frio, Hidalgo, Hudspeth, Jeff Davis, Jim Hogg, Jim Wells, Karnes, Kenedy, Kinney, Kleberg, La Salle, Live Oak, Maverick, McMullen, Medina, Nueces, Pecos, Presidio, Real, Reeves, San Patricio, Starr, Terrell, Uvalde, Val Verde, Ward, Webb, Willacy, Wilson, Zapata, and Zavala.

These regions are based on D.W. Meinig's regions as explained in Imperial Texas: An Intrepretive Essay in Cultural Geography (Austin, Texas: University of Texas Press, 1969). I used these regions because they are often used in the literature (for example, see Gary Halter, Party Competition in the Texas Legislature: The Case of Non-Competive Districts, Texas A\&M University Working Paper, \#61, 1999). Although, the original designation of these regions allowed for counties to be split between regions, my unit of analysis, the county, would not permit this. Therefore, I divided the counties into these regions without splitting them. Those counties that were originally divided were assigned to the region in which they had the most area.

Texas was settled after the Civil War by Midwesterners. This area typically supports Republican presidential candidates. The German Hill country of Texas was originally settled by Eastern Europeans before the Civil War in the early 1800s. These settlers were skilled artisans and remained a distinct culture. They have traditionally supported Republican candidates.

The estimates for the 1990 elections are provided in Table 21 (for individual county estimates, see Table A8 in the Appendix). Table 21 shows that Latinos compose a significant minority (approximately 25 percent) of Texas's voting-age population. Table 21 also reveals two important characteristics of Texas's Latino VAP. First, this VAP is concentrated in the Spanish South, with nearly two-thirds of the voting-age population of this region being Latino in 1998. Second, the Latino and white VAPs are relatively stable during this ten-year period, experiencing gradual increases as the white VAP gradually declines. These results suggest that Latinos may be experiencing a gradual increase in political potential throughout Texas but will be most successful at obtaining and retaining political power in the Spanish South region of the state. Therefore, the concentration of Latinos in the Spanish South may afford them the ability to gain political power in this region of Texas; however, at the same time, this concentration may limit their ability to gain a large constituency or to have influence over politics statewide.
Table 21: Texas Latino and White VAP as a Percent of Total VAP, 1990-1998

|  | Latinos |  |  |  |  |  | Whites |  |  |  |  |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Geographic Regions | 1990 | 1992 | 1994 | 1996 | 1998 |  | 1990 | 1992 | 1994 | 1996 | 1998 |
| Texas | 0.238 | 0.243 | 0.247 | 0.253 | 0.259 |  | 0.688 | 0.682 | 0.676 | 0.668 | 0.661 |
|  | $[0.229]$ | $[0.230]$ | $[0.231]$ | $[0.232]$ | $[0.233]$ |  | $[0.208]$ | $[0.209]$ | $[0.210]$ | $[0.210]$ | $[0.211]$ |$]$

Note: The standard errors for the estimates are given in brackets below the estimates.

Recognizing that voting-age population indicates the potential but not the actual political participation rates of these populations, I now consider registration. I use county-level estimates of voting-age population and of voter registration from the Texas Secretary of State's Office to extrapolate the registration rates for Latinos and whites in Texas. However, when I compare my calculated VAP for each county with the total registered for each county as provided by the Secretary of State's office, I find that, in a large number of counties, the total number of registered voters exceeds the total VAP. Upon closer examination, I find that this fact appeared to be independent of county racial composition, location, and population size. For example, in 1990, 16 counties had total numbers of registered voters greater than total voting-age population. ${ }^{56}$ These counties were scattered throughout Texas. Six of the counties had a majority of Latinos, and ten of the counties had a majority of whites. The counties had total populations ranging from 107 to more than 40,000. In ten additional counties, the total number of registered voters, when divided by total voting-age population, was greater than 95 percent, which is questionable. Although, one might think that the problem should diminish with each election as the total VAP increases, it instead remained the same with approximately 15 counties. However, the counties did not remain constant.
${ }^{56}$ The 17 counties are Brooks, Concho, Crockett, Dimmit, Duval, Jim Hogg, Kenedy, Kent, La Salle, Lampasas, Loving, Real, Roberts, San Augustine, Starr, Stonewall, and Zavala.

There are two possible explanations for this discrepancy. One is that, because my VAP calculation is based on 1990 U.S. Census data, the U.S. Census in 1990 underestimated the total population in each of these counties. The other is that voter registration roles in these counties are not being purged or updated to reflect net migration or deaths. Instead of discarding these observations, I decided to use a deflater on the entire data set. I calculated an adjusted registration rate for each county. First, I calculated a death rate for each county using the total number of deaths in that county and the total population of that county in 1995. I relied on the Texas Department of Health Annual Report for 1995 for the number of deaths in each county and the Texas Data Center for the total population in each county in 1995.57 Next, I multiplied the death rate by the total number of registered voters as reported by the Secretary of State's office. Then, I subtracted this number from the total number of registered voters in the county. Finally, to control for migration, I used the netmigration rate as provided by the Texas State Data Center for the period 1990 through 1995, and for those counties that experienced a net loss, I multiplied the net-migration rate and the total number of registered voters for the county and subtracted this number from the total number of registered voters after the death rate adjustment to obtain the adjusted registration figure for each county.

[^37]After this adjustment, many counties still had registration rates greater than 1.0, and even more counties had questionable registration rates of 95 percent or more. ${ }^{58}$ To further correct for this problem, I gave the counties with these questionable registration rates the average rate for counties with similar populations that had registration rates of less than 95 percent. The population increments were less than 2,500 , less than 5,000 , less than 7,500 , less than 15,000, less than 25,000 , and less than 50,000 . I used these adjusted registration figures and the VAP figures to calculate the registration rated for white and Latinos using the method of generalized bounds.

The estimates for the five general elections in the 1990s are presented in Table 22 (for the individual county estimates, see Table A9 in the Appendix). This table reveals one very important fact about Latino registration in Texas. Latino registration rates are nearly equal to those for whites. Unlike in California, where Latino registration lags behind that for whites, Texas Latinos appear to be exercising their right to vote and to have their voices heard in the political process. For example, in the Spanish South region of Texas, which is predominantly Latino, registration rates are the highest in the state and even exceed the registration rates for whites. For example, in this region, the Latino registration rate in 1998 was 89 percent, while the white registration rate was 86 percent. These results suggest that Latinos may be taking advantage of their

[^38]Table 22: Texas Latino and White Voter Registration, 1990-1998

|  | Latinos |  |  |  |  |  | Whites |  |  |  |  |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Geographic Regions | 1990 | 1992 | 1994 | 1996 | 1998 |  | 1990 | 1992 | 1994 | 1996 | 1998 |
| Texas | 0.736 | 0.734 | 0.664 | 0.82 | 0.766 |  | 0.667 | 0.744 | 0.716 | 0.855 | 0.883 |
|  | $[0.104]$ | $[0.089]$ | $[0.088]$ | $[0.053]$ | $[0.168]$ |  | $[0.136]$ | $[0.095]$ | $[0.097]$ | $[0.062]$ | $[0.063]$ |$]$

Note: Because throughout this statistical material I am controlling for population size, all of these proportions have been weighted to reflect relative numbers of Latinos and whites living in these regions. The standard errors for the estimates are given in brackets below the estimates.
political potential in this region of Texas. The statewide registration rate was 77 percent for Latinos in 1998 compared with 88 percent for whites. In that same year, the Latino registration rate in California was only 53 percent, and the white rate was 83 percent. Thus, there was a 30 percent difference between the registration rates of Latinos and whites in California but only an 11 percent difference between the registration rates for these two groups in Texas. These findings suggest that, although the Latino populations in both of these states are similar-that is, are predominantly from Mexico-they are behaving differently with regard to politics. These higher rates of registration also suggest that Latinos in Texas are far more integrated into the political system than are Latinos in California.

Next, I consider what proportions of the Latinos and whites who are registered to vote actually turned out in the four general elections between 1990 and 1998. Again, for the turnout figures, I rely on figures from the Texas Secretary of State's office. For several counties, the number who turned out exceeded the number of registered voters. In these instances, I adjusted turnout to be 100 percent. ${ }^{59}$

In Table 23, I present a summary of my county-level turnout estimates for the entire state and the four different regions for the five general elections of the 1990s (for the individual county estimates, see Table A9 in the Appendix).

[^39]Table 23: Texas Latino and White Voter Turnout, 1990-1998

|  | Latinos |  |  |  |  |  | Whites |  |  |  |  |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Geographic Regions | 1990 | 1992 | 1994 | 1996 | 1998 |  | 1990 | 1992 | 1994 | 1996 | 1998 |
| Texas | 0.414 | 0.639 | 0.397 | 0.454 | 0.237 |  | 0.575 | 0.799 | 0.601 | 0.606 | 0.449 |
|  | $[0.096]$ | $[0.088]$ | $[0.102]$ | $[0.119]$ | $[0.128]$ |  | $[0.078]$ | $[0.051]$ | $[0.070]$ | $[0.079]$ | $[0.0 .98]$ |
| Frontier West | 0.462 | 0.668 | 0.445 | 0.494 | 0.284 |  | 0.591 | 0.801 | 0.604 | 0.612 | 0.458 |
|  | $[0.095]$ | $[0.075]$ | $[0.101]$ | $[0.107]$ | $[0.086]$ | $[0.093]$ | $[0.050]$ | $[0.082]$ | $[0.088]$ | $[0.109]$ |  |
| German Hill | 0.475 | 0.699 | 0.469 | 0.54 | 0.331 |  | 0.602 | 0.815 | 0.642 | 0.673 | 0.523 |
|  | $[0.072]$ | $[0.073]$ | $[0.086]$ | $[0.109]$ | $[0.165]$ |  | $[0.065]$ | $[0.039]$ | $[0.064]$ | $[0.080]$ | $[0.077]$ |
| Antebellum East | 0.443 | 0.657 | 0.416 | 0.469 | 0.233 |  | 0.573 | 0.799 | 0.601 | 0.603 | 0.44 |
|  | $[0.048]$ | $[0.078]$ | $[0.052]$ | $[0.049]$ | $[0.146]$ | $[0.059]$ | $[0.053]$ | $[0.053]$ | $[0.043]$ | $[0.062]$ |  |
| Spanish South | 0.376 | 0.615 | 0.368 | 0.43 | 0.229 |  | 0.559 | 0.795 | 0.604 | 0.604 | 0.489 |
|  | $[0.129]$ | $[0.120]$ | $[0.101]$ | $[0.175]$ | $[0.145]$ | $[0.066]$ | $[0.044]$ | $[0.062]$ | $[0.090]$ | $[0.080]$ |  |

Note: Because throughout this statistical material I am controlling for population size,
all of these proportions have been weighted to reflect relative numbers of Latinos and whites living in these regions. The standard errors for the estimates are given in brackets below the estimates.

These figures highlight the fact that Texas Latinos-like California Latinos-are politically disadvantaged because they turn out to vote at substantially lower rates than do whites and their political participation from one election to the next is less predictable than that of whites. For example, in 1998, less than one quarter of registered Latinos turned out to vote. At the same time, 45 percent of registered whites turned out to vote, a rate nearly double that of Latinos. This finding indicates that, although Texas Latinos are registering to vote, they are not exercising their right to vote on election day. Further, this finding suggests that Latinos are not a reliable electorate because simply being registered does not imply that they will vote. In other words, there is little correlation between voter registration and voter turnout. In Texas, Latino turnout rates are also less predictable, with average election changes of 19 percent compared with average election changes for Texas whites of only 14 percent.

Although Texas Latinos register at higher rates than do California Latinos, they do not turn out at a higher level and may even turn out at lower levels. In 1998, the turnout rate for Latinos in California was 37 percent compared with only 24 percent for Texas Latinos. In addition, like California Latinos, Texas Latinos are not a reliable electorate because their turnout levels fluctuate dramatically between presidential and midterm elections. These observations correlate with the California findings that Latinos' political voices are not being heard because they do not turn out on election day and suggest that limited

Latino participation in the political process may not be a state problem that is limited to California, or to California and Texas, but is a widespread problem that must be addressed on a national level. In addition to low turnout rates, the volatility of these rates suggests that Latinos are an unreliable and unpredictable voting bloc. This volatility coupled with this group's low turnout rates may help to explain why, even though Latinos constitute large and growing proportions of the populations of California and Texas, two states whose large populations entitle them to significant numbers of electors, Latinos have little effect on the outcomes of presidential elections. However dismal these findings regarding volatility may appear, they also suggest that Latinos are more susceptible to campaign messages and issues.

## Chapter 10. Conclusion: Latino Citizenship and Participation in California and Texas

For some time now, the Latino voice has been gradually gaining strength in American politics, particularly in such states as California, Florida, Illinois, New York, and Texas, where large numbers of Latino immigrants have settled and large numbers of electoral votes are at stake. Although the potential of the Latino community to influence American politics is evident in several states, it is nowhere more apparent than in California. The Golden State is home to more than one-third of the United States Latino population, and this population is increasing rapidly. Within the next few decades, Latinos will constitute the largest single racial/ethnic group in the state. Because most of this increase will be the result of births in California, not immigration, the vast majority of these Latinos will be entitled to all rights of citizenship, including both registering to vote and casting their ballots.

The fact that the political power of Latinos in California and elsewhere has not been commensurate with their numbers may reflect their failure to participate fully in the political process; however, the balance of power may be shifting. The issues of immigration and affirmative action appear to have awakened what some political observers have called "a sleeping giant" and energized previously apathetic Latino voters, causing many young Latinos to express their political
opinions by demonstrating and many Latino immigrants to become citizens and acquire the right to vote.

In a representative democracy, voting is both the primary means by which citizens acquire political power and the fundamental way in which they exercise it. For their voices to be heard and their opinions to be considered, those who have registered to vote must turn out on election day. Yet, researchers have repeatedly found relatively low voter turnout rates among Latinos. In my research, I examined Latino participation in the politics of the state of California, seeking to understand what percentage of the eligible Latino population registers to vote, with what political party they register, how many registered Latinos go to the polls on election day, what factors might increase their participation in politics, and whether increased political participation might lead to greater political power for Latinos.

Understanding voting behavior is important because the United States democratic political process is predicated upon the fundamental right of each citizen to vote and to have his vote be equal in value to each other vote cast. However, if the preferences of the voting public are not representative of the voting-eligible population, equality in voting rights may not yield equality of voting results. Therefore, it is imperative to understand the rate at which the Latino population is turning out and why Latinos continue not to vote and not to let their voices be heard in the halls of government.

Because of differences within the Latino community, I included a chapter about Texas in which I consider the Latino voter registration and turnout in this state for the five general elections of the 1990s and compare these results with my California findings. Texas has the second largest Latino population in the United States and is home to nearly 20 percent of the nation's Latinos. Like California, its population is predominantly Mexican American (90 percent). Considering both of these states enabled me to gain an understanding of the political behavior of half the nation's Latinos.

Before answering any political questions, it was necessary for me to determine the size of the Latino voting-age population (VAP). Throughout California, in both urban and rural counties, during the previous 10 general elections (from 1980 to 1998), the Latino VAP has consistently and gradually grown larger while, at the same time, the white VAP has declined. This result is best illustrated by considering Los Angeles County. When the Los Angeles County voting-age populations of Latinos and of whites are considered, the proportion of voting-age Latinos was 28 percent in 1980 and increased to 44 percent in 1998, while the percentage of voting-age whites decreased from 53 percent in 1980 to 34 percent in 1998. The Latino VAP has increasingly concentrated itself in three regions of California-Southern California, Central Valley, and Central Coast. Southern California continues to have the largest Latino VAP and the fastest-growing Latino VAP of any region in the state. By 1998, the Latino VAP in this region was 38 percent, an increase of 13 percent
from that measured in 1980 ( 25 percent). In 1998, there were twice as many rural, or agricultural, counties with significant Latino VAPs as there were urban counties with significant Latino VAPs. One of these rural counties (Imperial) had the largest proportion of voting-age Latinos in the state (71 percent in 1998). However, there is a growing and significant presence of Latinos in urban counties, with seven counties having Latino VAPs greater than 20 percent in 1990, which represents an increase of three and one-half times the number in 1980, when there were only two such counties. Los Angeles County has the largest Latino voting-age population of any metropolitan county in California (44 percent).

These findings suggest that during the past two decades, Latinos have gained significant political potential because of their absolute numbers; however, these findings lead one to question whether the size of the Latino population translates to influence in the halls of government and strength at the ballot box. To answer this question, I calculated and analyzed Latino registration and turnout rates. I found that during the 1980s and 1990s, there were significant and permanent increases in Latino registration rates. During 18 years, or 10 election cycles, the California Latino registration rate increased two and one-half times, from only 19 percent in 1980 to 52 percent in 1998. I also found that, during the previous 20 years, Latino registration had become more stable, which suggests that California's Latinos may be more established in their communities and better able to participate in the political process. Both of these changes in
the Latino registration rate suggest that Latinos are becoming a more predictable, reliable, and viable force in California politics.

Although these changes are important and hold promise for a growing Latino electorate, Latino registration rates are still much lower than white registration rates, with 83 percent of the white voting-age population registering in 1998. In addition, Latino registration remains lower than the state average in several of the regions where the Latino VAP is concentrated. These findings suggest that Latinos are still not taking full advantage of their political potential.

When I considered what proportions of the Latinos and whites who are registered to vote actually turned out in the four general elections between 1990 and 1998, I found that Latinos turned out to vote at substantially lower rates than did whites and that their political participation from one election to the next was less predictable. Specifically, I found that, although the statewide Latino turnout rate experienced almost a 50 percent increase from 1990 to 1998 ( 25 percent versus 37 percent), whites were still participating at a rate nearly double that of Latinos (37 percent versus 69 percent in 1998). I also found that Latinos turned out at much higher rates during presidential elections than during midterm elections. The average decline in turnout for Latinos between presidential and midterm elections was 17.5 percent, which was more than twice the comparable average change in white turnout (that is, 8 percent). In addition to low turnout rates, the volatility of these rates suggests that Latinos are an unreliable and unpredictable voting bloc. However, this volatility also suggests that Latinos may
be more susceptible to campaign messages and issues, a fact that should not be overlooked by political office seekers or elected officials. Simply, Latinos are not motivated to go to the polls by a sense of personal duty, political commitment, or patriotic obligation. Rather, they go when the issues are made relevant and the candidates' messages resonate with them.

When I examined the influences on registration and turnout rates in a secondary analysis, I found that the primary determinants of Latino registration rates were age and education level. Older and better-educated Latinos were more likely to register to vote than were other Latinos. This agrees with my hypothesis and previous findings that registration rates should increase with age. Latino registration was independent of region, partisanship, income, and language. These results suggest that it is not the characteristics of the community in which Latinos live (that is, the number of Spanish-speaking households, affluence, or location) but, rather, it is the characteristics of the individuals (that is, education and age) that make up these communities which matter. These findings confirm my hypothesis and agree with previous findings that socioeconomic factors are important in determining registration.

However, I found that partisanship in a county does not significantly influence Latino registration. Also, it is important to note that the number of Spanish-speaking households in a community does not influence registration, which suggests that language and nativity differences may not be as important as previously argued.

Contrary to my hypotheses, I also found that election-specific effects, such as propositions and candidates, and institutional reforms, such as the recent motor voter legislation, are far less important in influencing Latino registration than age and educational attainment.

These results are discouraging for any short-term increases in Latino political power and suggest that political parties can do very little to influence Latino registration rates significantly. Simply, the Latino population must age, and it must on average attain more education. Historically, high school dropout rates in Latino communities have averaged 30 percent, two and one-half times that for blacks and three and one-half times that for whites. Therefore, these findings suggest that it is imperative to encourage higher levels of educational attainment among Latino youths and to decrease their high rates of dropping out of school by improving language and mentoring programs. This approach is particularly important in California because, beginning with the 1996-97 school year, Latino students comprised a majority of the state's public school population.

When I considered the factors that influence Latino turnout, I found that the most important factors affecting Latino turnout are issues, income, and the size of the Spanish-speaking community. Therefore, the characteristics of the community in which Latinos live, such as affluence, the number of Spanishspeaking households, and whether the county is urban or rural, are important. Also, issues are more important in affecting turnout on election day than they are
in encouraging registration. Therefore, although issues may not dramatically increase registration, they should mobilize registered Latinos to vote. This result suggests that the Latino electorate can be mobilized if office seekers speak to their concerns and should be encouraging to politicians. However, the negative influence of living in an urban county is discouraging for Latino turnout and its future political influence because the largest and fastest growing Latino VAP is in Los Angeles, a highly urban county. These results suggest that, in the short term, Latinos are likely to find themselves underrepresented and their influence limited in the halls of California government because elected officials represent the voting electorate.

Because party registration is the single best indicator of a voter's opinions and of which candidates can expect his support on election day, I considered the political party with which California Latinos registered during the five general elections of the 1990s. I found that, as expected because of the ethnic composition of California's Latino population, Latinos are nearly twice as likely to be registered Democratic as Republican. This result confirms earlier survey findings that Mexican Americans and California Latinos are predominately Democratic. However, a significant number of California's Latinos (25 percent) do register Republican. Contrary to my hypotheses and to folk wisdom, in spite of the Republican Party's championing controversial initiatives and its candidates' endorsing issues that do not reflect the Latino agenda, there does not appear to have been an immediate Latino backlash against the Republican

Party, as evidenced by registration rates. However, two ideas that remain to be tested are (1) if the Republican Party's support for these issues has created resentment among young Latinos which will cause them to identify with the Democratic Party and (2) if, instead of changing party registration, Latinos simply voted Democratic.

Also, I found that the Republicans enjoy slightly higher Latino registration rates in midterm elections (1990, 1994, and 1998). This result suggests that Republicans may appeal to and be better able to attract Latinos in off years, when the issues and the candidates are local or, at least, regional.

Latino political party identification appears to be consistent across California's urban and rural counties. The one exception is Orange County, where there is a steady decline in Latino Democratic registration from a high of 57 percent in 1990 to a low of 26 percent in 1998 and a steady increase in Republican registration from 33 percent in 1990 to 48 percent in 1998. This result is surprising, given that this area is conservative and is the home of some of Proposition 187's strongest advocates.

In addition, Latino party identification does not appear to be any more volatile than white party identification. These results bode both well and ill for the major political parties. They suggest that the Democratic Party has a consistent and reliable base of 50 to 60 percent of California registered Latinos. At the same time, Republicans can rely on 25 to 30 percent of registered Latinos. These findings argue against a high conversion rate and suggest instead that,
once registered, Latinos are no more likely to convert than are whites. However, politicians may still be able to exploit the so-called split political personalities of Latinos by viewing them as possible crossover voters.

When I considered the factors that influence Latino political party registration, I found that both the characteristics of the individual voter (that is, age, education, and income) and his living environment (that is, the number of Spanish-speaking households in his county and whether that county is predominantly urban or rural) were important in determining his party registration. However, when the magnitude of these effects is considered, it becomes clear that education and income are the dominant factors in determining Latino political party registration. These results are the same for whites, which suggests that Latino political party registration is similar to that of whites and the larger electorate.

What is interesting to note also is that the implementation of motor voter legislation in 1996 did not encourage Democratic registration, as had been feared by Republicans. Therefore, as shown earlier and confirmed with this result, the implementation of motor voter legislation does not appear to have influenced the rate at which Latinos register or the party with which they identify.

The importance of education and income suggest that the political parties are entrenched; however, these results do offer some alternatives. They also suggest that the major political parties might benefit significantly from encouraging education in the Latino community. In addition, Republicans may
want to seek out ways to attract the younger Latinos. These findings, coupled with the findings regarding Latino registration and turnout rates, suggest that, in close races, politicians would be wise to woo these potential crossover voters. In addition, these findings may explain why Latino political influence in the major political parties continues to be illusive.

To verify that these findings are not unique to California, I calculated the Latino VAP, registration rates, and turnout rates of the Texas Latino population during the five general elections of the 1990s. I found that the Latino VAP is concentrated in the Spanish South region of Texas, where, in 1998, nearly twothirds of the voting-age population was Latino. In addition, the Latino and white VAPs are relatively stable during this period, with the Latino VAP experiencing a gradual increase as the white VAP decreases. These results suggest that Latinos may be experiencing a gradual increase in political potential throughout the Lone Star State but will be most successful at obtaining and retaining political power in the Spanish South region of Texas. Therefore, while the concentration of Latinos in the Spanish South may afford them the ability to gain political power in this region, it may limit their ability to have influence over the politics of the state as a whole or to gain a larger constituency.

When I considered Latino registration in Texas, I found that Latino registration rates are nearly equal to those of whites. Unlike in California, where Latino registration lags behind that of whites, in Texas, Latinos appear to be exercising their right to register to vote. In addition, Latino registration rates are
highest in the Spanish South region of Texas, which suggests that the large number of Latinos in this region intend to actualize their political potential.

Although Texas Latinos register at higher rates than do California Latinos, they do not turn out a higher level and may even turn out at lower levels. The turnout rate for Latinos in California was 37 percent in 1998 compared with only 24 percent for Latinos in Texas. In addition, like California Latinos, Texas Latinos are not a reliable electorate because their degree of political involvement fluctuates considerably between presidential and midterm elections. Low turnout rates among Latinos and the volatility of these rates may explain why Latinos in California and Texas have had little influence on the political agenda even though their numbers are large and increasing. Simply put, their voices are little heard in the halls of government because they do not turn out on election day.

Political scientists must continue the study of Latino political participation so that they can solve the riddle of the continuing discrepancy between large Latino population figures and minimal political influence. Additional states such as New Mexico, which has a more established Latino population, should be studied to see if registration and turnout rates do, in fact, evolve over time to mirror more closely white participation patterns. In addition, the volatility of Latino registration and turnout rates needs to be studied to determine what demographic and election factors cause these observed changes. At the same time, researchers need to search out alternative data sets, and more Latino surveys need to be conducted, so that these and other findings can be tested
further, and the issues and factors that influence Latino participation can be more clearly identified and better understood. Specifically, researchers need to consider the possibility that Latinos are crossover voters and to determine how this voting pattern influences elections. In addition, researchers should undertake a comprehensive longitudinal study of other minorities, such as Asians and blacks, to facilitate comparison of the registration and turnout patterns that characterize these groups with those I found among Latinos.

These findings suggest that there may not be any short-term or quick fixes to Latino participation. Registration blitzes conducted among Latinos by political organizations may have no effect on Latino turnout because simply adding Latino names to voter roles does not guarantee an increased Latino turnout at the polls. ${ }^{60}$ In addition, Latino elected officials may not achieve the same level of influence as their white counterparts because of the vacillation of their Latino constituencies. ${ }^{61}$ These findings also suggest that Latinos should be encouraged

[^40]to participate more fully in the political process and that additional education may be one means of achieving this goal. Candidates should speak more directly to the issues that concern Latinos. Political parties should view Latinos as crossover voters rather than as potential converts. In other words, if Latinos were "a sleeping giant," they may now be a still-drowsy leviathan waiting to be wooed by either party's persuasive messages and relevant issues. Or one could conclude that this creature is, in some ways, more genie than giant. While he has not yet gathered strength to make political wishes come true, it is clear that he will not be stuffed back in the bottle and that the future rests in his hands.

## References

Abramson, P. R., John H. Aldrich, and D.W. Rhode. 1990. Change and Continuity in the 1988 Elections. Washington, D.C.: Congressional Quarterly Press.

Achen, Christopher H., and W. Phillips Shively. 1995. Cross-Level Inference. Chicago: University of Chicago Press.

Alvarez, R. Michael, and Tara L. Butterfield. 1999. "Latino Citizenship and Participation in California Politics: A Los Angeles County Case Study." Pacific Historical Review, pp. 293-308.

Arvizu, John R., and F. Chris Garcia. 1996. "Latino Voting Participation: Explaining and Differentiating Latino Voting Turnout." Hispanic Journal of Behavioral Sciences, 18: 104-28.

Bennett, Stephen Earl, and David Resnick. 1990. "The Implications of Nonvoting for Democracy in the United States." American Journal of Political Science, 34(3): 771-802.

Berelson, Bernard, Paul F. Lazarsfeld, and William McPhee. 1954. Voting: A Study of Opinion Formation in a Presidential Election. Chicago: University of Chicago Press.

Bulmer, Martin. 1984. The Chicago School of Sociology: Institutionalization, Diversity, and the Rise of Sociological Research. Chicago: University of Chicago Press.

Cain, Bruce E., and D. Roderick Kiewiet. 1984. "Ethnicity and Electoral Choice: Mexican American Voting Behavior in the $30^{\text {th }}$ Congressional District." Social Science Quarterly, 65 (2): 315-27.

Cain, Bruce E., D. Roderick Kiewiet, and Carole J. Uhlaner. 1991. "The Acquisition of Partisanship by Latinos and Asian Americans." American Journal of Political Science, 35: 390-422.

Calvo, Maria A., and Steven J. Rosenstone. 1989. Hispanic Political Participation. Latino Electorates Series. San Antonio: Southwest Voter Research Institute.

Campbell, Angus, Philip E. Converse, Warren E. Miller, and Donald E. Stokes. 1960. The American Voter. New York: Wiley.

Caplan, Barbara. 1987. "Linking Cultural Characteristics to Political Opinion." In Ignored Voices: Public Opinion Polls and the Latino Community, edited by Rodolfo O. de la Garza. Austin: Center for Mexican American Studies, University of Texas.

Cassel, Carol A. 1993. "A Test of Converse's Theory of Party Support." Journal of Politics, 55 (5): 664-81.

Claggett, William, and John Van Wingen. 1993. "An Application of Linear Programming to Ecological Inference: An Extension of an Old Procedure." American Journal of Political Science, 37: 633-61.
de la Garza, Rodolfo O. 1996. "El Cuento de los Números and Other Latino Political Myths." In Latino Politics in California, edited by Anibal Yanez-Chavez. San Diego: Center for U.S.-Mexican Studies, University of California.
de la Garza, Rodolfo O., Angelo Falcon, and F. Chris Garcia. 1996. "Will the Real Americans Please Stand Up: Anglo and Mexican American Support of Core American Political Values." American Journal of Political Science, 40: 33551.
de la Garza, Rodolfo O., and Louis DeSipio. 1993. "Save the Baby, Change the Bathwater, and Clean the Tub: Latino Electoral Participation after Seventeen Years of the Voting Rights Act Coverage." University of Texas Law Review (June).
de la Garza, Rodolfo O., Louis DeSipio, Angelo Falcon, F. Chris Garcia, and John Garcia. 1992. Latino Voices: Mexican, Puerto Rican, and Cuban Perspectives on American Politics. Boulder: Westview Press.

De Nardo, James. 1980. "Turnout and the Vote: The Joke's on the Democrats." American Political Science Review, 74: 406-20.

DeSipio, Louis. 1996. Counting on the Latino Vote: Latinos as a New Electorate. Charlottesville: University Press of Virginia.

De Tocqueville, Alexis. 1969. Democracy in America. Translated by George Lawrence, edited by J. P. Mayer. New York: Anchor Books.

Downs, Anthony. 1957. An Economic Theory of Democracy. New York, Harper.
Duncan, Otis Dudley, and Beverly Davis. 1953. "An Alternative to Ecological Correlation." American Sociological Review, 18: 665-66.

Dykstra, Robert R. 1986. "Ecological Regression Estimates: Alchemist's Gold?" Social Science History, 10: 85-90.

Estrada, L. F., F. Chris Garcia, R. F. Macias, and L. Maldonado. 1988. "Chicanos in the United States: A History of Exploitation and Resistance." In Latinos and the Political System, edited by F. Chris Garcia. Notre Dame: University of Notre Dame Press.

Fiorina, Morris P. 1981. Restrospective Voting in American National Elections. New Haven: Yale University Press.

Flanigan, William H., and Nancy Zingale. 1985. "Alchemist's Gold: Inferring Individual Relationships from Aggregate Data." Social Science History, 9: 71-92.

Garcia, F. Chris. 1996. "Conventional Politics Under Unusual Circumstances: Latinos and the 1992 Election in New Mexico." In Ethnic Ironies: Latino Politics in the 1992 Elections, edited by Rodolfo O. de la Garza and Louis DeSipio. Boulder: Westview Press.
(editor). 1997. Pursuing Power: Latinos and the Political System. Notre Dame: University of Notre Dame Press.

Goodman, Leo. 1953a. "Ecological Regressions and the Behavior of Individuals." American Sociological Review, 18: 663-66.

Goodman, Leo. 1953b. "A Further Note on Miller's 'Finite Markov Processes in Psychology'." Psychometrika, 18: 245-48.

Gow, David John. 1985. "Quantification and Statistics in the Early Years of American Political Science, 1880-1922." Political Methodology, 11: 1-18.

Greene, William H. 1993. Econometric Analysis. $2^{\text {nd }}$ ed. New York: Macmillan.
Griffiths, William E., R. Carter Hill, and George G. Judge. 1993. Learning and Practicing Econometrics. New York: Wiley.

Grofman, Bernard, Michael Migalski, and Nicholas Noviello. 1985. "The 'Totality of Circumstances' Test in Section 2 of the 1982 Extension of the Voting Rights Act: A Social Science Perspective." Law and Policy, 7: 209-23.

Hardy-Fanta, Carol. 1997. "Latina Women and Politics in Boston: Somos La Vida, La Fuerza, La Mujer." In Pursuing Power: Latinos and the Political

System, edited by F. Chris Garcia. Notre Dame: University of Notre Dame Press.

Hero, Rodney E. 1992. Latinos and the U.S. Political System: Two-Tiered Pluralism. Philadelphia: Temple University Press.

Jackson, John E. 1975. "Issues, Party Choices, and Presidential Votes." American Journal of Political Science, 19 (May): 161-86.

Jennings, M. Kent, and Richard G. Niemi. 1968. "The Transmission of Political Values from Parent to Child." American Political Science Review, 62: 169-84.

Kamieniecki, Sheldon. 1985. "Social Background and Party Identification." In Party Identification, Political Behavior, and the American Electorate. Westport, Connecticut: Greenwood Press.

King, Gary. 1997. A Solution to the Ecological Inference Problem. Cambridge: Harvard University Press.

King Gary, Robert O. Keohane, and Sidney Verba. 1994. Designing Social Inquiry: Scientific Inference in Qualitative Research. Princeton, New Jersey.

Knoke, David. 1976. Change and Continuity in American Politics: The Social Base of Political Parties. Baltimore: Johns Hopkins University Press.

Kosmin, Barry A., and Ariela Keysar. 1995. "Research Note: Party Political Preference of U.S. Hispanics: The Varying Impact of Religion, Social Class, and Demographic Factors. Ethnic and Racial Studies, 18 (April): 336-47.

Kousser, J. Morgan. 1986. "Speculation or Specification? A Note on Flanigan and Zingale." Social Science History, 10: 71-84.

[^41]McCarthy, Kevin F., and R. Burciaga Valdez. 1986. Current and Future Effects of Mexican Immigration in California. Santa Monica, California: Rand Corporation.

Miller, Warren E. 1991. "Party Identification, Realignment, and Party Voting: Back to the Basics." Political Science Review, 85: 557-68.

Miller, Warren E., and J. Merrill Shanks. 1996. The New American Voter. Cambridge: Harvard University Press.

Morales, R., and F. Bonilla (editors). 1993. Latinos in a Changing U.S. Economy. Sage Series on Race and Ethnic Relations, vol. 7. Newbury Park: Sage.

Moore, Joan, and Harry Pachon. 1985. Hispanics in the United States. Englewood Cliffs: Prentice-Hall.

Nelson, C., and M. Tienda. 1985. "The Structuring of Hispanic ethnicity: Historical and contemporary perspectives." Ethnic and Racial Studies, 8: 49-74.

Nie, Norman H., G. Bingham Powell, and Kenneth Prewitt. 1969. "Social Structure and Political Participation." American Political Science Review, 62: 361-78.

Nie, Norman H., Sidney Verba, and John R. Petrocik. 1979. The Changing American Voter. Cambridge: Harvard University Press.

Page, Benjamin I., and Calvin Jones. 1979. "Reciprocal Effects of Policy Preferences, Party Loyalties and the Vote. " American Political Science Review, 73 (December): 1071-89.

Palfrey, Thomas, and Howard Rosenthal. 1985. "Voter Participation and Strategic Uncertainty." American Political Science Review, 79: 62-78.

Pardo, Mary. 1997. "Mexican American Women Grassroots Community Activists: 'Mothers of East Los Angeles.'" In Pursuing Power: Latinos and the Political System, edited by F. Chris Garcia. Notre Dame: University of Notre Dame Press.

Petrocik, John R. 1987. "Voter Turnout and Electoral Preferences: The Anomalous Reagan Elections." In Elections in America, edited by Kay Lehman Schlozman. New York: Allen and Unwin.

Popkin, Samuel, John W. Gorman, Charles Phillips, and Jeffrey A. Smith. 1976. "Comment: What Have You Done for Me Lately? Toward an Investment Theory of Voting." American Political Science Review, 70 (September): 779-805.

Prais, S. J., and J. Aitchison. 1954. "The Grouping of Observations in Regression Analysis." Review of the International Institute of Statistics, 22: 122.

Riker, William H., and Peter C. Ordeshook. 1968. "A Theory of the Calculus of Voting." American Political Science Review, 62: 25-42.

Robinson, William S. 1950. "Ecological Correlation and the Behavior of Individuals." American Sociological Review, 15: 351-57.

Schattschneider, E. E. 1960. The Semi-Sovereign People. New York: Holt, Rinehart and Winston.

Shaffer, Stephen D. 1982. "Policy Differences between Voters and Non-voters in American Elections." Western Political Quarterly, 35: 496-510.

Shively, W. Phillips. 1974. "Utilizing External Evidence in Cross-Level Inference." Political Methodology, 1: 61-73.
Cner Special Application to Studies of Electoral Transition." Historical Methods, 24: 81-94.

Sigelman, Lee. 1991. "Turning Cross Sections into a Panel: A Simple Procedure for Ecological Inference." Social Science Research, 20: 150-70.

Skerry, Peter. 1993. Mexican Americans: The Ambivalent Minority. Cambridge: Harvard University Press.
. 1997. "E Pluribus Hispanic?" In Pursuing Power: Latinos and the Political System, edited by F. Chris Garcia. Notre Dame: University of Notre Dame Press.

Stanley, Harold D., and Richard G. Niemi. 1995. Vital Statistics on American Politics. $5^{\text {th }}$ ed. Washington, D.C.: CQ Press.

State of California, Department of Finance. 1997a. Race/Ethnic Population Estimates: Components of Change by Race, 1990-1995. Sacramento, March.

State of California, Department of Finance. 1997b. County Population Estimates and Components of Change, 1995-1996, with Historical Estimates, 1990-1995. Sacramento, April.

Tam, Wendy. 1997. "Iff the Assumption Fit . . . ." Unpublished manuscript. Urbana-Champaign: University of Illinois.

Teixeira, Ruy A. 1992. The Disappearing American Voter. Washington, D.C.: Brookings Institution.

Tussman, Joseph. 1960. Obligation and the Body Politic. New York: Oxford University Press.

Uhlaner, Carole J. 1996. "Latinos and Ethnic Politics in California: Participation and Preference." In Latino Politics in California, edited by Anibal Yanez-Chavez. San Diego: Center for U.S.-Mexican Studies, University of California.

Uhlaner, Carole J., and F. Chris Garcia. 1998. "Foundations of Latino Party Identification: Learning, Ethnicity and Demographic Factors Among Mexicans, Puerto Ricans, Cubans and Anglos in the United States," Center for the Study of Democracy, UC Irvine Research Papers.

Uhlaner, Carole J., Bruce E. Cain, and D. Roderick Kiewiet. 1989. "Political Participation of Ethnic Minorities in the 1980's." Political Behavior, 11: 195-231.

Verba, Sidney, and Norman H. Nie. 1972. Participation in America. New York: Harper and Row.

Verba, Sidney, Kay Lehman Schlozman, and Henry E. Brady, 1995. Voice and Equality: Civic Voluntarism in American Politics. Cambridge: Harvard University Press.

Welch, Susan, and Sigelman, Lee. 1993. "The Politics of Hispanic Americans: Insights from National Surveys, 1980-1988." Social Science Quarterly. 74: 7694.

Wolfinger, Raymond E., and Steven J. Rosenstone. 1980. Who Votes? New Haven: Yale University Press.

## Appendix

## Applying the Method of Generalized Bounds to a Data Set: Registration Rates for Latinos in California During 1990

To clarify for the reader how the method of generalized bounds works and what the researcher considers before, during, and after applying this method of ecological inference (ei), I provide the following example. ${ }^{62}$

As with any empirical analysis, the researcher must first decide what the goal of the research is. I wanted to estimate the Latino registration rates for each county in the 10 general elections between 1980 and 1998 to understand Latino political participation. Therefore, I wanted to use the method of generalized bounds to calculate point estimates of Latino registration for each county, but I also wanted to analyze these estimates in secondary analyses to determine what influences Latino registration. Then, to better illustrate and understand my calculations, I constructed the following table.

[^42]
## Registration Decision

| Race | Vote | No Vote | VAP |
| :--- | :--- | :--- | :--- |
| Latinos | $\beta_{i}^{b} \mathrm{X}_{i}$ | $\left(1-\beta_{i}^{b}\right) \mathrm{X}_{i}$ | $\mathrm{X}_{i}$ |
| Non-Latinos | $\beta_{i}^{w}\left(1-\mathrm{X}_{i}\right)$ | $1-\beta_{i}^{w}\left(1-\mathrm{X}_{i}\right)$ | $1-\mathrm{X}_{i}$ |
| Voter Registration | $\mathrm{T}_{i}$ | $1-\mathrm{T}_{i}$ | 1 |

where
$T_{i}$ is the proportion of the voting-age population (VAP) turning out to vote $\left(N_{i}^{\top} / N_{i}\right)$ in precinct $i$,
$\mathrm{X}_{i}$ is the proportion of the voting-age population (VAP) who are Latino $\left(\mathrm{N}_{i} / \mathrm{N}_{i}\right)$ in precinct $i$,
$\left(1-X_{i}\right)$ is the proportion of the voting-age population (VAP) who are non-Latino $\left(\mathrm{N}_{i}{ }^{\mathrm{w}} / \mathrm{N}_{i}\right)$ in precinct $i$,
$\mathrm{N}_{i}$ is the number of people of voting age in precinct $i$,
$\beta_{i}^{b}$ is the proportion of voting-age Latinos who vote $\left(N_{i}^{b T} / N_{i}^{b}\right)$, and
$\beta_{i}{ }^{w}$ is the proportion of voting-age non-Latinos who vote $\left(N_{i}{ }^{w T} / N_{i}{ }^{w}\right)$.

Constructing a table clarifies what quantities need to be estimated. In this case, this table clearly demonstrates that I need to perform two ei calculations for each county: first, I need to calculate the proportion of the Latino VAP who register, and second, I need to calculate the proportion of the white VAP who register.

After determining my goals, I needed to find relevant data for my problem. For Latino registration in 1990, I needed the equivalent of $\mathrm{T}_{i}$, the voter registration rate for each county, and $X_{i}$, the proportion of the voting-age population who are Latino. The voter registration rate was available from the California Secretary of State's office in the "Statement of the Vote." I had to calculate the proportion of the voting-age population who are Latino in each county. To do so, I used California Department of Finance and U.S. Census data. The exact calculations are detailed in Chapter 3.

In addition, because I wanted to do a secondary analysis of the Latino registration rates, I familiarized myself with the existing Latino political participation literature to understand what socioeconomic and cultural factors might be causing or contributing to these observed differences in participation. I also took note of the observed the rates of participation that other researchers had found and used these rates as points of comparison for the rates that I calculated using the method of generalized bounds.

The existing literature suggested that such socioeconomic factors as education, age, income, and place of residence were important (Arvizu and Garcia, 1996; Calvo and Rosenstone, 1984; De la Garza and DeSipio, 1996; Garcia, 1996; Rosenstone and Wolfinger, 1980; Uhlaner et al., 1989; Verba et al., 1995). In addition, language was suggested as an important cultural factor that might deter political assimilation (Calvo and Rosenstone, 1984). Therefore, because I wanted to do a secondary analysis on the Latino registration rates to
determine the reasons for the lower rates, I collected additional county-level socioeconomic data regarding the language spoken in the home, age, educational attainment, place of residence (urban versus rural), and county median income figures from the 1990 U.S. Census, the California Department of Finance, and the Current Population Surveys conducted during the 1990s.

Next, when I considered previous findings regarding the actual rates of Latino registration, I found that Latino registration rates were 10 to 30 percent less than those of whites (Calvo and Rosenstone, 1984; Garcia, 1996), with Latino registration rates between 60 and 75 percent, and white registration rates between 79 and 91 percent (De la Garza and DeSipio, 1996; Garcia, 1996; Uhlaner, 1996). Now, with these data and knowledge, I had something on which to base my assumptions and against which to test my ecological analysis.

First, I began the data analysis with a scattercross plot of the known aggregate data, $X_{i}$ (the proportion of the voting-age population who are Latino in county i) and $T_{i}$ (the proportion of voting-age population that registered in county i) (see Figure A1). This graph is particularly important because it provides the researcher with a sense of how much information exists in the deterministic bounds, $\max \left(0,\left(T_{i}-\left(1-X_{i}\right)\right) / X_{i}\right) \leq \beta_{i}^{b} \leq \min \left(T_{i} / X_{i}, 1\right) \max \left(0,\left(T_{i}-X_{i}\right) /\left(1-X_{i}\right)\right) \leq$ $\beta_{i}^{w} \leq \min \left(T_{i} /\left(1-X_{i}\right), 1\right)$ (for a discussion and derivation of these bounds, see Chapter 2), about the quantities of interest, in this case, the proportion of the Latino VAP who register to vote in county i. Because the majority of points fall in the left triangle and the quantity of interest is $\beta_{i}^{b}$, this scattercross plot reveals


Figure A1. California Latino Registration 1990, Scattercross Plot
that, unfortunately, the majority of the counties have the deterministic bounds of [0,1] (see King, 1997, Chapter 5 for a discussion of how to interpret the scattercross plot). Or put another way, no additional information is gained from calculating the bounds.

Next, to verify and better understand this result, I calculate and plot the upper and lower bounds for each county (see Figure A2). This figure clearly shows this same result. Forty-eight of the fifty-eight counties have deterministic bounds of $[0,1]$, meaning that knowing the registration rate and the Latino VAP proportion did not provide any additional information regarding the proportion of the Latino VAP who registers in these counties.

Before proceeding with the ecological inference, it is important to verify that the second assumption of the method of generalized bounds-that $\beta_{i}^{w}$ and $\beta_{i}^{b}$ are mean independent of $X_{i}$ which is equivalent to assuming that there is no aggregation bias-is an appropriate assumption. This assumption means that the Latino registration rate in each county is independent of the size of the Latino VAP in that county. Put differently, there is little correlation between the proportion of Latino registered voters in a county and the proportion of the Latino voting-age population in a county. Does this assumption make sense given this application? This assumption is reasonable as long as it is not the size of the Latino population that is motivating its political participation but rather the characteristics of this population and the county in which it lives, which is what I would expect. Put another way, increasing the number of Latinos in a county

Figure A2. California Latino Registration 1990,
Plot of Deterministic Bounds

from, say, 10,000 to 15,000 should not increase participation because it is the characteristics of the individuals who make up this population which matter. The literature on Latino registration suggests that it is personal characteristics rather than the sheer size of the Latino population which is important in determining the registration rate of Latinos. In addition, researchers have not found a relationship between Latino population size and white participation (for example, see Hero, 1992) as has been found between whites and blacks. Therefore, given my knowledge of the problem, this assumption appears reasonable.

To test for aggregation bias, it is necessary to plot the $X_{i}$ and $T_{i}$ points and then to add Goodman's regression line to the plot. If $X_{i}$ and $T_{i}$ are correlated, then Goodman's regression will usually produce estimates outside the $[0,1]$ interval and, therefore, the line will not cross the left and right vertical axes within the $[0,1]$ interval. In this case (see Figure A3), Goodman's regression line does cross both vertical axes clearly within the $[0,1]$ interval, which further supports my argument that there is not a significant amount of aggregation bias in the data.

Next, I consider another very useful summary of the aggregate data, the tomography plot (see Figure A4). The tomography plot reexpresses the information shown in Figures A1 and A2 in terms of the quantities of interest, in this case, the proportion of the Latino VAP who register, $\beta_{i}^{b}$, and the proportion of the non-Latino VAP who register, $\beta_{i}{ }^{w}$. Each line represents a county given its $X_{i}$ and $T_{i}$ values and shows all of the possible values of $\beta_{i}^{b}$ and $\beta_{i}^{w}$ for that county.


Figure A3. California Latino Registration 1990, Scatter Plot with Goodman's Regression


Figure A4. California Latino Registration 1990, Tomography Plot

The fact that $\beta_{i}^{w}=\left(T_{i} /\left(1-X_{i}\right)\right)-\left(X_{i} /\left(1-X_{i}\right)\right) \beta_{i}^{b}$ implies that all of the lines in Figure A4 are negatively sloped, meaning that as one of the quantities of interest falls near the upper end of its bounds the other must fall near the lower end of its bounds.

Now, this tomography plot of the data can be used to verify that Assumption 1 of the model $-\beta_{i}^{w}$ and $\beta_{i}^{b}$ are generated by a truncated bivariate normal distribution, conditional on $X_{i}$ with truncation limits $\beta_{i}^{w} \in[0,1]$ and $\beta_{i}^{b} \in$ $[0,1]$-is appropriate and to further test the existence of aggregation bias in the data. First, it is relatively, clear that there is only one mode in the data and that most of lines are emanating from one place in the graph. Second, the tomography plot does not give any clear evidence of aggregation bias. For example, the lines are not clustered at the upper and lower corners of the graph which would suggest a correlation between $X_{i}$ and $\beta_{i}^{w}$ and $\beta_{i}^{b}$ in which larger values of $X_{i}$ would imply larger $\beta$ values and smaller values of $X_{i}$ would imply smaller $\beta$ values (see King, 1997, Chapter 9, Figure 9.3, p. 176).

Next, to further test for aggregation bias in the data, I plotted the deterministic bounds represented by a vertical line against the true $\beta_{i}^{b}$ values and $X_{i}$ (see Figure A5). In this particular case, I do not know the true $\beta_{i}^{b}$ values. Even without these values, I can study the graph for aggregation bias. Because the deterministic bounds for most of the counties are $[0,1]$, there is no discernible relationship between $X_{i}$ and the $\beta_{i}^{b}$ values (see King, 1997, Chapter 13, Figure 13.2, p. 238).


Figure A5. California Latino Registration 1990, Plot of Deterministic Bounds by $\mathrm{X}_{i}$

Therefore, given this study of the data and no findings of clear aggregation bias, I ran the basic ei model (as discussed in Chapter 2) to produce the $\beta_{i}^{b}$ estimates. Now, to verify the fit of the model to my data set, I can plot the contours of the truncated normal on the tomography plot and verify that the placement of the contours is appropriate (see Figure A6). The data appear to have one mode, and it is substantively reasonable. There are not a significant number of outliers in the data. The estimates of Latino registration of between 50 and 60 percent agree with previous findings and are within the deterministic bounds calculated for each county (see Figure A7); therefore, the results appear to be reasonable.


Figure A6. California Latino Registration 1990, Tomography Plot with Contours
Figure A7. California Latino Registration 1990,
Plot of Deterministic Bounds with ei estimates


|  | Latinos |  |  |  |  |  | Whites |  |  |  |  |  |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| County | 1980 | 1982 | 1984 | 1986 | 1988 |  | 1980 | 1982 | 1984 | 1986 | 1988 |  |
| ALAMEDA | 0.0864 | 0.0917 | 0.0944 | 0.0972 | 0.0999 |  | 0.6174 | 0.5982 | 0.5802 | 0.5633 | 0.5472 |  |
| ALPINE | 0.0390 | 0.0447 | 0.0504 | 0.0560 | 0.0616 |  | 0.8199 | 0.7937 | 0.7676 | 0.7418 | 0.7160 |  |
| AMADOR | 0.0491 | 0.0590 | 0.0671 | 0.0739 | 0.0796 |  | 0.9212 | 0.8977 | 0.8784 | 0.8623 | 0.8487 |  |
| BUTTE | 0.0531 | 0.0583 | 0.0631 | 0.0675 | 0.0714 |  | 0.9106 | 0.9006 | 0.8915 | 0.8833 | 0.8757 |  |
| CALAVERAS | 0.0444 | 0.0470 | 0.0491 | 0.0509 | 0.0524 |  | 0.9334 | 0.9285 | 0.9245 | 0.9211 | 0.9182 |  |
| COLUSA | 0.1993 | 0.2322 | 0.2620 | 0.2889 | 0.3135 |  | 0.7598 | 0.7262 | 0.6960 | 0.6686 | 0.6436 |  |
| CONTRA COSTA | 0.0859 | 0.0925 | 0.0986 | 0.1042 | 0.1094 |  | 0.7715 | 0.7540 | 0.7380 | 0.7233 | 0.7096 |  |
| DEL NORTE | 0.0568 | 0.0634 | 0.0695 | 0.0752 | 0.0804 |  | 0.8654 | 0.8565 | 0.8483 | 0.8407 | 0.8337 |  |
| EL DORADO | 0.0471 | 0.0533 | 0.0584 | 0.0629 | 0.0667 |  | 0.9300 | 0.9212 | 0.9138 | 0.9075 | 0.9020 |  |
| FRESNO | 0.2950 | 0.3098 | 0.3231 | 0.3351 | 0.3459 |  | 0.6192 | 0.5919 | 0.5676 | 0.5456 | 0.5258 |  |
| GLENN | 0.1209 | 0.1391 | 0.1562 | 0.1722 | 0.1874 |  | 0.8522 | 0.8277 | 0.8047 | 0.7830 | 0.7625 |  |
| HUMBOLDT | 0.0346 | 0.0362 | 0.0378 | 0.0392 | 0.0407 |  | 0.8998 | 0.8953 | 0.8910 | 0.8868 | 0.8828 |  |
| IMPERIAL | 0.5608 | 0.5835 | 0.6047 | 0.6245 | 0.6429 |  | 0.3869 | 0.3647 | 0.3441 | 0.3248 | 0.3067 |  |
| INYO | 0.0612 | 0.0659 | 0.0707 | 0.0753 | 0.0800 |  | 0.8495 | 0.8416 | 0.8338 | 0.8260 | 0.8183 |  |
| KERN | 0.2180 | 0.2339 | 0.2478 | 0.2601 | 0.2710 |  | 0.7003 | 0.6821 | 0.6662 | 0.6520 | 0.6395 |  |
| KINGS | 0.2714 | 0.2899 | 0.3066 | 0.3198 | 0.3311 |  | 0.6549 | 0.6183 | 0.5765 | 0.5662 | 0.5205 |  |
| LAKE | 0.0524 | 0.0575 | 0.0598 | 0.0657 | 0.0691 |  | 0.9112 | 0.9035 | 0.9000 | 0.8909 | 0.8858 |  |
| LASSEN | 0.0657 | 0.0751 | 0.0835 | 0.0912 | 0.0982 |  | 0.8670 | 0.8495 | 0.8337 | 0.8194 | 0.8064 |  |
| LOS ANGELES | 0.2793 | 0.3024 | 0.3238 | 0.3439 | 0.3627 |  | 0.5336 | 0.5050 | 0.4782 | 0.4533 | 0.4299 |  |
| MADERA | 0.2707 | 0.2902 | 0.2990 | 0.3219 | 0.3349 |  | 0.6706 | 0.6529 | 0.6450 | 0.6243 | 0.6125 |  |
| MARIN | 0.0424 | 0.0499 | 0.0574 | 0.0647 | 0.0720 |  | 0.9033 | 0.8913 | 0.8795 | 0.8679 | 0.8564 |  |
| MARIPOSA | 0.0455 | 0.0463 | 0.0470 | 0.0477 | 0.0483 |  | 0.9122 | 0.9075 | 0.9034 | 0.8996 | 0.8962 |  |
| MENDOCINO | 0.0567 | 0.0675 | 0.0776 | 0.0869 | 0.0956 |  | 0.8967 | 0.8843 | 0.8729 | 0.8624 | 0.8525 |  |
|  |  |  |  |  |  |  |  |  |  |  |  |  |


|  | Latinos |  |  |  |  |  | Whites |  |  |  |  |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| County | 1980 | 1982 | 1984 | 1986 | 1988 |  | 1980 | 1982 | 1984 | 1986 | 1988 |
| MERCED | 0.2555 | 0.2733 | 0.2890 | 0.3031 | 0.3157 |  | 0.6650 | 0.6345 | 0.6075 | 0.5834 | 0.5618 |
| MODOC | 0.0422 | 0.0490 | 0.0555 | 0.0616 | 0.0675 |  | 0.9133 | 0.9052 | 0.8974 | 0.8899 | 0.8828 |
| MONO | 0.0489 | 0.0636 | 0.0774 | 0.0903 | 0.1026 |  | 0.9054 | 0.8898 | 0.8752 | 0.8614 | 0.8484 |
| MONTEREY | 0.2610 | 0.2790 | 0.2955 | 0.3107 | 0.3248 |  | 0.6046 | 0.5858 | 0.5685 | 0.5526 | 0.5379 |
| NAPA | 0.0886 | 0.1010 | 0.1128 | 0.1240 | 0.1348 |  | 0.8744 | 0.8597 | 0.8457 | 0.8323 | 0.8195 |
| NEVADA | 0.0301 | 0.0333 | 0.0360 | 0.0382 | 0.0402 |  | 0.9544 | 0.9501 | 0.9465 | 0.9435 | 0.9409 |
| ORANGE | 0.1508 | 0.1711 | 0.1805 | 0.2063 | 0.2218 |  | 0.7841 | 0.7506 | 0.7350 | 0.6923 | 0.6667 |
| PLACER | 0.0704 | 0.0731 | 0.0754 | 0.0773 | 0.0790 |  | 0.9021 | 0.8970 | 0.8928 | 0.8892 | 0.8861 |
| PLUMAS | 0.0369 | 0.0390 | 0.0409 | 0.0427 | 0.0445 |  | 0.9243 | 0.9216 | 0.9190 | 0.9166 | 0.9142 |
| RIVERSIDE | 0.1909 | 0.2131 | 0.2301 | 0.2437 | 0.2547 |  | 0.7402 | 0.7111 | 0.6888 | 0.6711 | 0.6566 |
| SACRAMENTO | 0.0954 | 0.1008 | 0.1056 | 0.1099 | 0.1137 |  | 0.7699 | 0.7509 | 0.7341 | 0.7191 | 0.7057 |
| SAN BENITO | 0.4571 | 0.4573 | 0.4575 | 0.4576 | 0.4577 |  | 0.5163 | 0.5157 | 0.5152 | 0.5148 | 0.5144 |
| SAN BERNARDINO | 0.1885 | 0.2110 | 0.2293 | 0.2445 | 0.2573 |  | 0.7315 | 0.6966 | 0.6682 | 0.6447 | 0.6249 |
| SAN DIEGO | 0.1500 | 0.1641 | 0.1764 | 0.1874 | 0.1972 |  | 0.7422 | 0.7199 | 0.7002 | 0.6828 | 0.6672 |
| SAN FRANCISCO | 0.1703 | 0.1267 | 0.1300 | 0.1332 | 0.1364 |  | 0.5350 | 0.5205 | 0.5064 | 0.4926 | 0.4792 |
| SAN JOAQUIN | 0.1931 | 0.2039 | 0.2133 | 0.2215 | 0.2287 |  | 0.6893 | 0.6634 | 0.6409 | 0.6211 | 0.6037 |
| SAN LUIS OBISPO | 0.0962 | 0.1059 | 0.1143 | 0.1216 | 0.1281 |  | 0.8578 | 0.8459 | 0.8357 | 0.8268 | 0.8190 |
| SAN MATEO | 0.1263 | 0.1374 | 0.1481 | 0.1583 | 0.1682 |  | 0.7178 | 0.6929 | 0.6689 | 0.6459 | 0.6238 |
| SANTA BARBARA | 0.1877 | 0.2064 | 0.2236 | 0.2393 | 0.2538 |  | 0.7529 | 0.7312 | 0.7113 | 0.6931 | 0.6763 |
| SANTA CLARA | 0.1760 | 0.1838 | 0.1911 | 0.1981 | 0.2046 |  | 0.7091 | 0.6801 | 0.6527 | 0.6270 | 0.6026 |
| SANTA CRUZ | 0.1483 | 0.1615 | 0.1735 | 0.1846 | 0.1949 |  | 0.8112 | 0.7960 | 0.7820 | 0.7691 | 0.7572 |
| SHASTA | 0.0302 | 0.0322 | 0.0340 | 0.0357 | 0.0372 |  | 0.9370 | 0.9308 | 0.9253 | 0.9202 | 0.9156 |
| SIERRA | 0.0636 | 0.0618 | 0.0601 | 0.0584 | 0.0568 |  | 0.9200 | 0.9206 | 0.9211 | 0.9216 | 0.9221 |
| SISKIYOU | 0.0479 | 0.0502 | 0.0525 | 0.0547 | 0.0568 |  | 0.8963 | 0.8925 | 0.8888 | 0.8853 | 0.8819 |
| SOLANO | 0.1063 | 0.1137 | 0.1200 | 0.1254 | 0.1301 |  | 0.7021 | 0.6776 | 0.6568 | 0.6389 | 0.6233 |


|  | Latinos |  |  |  |  |  | Whites |  |  |  |  |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| County | 1980 | 1982 | 1984 | 1986 | 1988 |  | 1980 | 1982 | 1984 | 1986 | 1988 |
| SONOMA | 0.0707 | 0.0795 | 0.0874 | 0.0946 | 0.1010 |  | 0.8917 | 0.8800 | 0.8694 | 0.8599 | 0.8513 |
| STANISLAUS | 0.1524 | 0.1697 | 0.1847 | 0.1978 | 0.2093 |  | 0.8068 | 0.7806 | 0.7579 | 0.7380 | 0.7205 |
| SUTTER | 0.1182 | 0.1293 | 0.1395 | 0.1488 | 0.1574 |  | 0.7905 | 0.7731 | 0.7572 | 0.7426 | 0.7291 |
| TEHAMA | 0.0562 | 0.0678 | 0.0783 | 0.0877 | 0.0963 |  | 0.9228 | 0.9094 | 0.8972 | 0.8862 | 0.8762 |
| TRINITY | 0.0271 | 0.0284 | 0.0296 | 0.0308 | 0.0320 |  | 0.9301 | 0.9256 | 0.9214 | 0.9172 | 0.9133 |
| TULARE | 0.3011 | 0.3223 | 0.3415 | 0.3589 | 0.3748 |  | 0.6548 | 0.6286 | 0.6050 | 0.5836 | 0.5640 |
| TUOLUMNE | 0.0528 | 0.0591 | 0.0645 | 0.0692 | 0.0733 |  | 0.9141 | 0.9015 | 0.8907 | 0.8814 | 0.8732 |
| VENTURA | 0.2155 | 0.2275 | 0.2383 | 0.2482 | 0.2572 |  | 0.7271 | 0.7106 | 0.6957 | 0.6821 | 0.6698 |
| YOLO | 0.1718 | 0.1787 | 0.1849 | 0.1906 | 0.1959 |  | 0.7598 | 0.7424 | 0.7267 | 0.7123 | 0.6990 |
| YUBA | 0.0886 | 0.0948 | 0.1007 | 0.1061 | 0.1113 |  | 0.8167 | 0.7986 | 0.7817 | 0.7658 | 0.7509 |

206

|  | Latinos |  |  |  |  | Whites |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| County | 1990 | 1992 | 1994 | 1996 | 1998 | 1990 | 1992 | 1994 | 1996 | 1998 |
| ALAMEDA | 0.1429 | 0.1487 | 0.1542 | 0.1595 | 0.1764 | 0.5315 | 0.5135 | 0.4963 | 0.4798 | 0.4562 |
| ALPINE | 0.0727 | 0.0704 | 0.0698 | 0.0695 | 0.0707 | 0.6778 | 0.6735 | 0.6695 | 0.6642 | 0.6582 |
| AMADOR | 0.0838 | 0.0829 | 0.0832 | 0.0832 | 0.0877 | 0.8393 | 0.8436 | 0.8446 | 0.8453 | 0.8425 |
| BUTTE | 0.0750 | 0.0779 | 0.0804 | 0.0828 | 0.0858 | 0.8689 | 0.8630 | 0.8574 | 0.8522 | 0.8460 |
| CALAVERAS | 0.0531 | 0.0550 | 0.0561 | 0.0570 | 0.0646 | 0.9168 | 0.9162 | 0.9142 | 0.9126 | 0.9059 |
| COLUSA | 0.3365 | 0.3554 | 0.3736 | 0.3893 | 0.4113 | 0.6203 | 0.6023 | 0.5847 | 0.5694 | 0.5489 |
| CONTRA COSTA | 0.1143 | 0.1198 | 0.1248 | 0.1295 | 0.1344 | 0.6969 | 0.6849 | 0.6740 | 0.6638 | 0.6475 |
| DEL NORTE | 0.1027 | 0.1070 | 0.1097 | 0.1125 | 0.1166 | 0.7838 | 0.7778 | 0.7761 | 0.7716 | 0.7712 |
| EL DORADO | 0.0701 | 0.0739 | 0.0773 | 0.0803 | 0.0826 | 0.8976 | 0.8922 | 0.8877 | 0.8837 | 0.8803 |
| FRESNO | 0.3556 | 0.3636 | 0.3708 | 0.3777 | 0.3863 | 0.5079 | 0.4925 | 0.4787 | 0.4659 | 0.4548 |
| GLENN | 0.2018 | 0.2132 | 0.2250 | 0.2353 | 0.2466 | 0.7438 | 0.7287 | 0.7127 | 0.6991 | 0.6850 |
| HUMBOLDT | 0.0422 | 0.0445 | 0.0468 | 0.0491 | 0.0516 | 0.8791 | 0.8735 | 0.8683 | 0.8629 | 0.8571 |
| IMPERIAL | 0.6604 | 0.6682 | 0.6840 | 0.6913 | 0.7133 | 0.2898 | 0.2744 | 0.2602 | 0.2472 | 0.2249 |
| INYO | 0.0840 | 0.0885 | 0.0965 | 0.1007 | 0.1061 | 0.8115 | 0.8050 | 0.7949 | 0.7897 | 0.7813 |
| KERN | 0.2810 | 0.2911 | 0.2994 | 0.3079 | 0.3196 | 0.6281 | 0.6157 | 0.6053 | 0.5935 | 0.5791 |
| KINGS | 0.3418 | 0.3513 | 0.3594 | 0.3670 | 0.3753 | 0.5396 | 0.5277 | 0.5177 | 0.5088 | 0.4989 |
| LAKE | 0.0716 | 0.0745 | 0.0767 | 0.0787 | 0.0825 | 0.8821 | 0.8779 | 0.8748 | 0.8718 | 0.8658 |
| LASSEN | 0.1043 | 0.1046 | 0.1068 | 0.1408 | 0.1499 | 0.7950 | 0.7963 | 0.7934 | 0.7255 | 0.7219 |
| LOS ANGELES | 0.3801 | 0.3956 | 0.4104 | 0.4244 | 0.4404 | 0.4081 | 0.3877 | 0.3683 | 0.3499 | 0.3355 |
| MADERA | 0.3466 | 0.3561 | 0.3642 | 0.3696 | 0.3764 | 0.6022 | 0.5892 | 0.5776 | 0.5674 | 0.5568 |
| MARIN | 0.0787 | 0.0846 | 0.0903 | 0.0958 | 0.1137 | 0.8461 | 0.8374 | 0.8290 | 0.8210 | 0.8009 |
| MARIPOSA | 0.0480 | 0.0501 | 0.0512 | 0.0526 | 0.0547 | 0.8951 | 0.8957 | 0.8954 | 0.8972 | 0.8949 |
| MENDOCINO | 0.1035 | 0.1110 | 0.1178 | 0.1247 | 0.1340 | 0.8438 | 0.8345 | 0.8253 | 0.8164 | 0.8060 |


|  | Latinos |  |  |  |  | Whites |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| County | 1990 | 1992 | 1994 | 1996 | 1998 | 1990 | 1992 | 1994 | 1996 | 1998 |
| MERCED | 0.3271 | 0.3370 | 0.3459 | 0.3542 | 0.3597 | 0.5427 | 0.5273 | 0.5134 | 0.5004 | 0.4925 |
| MODOC | 0.0724 | 0.0779 | 0.0860 | 0.0936 | 0.0967 | 0.8767 | 0.8717 | 0.8635 | 0.8546 | 0.8516 |
| MONO | 0.1135 | 0.1233 | 0.1347 | 0.1431 | 0.1502 | 0.8370 | 0.8270 | 0.8174 | 0.8094 | 0.8012 |
| MONTEREY | 0.3379 | 0.3513 | 0.3645 | 0.3767 | 0.3915 | 0.5241 | 0.5095 | 0.4953 | 0.4813 | 0.4702 |
| NAPA | 0.1452 | 0.1548 | 0.1637 | 0.1722 | 0.1813 | 0.8075 | 0.7951 | 0.7836 | 0.7727 | 0.7606 |
| NEVADA | 0.0416 | 0.0441 | 0.0460 | 0.0476 | 0.0486 | 0.9391 | 0.9370 | 0.9348 | 0.9330 | 0.9322 |
| ORANGE | 0.2360 | 0.2490 | 0.2609 | 0.2720 | 0.2861 | 0.6434 | 0.6239 | 0.6059 | 0.5890 | 0.5699 |
| PLACER | 0.0806 | 0.0826 | 0.0843 | 0.0859 | 0.0866 | 0.8834 | 0.8801 | 0.8774 | 0.8752 | 0.8731 |
| PLUMAS | 0.0459 | 0.0480 | 0.0508 | 0.0530 | 0.0572 | 0.9123 | 0.9109 | 0.9072 | 0.9037 | 0.8992 |
| RIVERSIDE | 0.2638 | 0.2711 | 0.2773 | 0.2830 | 0.2899 | 0.6447 | 0.6346 | 0.6260 | 0.6183 | 0.6078 |
| SACRAMENTO | 0.1172 | 0.1208 | 0.1241 | 0.1272 | 0.1307 | 0.6935 | 0.6814 | 0.6704 | 0.6602 | 0.6495 |
| SAN BENITO | 0.4569 | 0.4541 | 0.4505 | 0.4475 | 0.4347 | 0.5150 | 0.5182 | 0.5209 | 0.5228 | 0.5351 |
| SAN BERNARDINO | 0.2684 | 0.2792 | 0.2885 | 0.2970 | 0.3113 | 0.6079 | 0.5920 | 0.5782 | 0.5657 | 0.5472 |
| SAN DIEGO | 0.2057 | 0.2151 | 0.2235 | 0.2311 | 0.2414 | 0.6537 | 0.6408 | 0.6292 | 0.6185 | 0.6047 |
| SAN FRANCISCO | 0.1397 | 0.1444 | 0.1490 | 0.1535 | 0.1578 | 0.4657 | 0.4499 | 0.4344 | 0.4192 | 0.4085 |
| SAN JOAQUIN | 0.2351 | 0.2401 | 0.2447 | 0.2491 | 0.2544 | 0.5884 | 0.5763 | 0.5654 | 0.5553 | 0.5441 |
| SAN LUIS OBISPO | 0.1336 | 0.1367 | 0.1397 | 0.1424 | 0.1449 | 0.8123 | 0.8088 | 0.8056 | 0.8025 | 0.7993 |
| SAN MATEO | 0.1777 | 0.1877 | 0.1971 | 0.2060 | 0.2209 | 0.6027 | 0.5841 | 0.5666 | 0.5502 | 0.5256 |
| SANTA BARBARA | 0.2672 | 0.2794 | 0.2905 | 0.3010 | 0.3162 | 0.6606 | 0.6469 | 0.6343 | 0.6223 | 0.6056 |
| SANTA CLARA | 0.2109 | 0.2176 | 0.2241 | 0.2303 | 0.2378 | 0.5798 | 0.5591 | 0.5393 | 0.5203 | 0.4972 |
| SANTA CRUZ | 0.2049 | 0.2139 | 0.2222 | 0.2303 | 0.2382 | 0.7457 | 0.7347 | 0.7247 | 0.7149 | 0.7057 |
| SHASTA | 0.0387 | 0.0407 | 0.0423 | 0.0439 | 0.0451 | 0.9118 | 0.9079 | 0.9045 | 0.9014 | 0.8982 |
| SIERRA | 0.0555 | 0.0560 | 0.0559 | 0.0556 | 0.0576 | 0.9225 | 0.9217 | 0.9220 | 0.9224 | 0.9201 |
| SISKIYOU | 0.0586 | 0.0616 | 0.0650 | 0.0675 | 0.0709 | 0.8789 | 0.8742 | 0.8691 | 0.8643 | 0.8597 |
| SOLANO | 0.1343 | 0.1387 | 0.1425 | 0.1461 | 0.1494 | 0.6095 | 0.5964 | 0.5847 | 0.5739 | 0.5648 |


|  | Latinos |  |  |  |  | Whites |  |  |  |  |  |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| County | 1990 | 1992 | 1994 | 1996 | 1998 |  | 1990 | 1992 | 1994 | 1996 | 1998 |
| SONOMA | 0.1070 | 0.1132 | 0.1189 | 0.1242 | 0.1292 |  | 0.8435 | 0.8353 | 0.8277 | 0.8207 | 0.8131 |
| STANISLAUS | 0.2195 | 0.2279 | 0.2354 | 0.2423 | 0.2494 |  | 0.7052 | 0.6922 | 0.6807 | 0.6701 | 0.6601 |
| SUTTER | 0.1651 | 0.1712 | 0.1763 | 0.1810 | 0.1844 |  | 0.7172 | 0.7069 | 0.6974 | 0.6889 | 0.6808 |
| TEHAMA | 0.1041 | 0.1105 | 0.1161 | 0.1215 | 0.1305 |  | 0.8674 | 0.8617 | 0.8555 | 0.8504 | 0.8409 |
| TRINITY | 0.0331 | 0.0335 | 0.0344 | 0.0361 | 0.0369 |  | 0.9095 | 0.9080 | 0.9064 | 0.9031 | 0.9003 |
| TULARE | 0.3892 | 0.4018 | 0.4133 | 0.4242 | 0.4366 |  | 0.5463 | 0.5313 | 0.5175 | 0.5046 | 0.4915 |
| TUOLUMNE | 0.0766 | 0.0767 | 0.0767 | 0.0778 | 0.0789 |  | 0.8664 | 0.8683 | 0.8691 | 0.8694 | 0.8682 |
| VENTURA | 0.2656 | 0.2740 | 0.2819 | 0.2895 | 0.3000 |  | 0.6584 | 0.6472 | 0.6369 | 0.6272 | 0.6122 |
| YOLO | 0.2004 | 0.2056 | 0.2100 | 0.2144 | 0.2212 |  | 0.6871 | 0.6777 | 0.6692 | 0.6612 | 0.6486 |
| YUBA | 0.1159 | 0.1204 | 0.1243 | 0.1284 | 0.1331 |  | 0.7377 | 0.7263 | 0.7173 | 0.7087 | 0.6970 |

Table A3 Appendix: Latino and White Voter Registration 1980-1988

|  | Latinos |  |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| County |  |  |  | 82 |  |  |  |  |  | 88 |
| ALAMEDA | 0.202 | [0.1671] | 0.371 | [0.1794] | 0.595 | [ 0.1589] | 0.485 | [ 0.2133] | 0.375 | [ 0.1460] |
| ALPINE | 0.243 | [0.1934] | 0.338 | [0.2064 ] | 0.525 | [0.1825] | 0.503 | [ 0.2004] | 0.338 | [0.1667] |
| AMADOR | 0.279 | [0.2549] | 0.381 | [0.1905] | 0.585 | [0.1668] | 0.481 | [ 0.2069] | 0.336 | [0.1626] |
| BUTTE | 0.202 | [0.1731] | 0.346 | [0.1675] | 0.576 | [0.1631] | 0.458 | [ 0.1835] | 0.377 | [ 0.1851] |
| CALAVERAS | 0.383 | [0.2543] | 0.327 | [0.1828 ] | 0.554 | [0.1879] | 0.440 | [0.1970] | 0.390 | [0.1821] |
| COLUSA | 0.157 | [0.1342] | 0.365 | [0.1583 ] | 0.558 | [0.1346] | 0.446 | [ 0.1343] | 0.375 | [0.1389] |
| CONTRA COSTA | 0.247 | [0.2069] | 0.361 | [ 0.1838 ] | 0.622 | [0.1505] | 0.493 | [ 0.1920] | 0.359 | [0.1535] |
| DEL NORTE | 0.135 | [0.1479] | 0.343 | [ 0.1875 ] | 0.536 | [0.1719] | 0.437 | [0.1918] | 0.385 | [0.1735] |
| EL DORADO | 0.267 | [0.2308] | 0.297 | [0.1869 ] | 0.586 | [0.1758] | 0.447 | [0.1964] | 0.351 | [0.1682] |
| FRESNO | 0.184 | [0.1336] | 0.323 | [0.1235] | 0.589 | [0.1112] | 0.499 | [0.1457] | 0.392 | [0.1254] |
| GLENN | 0.197 | [0.1557] | 0.361 | [0.1691] | 0.529 | [0.1914] | 0.415 | [0.1785] | 0.341 | 0.1739] |
| HUMBOLDT | 0.219 | [0.1659] | 0.380 | [0.1875] | 0.578 | [0.1792] | 0.468 | [0.2124] | 0.363 | [0.1727] |
| IMPERIAL | 0.585 | [0.0584] | 0.510 | [ 0.0516 ] | 0.585 | [ 0.0497] | 0.572 | [0.0523] | 0.554 | [0.0593] |
| INYO | 0.215 | [0.2038] | 0.399 | [0.1714] | 0.599 | [ 0.1562] | 0.452 | [0.2042] | 0.353 | [0.1570] |
| KERN | 0.136 | [0.1221] | 0.252 | [ 0.1574 ] | 0.557 | [0.1562] | 0.444 | [0.1528] | 0.352 | [0.1589] |
| KINGS | 0.094 | [0.0878] | 0.248 | [0.1462] | 0.489 | [0.1410] | 0.448 | [0.1566] | 0.324 | [0.1427] |
| LAKE | 0.274 | [0.2265] | 0.335 | [ 0.1907 | 0.557 | [0.1707] | 0.427 | [0.1920] | 0.390 | [0.1695] |
| LASSEN | 0.224 | [0.2028] | 0.290 | [ 0.1781 ] | 0.466 | [0.1860] | 0.379 | [0.1874] | 0.400 | [0.1727] |
| LOS ANGELES | 0.169 | [0.1173] | 0.354 | [0.1167] | 0.556 | [0.1192] | 0.468 | [0.1351] | 0.382 | [0.1388] |
| MADERA | 0.240 | [0.1644] | 0.237 | [0.1437] | 0.474 | [ 0.1498] | 0.367 | [0.1409] | 0.343 | [0.1417] |
| MARIN | 0.287 | [0.2156] | 0.418 | [0.2088] | 0.609 | [0.1855] | 0.506 | [0.2004] | 0.334 | [0.1658] |
| MARIPOSA | 0.282 | [0.2353] | 0.348 | [0.1715] | 0.564 | [0.1783] | 0.456 | [0.2031] | 0.332 | [0.1549] |
| MENDOCINO | 0.236 | [0.2083] | 0.373 | [0.1776 ] | 0.585 | [ 0.1814] | 0.488 | [0.2006] | 0.367 | [ 0.1698] |


| County | 1980 |  | 1982 |  | 1984 |  | 1986 |  | 1988 |  |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| MERCED | 0.101 | $[0.0874]$ | 0.233 | $[0.1457]$ | 0.441 | $[0.1502]$ | 0.349 | $[0.1472]$ | 0.297 | $[0.1782]$ |
| MODOC | 0.280 | $[0.2339]$ | 0.365 | $[0.2049]$ | 0.569 | $[0.1763]$ | 0.487 | $[0.2240]$ | 0.369 | $[0.1840]$ |
| MONO | 0.198 | $[0.1972]$ | 0.346 | $[0.1910]$ | 0.566 | $[0.1947]$ | 0.447 | $[0.1795]$ | 0.354 | $[0.1733]$ |
| MONTEREY | 0.110 | $[0.0956]$ | 0.383 | $[0.1304]$ | 0.596 | $[0.1417]$ | 0.112 | $[0.1080]$ | 0.380 | $[0.1542]$ |
| NAPA | 0.262 | $[0.2042]$ | 0.369 | $[0.1654]$ | 0.600 | $[0.1558]$ | 0.527 | $[0.1993]$ | 0.353 | $[0.1594]$ |
| NEVADA | 0.298 | $[0.2297]$ | 0.330 | $[0.1557]$ | 0.569 | $[0.1777]$ | 0.433 | $[0.2069]$ | 0.388 | $[0.1271]$ |
| ORANGE | 0.189 | $[0.1562]$ | 0.426 | $[0.1734]$ | 0.584 | $[0.1817]$ | 0.501 | $[0.1923]$ | 0.400 | $[0.1522]$ |
| PLACER | 0.275 | $[0.2037]$ | 0.383 | $[0.1727]$ | 0.603 | $[0.1802]$ | 0.502 | $[0.2093]$ | 0.366 | $[0.1601]$ |
| PLUMAS | 0.310 | $[0.2489]$ | 0.394 | $[0.1740]$ | 0.591 | $[0.1544]$ | 0.436 | $[0.1842]$ | 0.392 | $[0.1489]$ |
| RIVERSIDE | 0.204 | $[0.1656]$ | 0.287 | $[0.1489]$ | 0.579 | $[0.1467]$ | 0.517 | $[0.1746]$ | 0.343 | $[0.1644]$ |
| SACRAMENTO | 0.202 | $[0.166]$ | 0.344 | $[0.1848]$ | 0.580 | $[0.1714]$ | 0.469 | $[0.2017]$ | 0.362 | $[0.1408]$ |
| SAN BENITO | 0.340 | $[0.0895]$ | 0.351 | $[0.0828]$ | 0.631 | $[0.0832]$ | 0.604 | $[0.1010]$ | 0.405 | $[0.1130]$ |
| SAN BERNARDINO | 0.162 | $[0.1449]$ | 0.281 | $[0.1546]$ | 0.521 | $[0.1647]$ | 0.428 | $[0.1584]$ | 0.339 | $[0.1583]$ |
| SAN DIEGO | 0.211 | $[0.2116]$ | 0.437 | $[0.1721]$ | 0.627 | $[0.1493]$ | 0.568 | $[0.2151]$ | 0.377 | $[0.1525]$ |
| SAN FRANCISCO | 0.334 | $[0.2342]$ | 0.491 | $[0.1925]$ | 0.636 | $[0.1436]$ | 0.470 | $[0.1953]$ | 0.362 | $[0.1526]$ |
| SAN JOAQUIN | 0.139 | $[0.1125]$ | 0.263 | $[0.1565]$ | 0.542 | $[0.1434]$ | 0.443 | $[0.1631]$ | 0.349 | $[0.1868]$ |
| SAN LUIS OBISPO | 0.253 | $[0.1964]$ | 0.338 | $[0.1928]$ | 0.588 | $[0.1790]$ | 0.437 | $[0.1977]$ | 0.366 | $[0.1659]$ |
| SAN MATEO | 0.187 | $[0.1653]$ | 0.407 | $[0.1620]$ | 0.590 | $[0.1560]$ | 0.455 | $[0.1832]$ | 0.377 | $[0.1625]$ |
| SANTA BARBARA | 0.308 | $[0.2105]$ | 0.511 | $[0.1614]$ | 0.707 | $[0.1289]$ | 0.533 | $[0.1842]$ | 0.443 | $[0.1433]$ |
| SANTA CLARA | 0.202 | $[0.158]$ | 0.367 | $[0.1708]$ | 0.590 | $[0.1419]$ | 0.444 | $[0.1721]$ | 0.375 | $[0.1573]$ |
| SANTA CRUZ | 0.281 | $[0.2164]$ | 0.481 | $[0.1968]$ | 0.632 | $[0.1451]$ | 0.518 | $[0.1932]$ | 0.373 | $[0.1460]$ |
| SHASTA | 0.199 | $[0.171]$ | 0.358 | $[0.1901]$ | 0.565 | $[0.1861]$ | 0.460 | $[0.1691]$ | 0.389 | $[0.1653]$ |
| SIERRA | 0.338 | $[0.2552]$ | 0.436 | $[0.2079]$ | 0.825 | $[0.0596]$ | 0.525 | $[0.2136]$ | 0.329 | $[0.1848]$ |
| SISKIYOU | 0.291 | $[0.2132]$ | 0.330 | $[0.1832]$ | 0.565 | $[0.1621]$ | 0.439 | $[0.1975]$ | 0.363 | $[0.1595]$ |
| SOLANO | 0.169 | $[0.1504]$ | 0.316 | $[0.1768]$ | 0.548 | $[0.1501]$ | 0.475 | $[0.1780]$ | 0.381 | $[0.1674]$ |
| SONOMA | 0.235 | $[0.2122]$ | 0.357 | $[0.1793]$ | 0.615 | $[0.1578]$ | 0.506 | $[0.1982]$ | 0.391 | $[0.1657]$ |


| County | 1980 |  | 1982 |  | 1984 |  | 1986 |  | 1988 |  |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| STANISLAUS | 0.150 | $[0.1547]$ | 0.269 | $[0.1637]$ | 0.482 | $[0.1767]$ | 0.431 | $[0.1582]$ | 0.371 | $[0.1574]$ |
| SUTTER | 0.175 | $[0.1731]$ | 0.299 | $[0.1798]$ | 0.547 | $[0.1436]$ | 0.397 | $[0.1825]$ | 0.368 | $[0.1550]$ |
| TEHAMA | 0.220 | $[0.1932]$ | 0.311 | $[0.1722]$ | 0.548 | $[0.1738]$ | 0.454 | $[0.1908]$ | 0.404 | $[0.1650]$ |
| TRINITY | 0.329 | $[0.27]$ | 0.383 | $[0.1774]$ | 0.563 | $[0.1810]$ | 0.482 | $[0.1819]$ | 0.338 | $[0.1475]$ |
| TULARE | 0.156 | $[0.1148]$ | 0.269 | $[0.1215]$ | 0.497 | $[0.1315]$ | 0.348 | $[0.1393]$ | 0.325 | $[0.1383]$ |
| TUOLUMNE | 0.983 | $[0.01]$ | 0.347 | $[0.1750]$ | 0.571 | $[0.1745]$ | 0.466 | $[0.1969]$ | 0.358 | $[0.1605]$ |
| VENTURA | 0.246 | $[0.1784]$ | 0.405 | $[0.1697]$ | 0.628 | $[0.1401]$ | 0.572 | $[0.1736]$ | 0.452 | $[0.1610]$ |
| YOLO | 0.271 | $[0.1927]$ | 0.435 | $[0.1687]$ | 0.639 | $[0.1543]$ | 0.520 | $[0.1877]$ | 0.382 | $[0.1801]$ |
| YUBA | 0.149 | $[0.1414]$ | 0.313 | $[0.1723]$ | 0.564 | $[0.1708]$ | 0.403 | $[0.1739]$ | 0.391 | $[0.1889]$ |

Note: The stardard error for each estimate is shown in brackets.

|  | Whites |  |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | 80 |  | 82 |  |  |  |  |  |  |
| ALAMEDA | 0.904 | [ 0.0684] | 0.790 | [ 0.0677] | 0.863 | [0.0522] | 0.844 | [0.0765] | 0.844 | [0.073] |
| ALPINE | 0.940 | [ 0.0445] | 0.759 | [ 0.0462] | 0.727 | [0.0425] | 0.813 | [0.0498] | 0.967 | [0.0304] |
| AMADOR | 0.934 | [ 0.0204] | 0.816 | [ 0.0253] | 0.836 | [0.0188] | 0.799 | [0.0265] | 0.694 | [0.0272] |
| BUTTE | 0.804 | [0.0212] | 0.757 | [ 0.0214] | 0.825 | [0.019] | 0.761 | [0.0233] | 0.740 | [0.0217] |
| CALAVERAS | 0.986 | [0.0113] | 0.731 | [0.0154] | 0.745 | [0.0118] | 0.735 | [0.0155] | 0.715 | [0.0138] |
| COLUSA | 0.838 | [0.0477] | 0.776 | [ 0.0574] | 0.768 | [0.0528] | 0.764 | [0.062] | 0.733 | [0.0544] |
| CONTRA COSTA | 0.931 | [0.0517] | 0.830 | [0.0586] | 0.917 | [0.0336] | 0.869 | [0.0471] | 0.844 | [0.0466] |
| DEL NORTE | 0.693 | [ 0.0311] | 0.766 | [0.0354] | 0.755 | [0.0259] | 0.766 | [0.0299] | 0.610 | [0.0361] |
| EL DORADO | 0.894 | [0.0169] | 0.701 | [ 0.0191] | 0.766 | [0.0152] | 0.733 | [0.0196] | 0.694 | [0.0181] |
| FRESNO | 0.903 | [0.0714] | 0.757 | [ 0.0698] | 0.801 | [0.0602] | 0.789 | [0.0676] | 0.784 | [0.0758] |
| GLENN | 0.781 | [ 0.0312] | 0.760 | [ 0.0387] | 0.729 | [0.03] | 0.721 | [0.0462] | 0.735 | [0.0394] |


| County | 1980 |  | 1982 |  | 1984 |  | 1986 |  | 1988 |  |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| HUMBOLDT | 0.845 | $[0.0204]$ | 0.831 | $[0.0225]$ | 0.860 | $[0.0172]$ | 0.806 | $[0.0262]$ | 0.814 | $[0.0195]$ |
| IMPERIAL | 0.886 | $[0.0758]$ | 0.777 | $[0.0660]$ | 0.786 | $[0.0809]$ | 0.781 | $[0.0965]$ | 0.779 | $[0.0898]$ |
| INYO | 0.887 | $[0.0416]$ | 0.826 | $[0.0400]$ | 0.785 | $[0.0252]$ | 0.785 | $[0.0454]$ | 0.872 | $[0.0325]$ |
| KERN | 0.838 | $[0.0478]$ | 0.723 | $[0.0555]$ | 0.775 | $[0.0528]$ | 0.773 | $[0.0641]$ | 0.731 | $[0.0693]$ |
| KINGS | 0.776 | $[0.0580]$ | 0.750 | $[0.0703]$ | 0.750 | $[0.0697]$ | 0.748 | $[0.0747]$ | 0.708 | $[0.0994]$ |
| LAKE | 0.859 | $[0.0211]$ | 0.679 | $[0.0196]$ | 0.742 | $[0.0155]$ | 0.686 | $[0.0224]$ | 0.647 | $[0.0223]$ |
| LASSEN | 0.816 | $[0.0307]$ | 0.631 | $[0.0325]$ | 0.587 | $[0.0356]$ | 0.608 | $[0.0331]$ | 0.629 | $[0.0414]$ |
| LOS ANGELES | 0.894 | $[0.0825]$ | 0.764 | $[0.0653]$ | 0.794 | $[0.0646]$ | 0.794 | $[0.0864]$ | 0.764 | $[0.0871]$ |
| MADERA | 0.895 | $[0.0663]$ | 0.725 | $[0.0673]$ | 0.722 | $[0.0571]$ | 0.726 | $[0.0694]$ | 0.700 | $[0.0811]$ |
| MARIN | 0.896 | $[0.0232]$ | 0.855 | $[0.0250]$ | 0.918 | $[0.0209]$ | 0.898 | $[0.025]$ | 0.846 | $[0.0233]$ |
| MARIPOSA | 0.924 | $[0.0246]$ | 0.755 | $[0.0201]$ | 0.814 | $[0.0142]$ | 0.796 | $[0.0198]$ | 0.737 | $[0.0154]$ |
| MENDOCINO | 0.870 | $[0.0258]$ | 0.808 | $[0.0280]$ | 0.831 | $[0.0215]$ | 0.846 | $[0.0294]$ | 0.837 | $[0.0263]$ |
| MERCED | 0.795 | $[0.0577]$ | 0.745 | $[0.0662]$ | 0.720 | $[0.0651]$ | 0.705 | $[0.0773]$ | 0.642 | $[0.1005]$ |
| MODOC | 0.883 | $[0.0187]$ | 0.771 | $[0.0209]$ | 0.795 | $[0.0157]$ | 0.816 | $[0.022]$ | 0.908 | $[0.0222]$ |
| MONO | 0.738 | $[0.0178]$ | 0.735 | $[0.0235]$ | 0.722 | $[0.0211]$ | 0.731 | $[0.0271]$ | 0.915 | $[0.0239]$ |
| MONTEREY | 0.857 | $[0.0692]$ | 0.779 | $[0.0610]$ | 0.813 | $[0.0525]$ | 0.431 | $[0.0454]$ | 0.727 | $[0.0742]$ |
| NAPA | 0.823 | $[0.0294]$ | 0.807 | $[0.0330]$ | 0.835 | $[0.0234]$ | 0.841 | $[0.0351]$ | 0.823 | $[0.0304]$ |
| NEVADA | 0.955 | $[0.0116]$ | 0.722 | $[0.0112]$ | 0.806 | $[0.007]$ | 0.795 | $[0.0098]$ | 0.780 | $[0.0096]$ |
| ORANGE | 0.901 | $[0.0521]$ | 0.811 | $[0.0499]$ | 0.811 | $[0.0384]$ | 0.822 | $[0.0707]$ | 0.800 | $[0.0616]$ |
| PLACER | 0.929 | $[0.0256]$ | 0.779 | $[0.0243]$ | 0.880 | $[0.0155]$ | 0.843 | $[0.0238]$ | 0.816 | $[0.0179]$ |
| PLUMAS | 0.982 | $[0.0135]$ | 0.827 | $[0.0185]$ | 0.846 | $[0.0115]$ | 0.759 | $[0.0156]$ | 0.735 | $[0.0147]$ |
| RIVERSIDE | 0.904 | $[0.0625]$ | 0.736 | $[0.0575]$ | 0.784 | $[0.0524]$ | 0.822 | $[0.0623]$ | 0.735 | $[0.0646]$ |
| SACRAMENTO | 0.896 | $[0.0667]$ | 0.785 | $[0.0663]$ | 0.860 | $[0.0367]$ | 0.851 | $[0.0565]$ | 0.829 | $[0.0536]$ |
| SAN BENITO | 0.891 | $[0.0822]$ | 0.779 | $[0.0589]$ | 0.805 | $[0.0762]$ | 0.803 | $[0.0871]$ | 0.729 | $[0.09]$ |
| SAN BERNARDINO | 0.862 | $[0.0559]$ | 0.740 | $[0.0613]$ | 0.758 | $[0.0463]$ | 0.751 | $[0.0695]$ | 0.695 | $[0.0837]$ |
| SAN DIEGO | 0.925 | $[0.0561]$ | 0.820 | $[0.0650]$ | 0.844 | $[0.0427]$ | 0.862 | $[0.0539]$ | 0.849 | $[0.0575]$ |


| County | 1980 |  | 1982 |  | 1984 |  | 1986 |  | 1988 |  |
| :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- |
| SAN FRANCISCO | 0.910 | $[0.0643]$ | 0.813 | $[0.0753]$ | 0.892 | $[0.0614]$ | 0.823 | $[0.1028]$ | 0.812 | $[0.0677]$ |
| SAN JOAQUIN | 0.891 | $[0.0697]$ | 0.758 | $[0.0658]$ | 0.773 | $[0.0518]$ | 0.771 | $[0.0749]$ | 0.695 | $[0.0772]$ |
| SAN LUIS OBISPO | 0.860 | $[0.0322]$ | 0.723 | $[0.0338]$ | 0.780 | $[0.0255]$ | 0.718 | $[0.0336]$ | 0.614 | $[0.0368]$ |
| SAN MATEO | 0.913 | $[0.0723]$ | 0.809 | $[0.0532]$ | 0.840 | $[0.0461]$ | 0.793 | $[0.0705]$ | 0.783 | $[0.0713]$ |
| SANTA BARBARA | 0.924 | $[0.0549]$ | 0.828 | $[0.0581]$ | 0.890 | $[0.0385]$ | 0.845 | $[0.0642]$ | 0.792 | $[0.0574]$ |
| SANTA CLARA | 0.912 | $[0.0684]$ | 0.791 | $[0.0659]$ | 0.809 | $[0.0458]$ | 0.777 | $[0.0755]$ | 0.773 | $[0.0654]$ |
| SANTA CRUZ | 0.933 | $[0.0517]$ | 0.840 | $[0.0479]$ | 0.864 | $[0.0271]$ | 0.802 | $[0.0486]$ | 0.774 | $[0.0466]$ |
| SHASTA | 0.833 | $[0.0139]$ | 0.741 | $[0.0157]$ | 0.744 | $[0.0124]$ | 0.746 | $[0.0175]$ | 0.698 | $[0.0137]$ |
| SIERRA | 0.974 | $[0.0192]$ | 0.916 | $[0.0206]$ | 0.994 | $[0.0047]$ | 0.905 | $[0.0169]$ | 0.932 | $[0.0131]$ |
| SISKIYOU | 0.908 | $[0.0254]$ | 0.738 | $[0.0265]$ | 0.780 | $[0.0152]$ | 0.772 | $[0.0221]$ | 0.789 | $[0.0177]$ |
| SOLANO | 0.893 | $[0.0656]$ | 0.751 | $[0.0598]$ | 0.795 | $[0.0514]$ | 0.794 | $[0.0728]$ | 0.785 | $[0.0812]$ |
| SONOMA | 0.863 | $[0.0257]$ | 0.763 | $[0.0288]$ | 0.863 | $[0.023]$ | 0.870 | $[0.0284]$ | 0.845 | $[0.0274]$ |
| STANISLAUS | 0.735 | $[0.0302]$ | 0.677 | $[0.0473]$ | 0.698 | $[0.0429]$ | 0.748 | $[0.0501]$ | 0.703 | $[0.0507]$ |
| SUTTER | 0.809 | $[0.0472]$ | 0.732 | $[0.0521]$ | 0.775 | $[0.0438]$ | 0.725 | $[0.053]$ | 0.706 | $[0.0554]$ |
| TEHAMA | 0.796 | $[0.0173]$ | 0.676 | $[0.0221]$ | 0.795 | $[0.0175]$ | 0.732 | $[0.0244]$ | 0.701 | $[0.0215]$ |
| TRINITY | 0.985 | $[0.0108]$ | 0.855 | $[0.0165]$ | 0.814 | $[0.0121]$ | 0.815 | $[0.0152]$ | 0.832 | $[0.0134]$ |
| TULARE | 0.869 | $[0.0590]$ | 0.760 | $[0.0738]$ | 0.749 | $[0.0602]$ | 0.727 | $[0.0721]$ | 0.696 | $[0.0807]$ |
| TUOLUMNE | 0.999 | $[0.0006]$ | 0.769 | $[0.0215]$ | 0.835 | $[0.0164]$ | 0.817 | $[0.0233]$ | 0.716 | $[0.0206]$ |
| VENTURA | 0.925 | $[0.0654]$ | 0.774 | $[0.0614]$ | 0.837 | $[0.042]$ | 0.852 | $[0.0588]$ | 0.845 | $[0.0563]$ |
| YOLO | 0.932 | $[0.0560]$ | 0.807 | $[0.0608]$ | 0.857 | $[0.0408]$ | 0.840 | $[0.0574]$ | 0.856 | $[0.0536]$ |
| YUBA | 0.746 | $[0.0339]$ | 0.785 | $[0.0453]$ | 0.776 | $[0.0334]$ | 0.701 | $[0.0443]$ | 0.660 | $[0.0539]$ |

Note: The stardard error for each estimate is shown in brackets.
Table A4 Appendix: Latino and White Voter Registration 1990-1998

|  | Latinos |  |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| County |  |  |  |  |  |  |  |  |  |  |
| ALAMEDA | 0.470 | [0.1771] | 0.643 | [0.1469] | 0.598 | [0.1294] | 0.626 | [0.1165] | 0.494 | [0.1155] |
| ALPINE | 0.477 | [0.1814] | 0.574 | [0.1822] | 0.762 | [0.0769] | 0.638 | [0.1124] | 0.588 | [0.127] |
| AMADOR | 0.492 | [0.1709] | 0.577 | [0.1783] | 0.566 | [0.1542] | 0.575 | [0.1125] | 0.481 | [0.1528] |
| BUTTE | 0.483 | [0.1948] | 0.540 | [0.1792] | 0.599 | [0.1297] | 0.616 | [0.1159] | 0.540 | [0.1302] |
| CALAVERAS | 0.493 | [0.1968] | 0.544 | [0.1932] | 0.604 | [0.1469] | 0.603 | [0.1351] | 0.517 | [0.1382] |
| COLUSA | 0.592 | [0.1067] | 0.627 | [0.0886] | 0.624 | [0.0942] | 0.575 | [0.08] | 0.519 | [0.0676] |
| CONTRA COSTA | 0.509 | [0.1815] | 0.650 | [0.1703] | 0.619 | [0.1225] | 0.654 | [0.0988] | 0.522 | [0.1379] |
| DEL NORTE | 0.476 | [0.1822] | 0.518 | [0.1671] | 0.527 | [0.1696] | 0.589 | [0.1099] | 0.425 | [0.1411] |
| EL DORADO | 0.476 | [0.1879] | 0.605 | [0.1634] | 0.619 | [0.1256] | 0.598 | [0.1295] | 0.514 | [0.1148] |
| FRESNO | 0.570 | [0.1064] | 0.573 | [0.0961] | 0.641 | [0.0973] | 0.578 | [0.0752] | 0.499 | [0.0685] |
| GLENN | 0.446 | [0.1865] | 0.474 | [0.1619] | 0.549 | [0.1507] | 0.537 | [0.1251] | 0.441 | [0.0953] |
| HUMBOLDT | 0.488 | [0.181] | 0.624 | [0.1883] | 0.618 | [0.1374] | 0.658 | [0.0854] | 0.529 | [0.1301] |
| IMPERIAL | 0.611 | [0.0426] | 0.619 | [0.033] | 0.625 | [0.0404] | 0.616 | [0.032] | 0.585 | [0.0235] |
| INYO | 0.476 | [0.1848] | 0.562 | [0.1697] | 0.586 | [0.1315] | 0.588 | [0.1355] | 0.482 | [0.1181] |
| KERN | 0.490 | [0.1417] | 0.483 | [0.131] | 0.582 | [0.1291] | 0.566 | [0.0973] | 0.500 | [0.0968] |
| KINGS | 0.366 | [0.1858] | 0.396 | [0.1227] | 0.470 | [0.1563] | 0.543 | [0.0957] | 0.486 | [0.0784] |
| LAKE | 0.473 | [0.2169] | 0.538 | [0.1897] | 0.582 | [0.1542] | 0.583 | [0.1375] | 0.441 | [0.1238] |
| LASSEN | 0.457 | [0.2017] | 0.547 | [0.1676] | 0.536 | [0.1747] | 0.558 | [0.1255] | 0.460 | [0.1407] |
| LOS ANGELES | 0.583 | [0.1003] | 0.602 | [0.0863] | 0.627 | [0.0884] | 0.625 | [0.0727] | 0.607 | [0.0619] |
| MADERA | 0.456 | [0.1399] | 0.584 | [0.1049] | 0.602 | [0.092] | 0.545 | [0.0803] | 0.460 | [0.081] |
| MARIN | 0.497 | [0.1922] | 0.605 | [0.1926] | 0.617 | [0.1234] | 0.615 | [0.1114] | 0.537 | [0.1315] |
| MARIPOSA | 0.490 | [0.1737] | 0.607 | [0.1491] | 0.593 | [0.1402] | 0.607 | [0.1218] | 0.565 | [0.1407] |
| MENDOCINO | 0.480 | [0.1602] | 0.582 | [0.1768] | 0.613 | [0.1403] | 0.588 | [0.1197] | 0.516 | [0.1311] |


| County | 1990 |  | 1992 |  | 1994 |  | 1996 |  | 1998 |  |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| MERCED | 0.456 | $[0.1356]$ | 0.465 | $[0.1287]$ | 0.602 | $[0.0965]$ | 0.527 | $[0.1011]$ | 0.583 | $[0.0762]$ |
| MODOC | 0.494 | $[0.1992]$ | 0.593 | $[0.1832]$ | 0.639 | $[0.1215]$ | 0.596 | $[0.1091]$ | 0.526 | $[0.1376]$ |
| MONO | 0.469 | $[0.1899]$ | 0.562 | $[0.1888]$ | 0.574 | $[0.1405]$ | 0.578 | $[0.1308]$ | 0.506 | $[0.1222]$ |
| MONTEREY | 0.465 | $[0.1354]$ | 0.560 | $[0.1125]$ | 0.577 | $[0.1144]$ | 0.632 | $[0.0793]$ | 0.432 | $[0.0786]$ |
| NAPA | 0.496 | $[0.185]$ | 0.579 | $[0.1868]$ | 0.646 | $[0.1153]$ | 0.592 | $[0.1096]$ | 0.497 | $[0.1097]$ |
| NEVADA | 0.496 | $[0.1759]$ | 0.594 | $[0.1898]$ | 0.604 | $[0.1433]$ | 0.618 | $[0.1265]$ | 0.547 | $[0.1516]$ |
| ORANGE | 0.475 | $[0.1621]$ | 0.612 | $[0.1293]$ | 0.589 | $[0.1113]$ | 0.579 | $[0.1075]$ | 0.461 | $[0.1133]$ |
| PLACER | 0.490 | $[0.191]$ | 0.575 | $[0.1974]$ | 0.603 | $[0.1233]$ | 0.631 | $[0.1067]$ | 0.556 | $[0.129]$ |
| PLUMAS | 0.474 | $[0.193]$ | 0.596 | $[0.1699]$ | 0.601 | $[0.1442]$ | 0.618 | $[0.1156]$ | 0.542 | $[0.1269]$ |
| RIVERSIDE | 0.434 | $[0.1851]$ | 0.534 | $[0.1484]$ | 0.553 | $[0.1304]$ | 0.544 | $[0.1206]$ | 0.389 | $[0.1104]$ |
| SACRAMENTO | 0.494 | $[0.1717]$ | 0.610 | $[0.1735]$ | 0.611 | $[0.129]$ | 0.583 | $[0.1266]$ | 0.482 | $[0.1367]$ |
| SAN BENITO | 0.569 | $[0.0749]$ | 0.656 | $[0.0686]$ | 0.670 | $[0.0693]$ | 0.702 | $[0.0558]$ | 0.759 | $[0.0745]$ |
| SAN BERNARDINO | 0.438 | $[0.1775]$ | 0.504 | $[0.1413]$ | 0.571 | $[0.1236]$ | 0.596 | $[0.1034]$ | 0.416 | $[0.1004]$ |
| SAN DIEGO | 0.471 | $[0.1901]$ | 0.589 | $[0.1475]$ | 0.610 | $[0.1379$ | 0.571 | $[0.1207]$ | 0.456 | $[0.1136]$ |
| SAN FRANCISCO | 0.512 | $[0.1736]$ | 0.859 | $[0.0575]$ | 0.672 | $[0.1052]$ | 0.723 | $[0.073]$ | 0.597 | $[0.1105]$ |
| SAN JOAQUIN | 0.464 | $[0.1617]$ | 0.532 | $[0.1393]$ | 0.589 | $[0.1289]$ | 0.561 | $[0.1029]$ | 0.433 | $[0.1155]$ |
| SAN LUIS OBISPO | 0.467 | $[0.1835]$ | 0.571 | $[0.1715]$ | 0.606 | $[0.1115]$ | 0.600 | $[0.1275]$ | 0.510 | $[0.1394]$ |
| SAN MATEO | 0.487 | $[0.1799]$ | 0.578 | $[0.1605]$ | 0.584 | $[0.1359]$ | 0.573 | $[0.1182]$ | 0.428 | $[0.1127]$ |
| SANTA BARBARA | 0.511 | $[0.1375]$ | 0.687 | $[0.1177]$ | 0.703 | $[0.0958]$ | 0.792 | $[0.0683]$ | 0.705 | $[0.1007]$ |
| SANTA CLARA | 0.521 | $[0.1588]$ | 0.644 | $[0.1385]$ | 0.606 | $[0.12]$ | 0.589 | $[0.1085]$ | 0.416 | $[0.1246]$ |
| SANTA CRUZ | 0.578 | $[0.1399]$ | 0.825 | $[0.0939]$ | 0.689 | $[0.1044]$ | 0.702 | $[0.0745]$ | 0.600 | $[0.0979]$ |
| SHASTA | 0.495 | $[0.2026]$ | 0.575 | $[0.1794]$ | 0.584 | $[0.1453]$ | 0.571 | $[0.1391]$ | 0.444 | $[0.1566]$ |
| SIERRA | 0.503 | $[0.1818]$ | 0.627 | $[0.178]$ | 0.614 | $[0.1222]$ | 0.614 | $[0.1187]$ | 0.554 | $[0.1432]$ |
| SISKIYOU | 0.466 | $[0.1823]$ | 0.571 | $[0.1894]$ | 0.608 | $[0.1304]$ | 0.600 | $[0.1134]$ | 0.479 | $[0.1453]$ |
| SOLANO | 0.447 | $[0.2154]$ | 0.511 | $[0.1928]$ | 0.539 | $[0.1535]$ | 0.560 | $[0.1236]$ | 0.479 | $[0.1365]$ |
| SONOMA | 0.499 | $[0.1821]$ | 0.607 | $[0.1548]$ | 0.602 | $[0.1231]$ | 0.596 | $[0.1167]$ | 0.478 | $[0.1322]$ |


| County | 1990 |  | 1992 |  | 1994 |  | 1996 |  | 1998 |  |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| STANISLAUS | 0.416 | $[0.1958]$ | 0.509 | $[0.1544]$ | 0.573 | $[0.1265]$ | 0.549 | $[0.1148]$ | 0.491 | $[0.0987]$ |
| SUTTER | 0.438 | $[0.1857]$ | 0.574 | $[0.1548]$ | 0.592 | $[0.1293]$ | 0.585 | $[0.1136]$ | 0.497 | $[0.1121]$ |
| TEHAMA | 0.460 | $[0.192]$ | 0.546 | $[0.1773]$ | 0.560 | $[0.1453]$ | 0.585 | $[0.1169]$ | 0.418 | $[0.1289]$ |
| TRINITY | 0.470 | $[0.2026]$ | 0.572 | $[0.1858]$ | 0.598 | $[0.1321]$ | 0.600 | $[0.1188]$ | 0.556 | $[0.1331]$ |
| TULARE | 0.493 | $[0.1238]$ | 0.469 | $[0.101]$ | 0.571 | $[0.0991]$ | 0.520 | $[0.086]$ | 0.370 | $[0.0717]$ |
| TUOLUMNE | 0.480 | $[0.1837]$ | 0.619 | $[0.1911]$ | 0.603 | $[0.1331]$ | 0.619 | $[0.123]$ | 0.540 | $[0.1433]$ |
| VENTURA | 0.504 | $[0.1681]$ | 0.662 | $[0.1189]$ | 0.649 | $[0.1104]$ | 0.690 | $[0.0929]$ | 0.725 | $[0.1026]$ |
| YOLO | 0.513 | $[0.1362]$ | 0.669 | $[0.1317]$ | 0.636 | $[0.1091]$ | 0.600 | $[0.1107]$ | 0.564 | $[0.0945]$ |
| YUBA | 0.423 | $[0.2408]$ | 0.410 | $[0.1855]$ | 0.545 | $[0.1495]$ | 0.526 | $[0.1429]$ | 0.364 | $[0.1488]$ |

Note: The stardard error for each estimate is shown in brackets.

|  | Whites |  |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | 90 |  |  |  |  |  |  |  |  |
| ALAMEDA | 0.831 | [ 0.0590] | 0.902 | [0.0433] | 0.835 | [0.0744] | 0.899 | [ 0.0430] | 0.832 | [0.0506] |
| ALPINE | 0.866 | [0.0391] | 0.886 | [0.0365] | 0.983 | [0.0094] | 0.929 | [ 0.0338] | 0.911 | [0.0427] |
| AMADOR | 0.823 | [ 0.0213] | 0.818 | [0.0258] | 0.738 | [0.0302] | 0.851 | [0.0254] | 0.783 | [0.0273] |
| BUTTE | 0.765 | [ 0.0184] | 0.841 | [0.0201] | 0.796 | [ 0.0210] | 0.882 | [ 0.0213] | 0.862 | [0.024] |
| CALAVERAS | 0.802 | [0.0094] | 0.820 | [0.0124] | 0.820 | [0.0116] | 0.873 | [0.0132] | 0.840 | [0.0145] |
| COLUSA | 0.832 | [ 0.0515] | 0.858 | [0.0348] | 0.801 | [ 0.0574] | 0.863 | [ 0.0443] | 0.810 | [0.061] |
| CONTRA COSTA | 0.865 | [ 0.0427] | 0.917 | [0.0345] | 0.864 | [0.0473] | 0.942 | [ 0.0292] | 0.839 | [0.0547] |
| DEL NORTE | 0.810 | [ 0.0258 ] | 0.814 | [ 0.0328] | 0.684 | [0.0569] | 0.843 | [0.0324] | 0.774 | [0.0418] |
| EL DORADO | 0.835 | [0.0126] | 0.867 | [0.0153] | 0.826 | [0.0183] | 0.878 | [ 0.0165] | 0.842 | [0.0202] |
| FRESNO | 0.824 | [ 0.0520] | 0.851 | [0.0496] | 0.821 | [0.0663] | 0.868 | [ 0.0460] | 0.815 | [0.0584] |
| GLENN | 0.762 | [0.0360] | 0.786 | [0.0411] | 0.737 | [0.0552] | 0.828 | [0.0440] | 0.781 | [0.052] |


| County | 1990 |  | 1992 |  | 1994 |  | 1996 |  | 1998 |  |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| HUMBOLDT | 0.842 | $[0.0162]$ | 0.882 | $[0.0175]$ | 0.876 | $[0.0230]$ | 0.986 | $[0.0081]$ | 0.864 | $[0.0225]$ |
| IMPERIAL | 0.809 | $[0.0616]$ | 0.843 | $[0.0563]$ | 0.801 | $[0.0653]$ | 0.869 | $[0.0522]$ | 0.828 | $[0.0758]$ |
| INYO | 0.839 | $[0.0248]$ | 0.832 | $[0.0260]$ | 0.781 | $[0.0348]$ | 0.840 | $[0.0322]$ | 0.806 | $[0.0366]$ |
| KERN | 0.792 | $[0.0425]$ | 0.813 | $[0.0456]$ | 0.780 | $[0.0629]$ | 0.854 | $[0.0491]$ | 0.822 | $[0.0535]$ |
| KINGS | 0.745 | $[0.0690]$ | 0.789 | $[0.0587]$ | 0.728 | $[0.0819]$ | 0.856 | $[0.0527]$ | 0.826 | $[0.0522]$ |
| LAKE | 0.729 | $[0.0199]$ | 0.777 | $[0.0201]$ | 0.739 | $[0.0215]$ | 0.799 | $[0.0248]$ | 0.760 | $[0.0265]$ |
| LASSEN | 0.771 | $[0.0271]$ | 0.823 | $[0.0313]$ | 0.622 | $[0.0502]$ | 0.822 | $[0.0381]$ | 0.806 | $[0.0457]$ |
| LOS ANGELES | 0.816 | $[0.0654]$ | 0.854 | $[0.0462]$ | 0.818 | $[0.0657]$ | 0.885 | $[0.0491]$ | 0.836 | $[0.0639]$ |
| MADERA | 0.767 | $[0.0578]$ | 0.838 | $[0.0398]$ | 0.802 | $[0.0681]$ | 0.856 | $[0.0476]$ | 0.812 | $[0.0556]$ |
| MARIN | 0.876 | $[0.0236]$ | 0.932 | $[0.0213]$ | 0.849 | $[0.0296]$ | 0.899 | $[0.0213]$ | 0.853 | $[0.0329]$ |
| MARIPOSA | 0.853 | $[0.0157]$ | 0.877 | $[0.0143]$ | 0.854 | $[0.0161]$ | 0.885 | $[0.0156]$ | 0.903 | $[0.016]$ |
| MENDOCINO | 0.806 | $[0.0199]$ | 0.856 | $[0.0227]$ | 0.832 | $[0.0272]$ | 0.866 | $[0.0238]$ | 0.825 | $[0.032]$ |
| MERCED | 0.786 | $[0.0613]$ | 0.825 | $[0.0579]$ | 0.794 | $[0.0641]$ | 0.854 | $[0.0499]$ | 0.845 | $[0.057]$ |
| MODOC | 0.849 | $[0.0153]$ | 0.882 | $[0.0169]$ | 0.833 | $[0.0223]$ | 0.891 | $[0.0187]$ | 0.857 | $[0.0244]$ |
| MONO | 0.778 | $[0.0245]$ | 0.835 | $[0.0237]$ | 0.759 | $[0.0311]$ | 0.849 | $[0.0253]$ | 0.822 | $[0.0341]$ |
| MONTEREY | 0.787 | $[0.0604]$ | 0.847 | $[0.0491]$ | 0.797 | $[0.0680]$ | 0.877 | $[0.0417]$ | 0.803 | $[0.0655]$ |
| NAPA | 0.822 | $[0.0235]$ | 0.861 | $[0.0278]$ | 0.837 | $[0.0365]$ | 0.866 | $[0.0287]$ | 0.818 | $[0.0367]$ |
| NEVADA | 0.834 | $[0.0090]$ | 0.896 | $[0.0089]$ | 0.867 | $[0.0098]$ | 0.914 | $[0.0090]$ | 0.853 | $[0.0105]$ |
| ORANGE | 0.804 | $[0.0447]$ | 0.869 | $[0.0382]$ | 0.799 | $[0.0539]$ | 0.875 | $[0.0407]$ | 0.817 | $[0.0616]$ |
| PLACER | 0.790 | $[0.0173]$ | 0.870 | $[0.0183]$ | 0.849 | $[0.0167]$ | 0.899 | $[0.0164]$ | 0.879 | $[0.0192]$ |
| PLUMAS | 0.801 | $[0.0101]$ | 0.847 | $[0.0133]$ | 0.810 | $[0.0180]$ | 0.906 | $[0.0130]$ | 0.858 | $[0.0148]$ |
| RIVERSIDE | 0.766 | $[0.0503]$ | 0.834 | $[0.0402]$ | 0.759 | $[0.0634]$ | 0.850 | $[0.0481]$ | 0.791 | $[0.0629]$ |
| SACRAMENTO | 0.840 | $[0.0419]$ | 0.891 | $[0.0362]$ | 0.833 | $[0.0533]$ | 0.872 | $[0.0336]$ | 0.832 | $[0.0404]$ |
| SAN BENITO | 0.809 | $[0.0475]$ | 0.856 | $[0.0510]$ | 0.822 | $[0.0632]$ | 0.886 | $[0.0429]$ | 0.868 | $[0.0578]$ |
| SAN BERNARDINO | 0.792 | $[0.0588]$ | 0.834 | $[0.0442]$ | 0.781 | $[0.0672]$ | 0.869 | $[0.0489]$ | 0.803 | $[0.0671]$ |
| SAN DIEGO | 0.803 | $[0.0421]$ | 0.871 | $[0.0351]$ | 0.815 | $[0.0569]$ | 0.870 | $[0.0384]$ | 0.825 | $[0.0531]$ |


| County | 1990 |  | 1992 |  | 1994 |  | 1996 |  | 1998 |  |
| :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- |
| SAN FRANCISCO | 0.880 | $[0.0639]$ | 0.960 | $[0.0205]$ | 0.873 | $[0.0555]$ | 0.928 | $[0.0354]$ | 0.860 | $[0.064]$ |
| SAN JOAQUIN | 0.796 | $[0.0525]$ | 0.851 | $[0.0430]$ | 0.799 | $[0.0621]$ | 0.876 | $[0.0438]$ | 0.811 | $[0.0618]$ |
| SAN LUIS OBISPO | 0.794 | $[0.0212]$ | 0.852 | $[0.0245]$ | 0.800 | $[0.0348]$ | 0.868 | $[0.0279]$ | 0.829 | $[0.0359]$ |
| SAN MATEO | 0.831 | $[0.0440]$ | 0.863 | $[0.0429]$ | 0.823 | $[0.0649]$ | 0.869 | $[0.0425]$ | 0.823 | $[0.057]$ |
| SANTA BARBARA | 0.806 | $[0.0415]$ | 0.883 | $[0.0360]$ | 0.871 | $[0.0462]$ | 0.931 | $[0.0326]$ | 0.879 | $[0.0545]$ |
| SANTA CLARA | 0.836 | $[0.0512]$ | 0.892 | $[0.0438]$ | 0.832 | $[0.0640]$ | 0.877 | $[0.0468]$ | 0.814 | $[0.0669]$ |
| SANTA CRUZ | 0.874 | $[0.0354]$ | 0.951 | $[0.0223]$ | 0.898 | $[0.0381]$ | 0.931 | $[0.0274]$ | 0.868 | $[0.0436]$ |
| SHASTA | 0.716 | $[0.0154]$ | 0.777 | $[0.0150]$ | 0.759 | $[0.0176]$ | 0.829 | $[0.0171]$ | 0.722 | $[0.0185]$ |
| SIERRA | 0.892 | $[0.0112]$ | 0.930 | $[0.0123]$ | 0.892 | $[0.0114]$ | 0.899 | $[0.0119]$ | 0.891 | $[0.0134]$ |
| SISKIYOU | 0.787 | $[0.0165]$ | 0.843 | $[0.0179]$ | 0.805 | $[0.0217]$ | 0.858 | $[0.0191]$ | 0.819 | $[0.0233]$ |
| SOLANO | 0.781 | $[0.0508]$ | 0.846 | $[0.0507]$ | 0.773 | $[0.0684]$ | 0.874 | $[0.0476]$ | 0.838 | $[0.0562]$ |
| SONOMA | 0.834 | $[0.0212]$ | 0.888 | $[0.0239]$ | 0.867 | $[0.0278]$ | 0.870 | $[0.0238]$ | 0.803 | $[0.0304]$ |
| STANISLAUS | 0.753 | $[0.0443]$ | 0.819 | $[0.0408]$ | 0.764 | $[0.0615]$ | 0.838 | $[0.0452]$ | 0.823 | $[0.0462]$ |
| SUTTER | 0.776 | $[0.0400]$ | 0.862 | $[0.0339]$ | 0.819 | $[0.0502]$ | 0.875 | $[0.0362]$ | 0.829 | $[0.0498]$ |
| TEHAMA | 0.728 | $[0.0205]$ | 0.781 | $[0.0215]$ | 0.744 | $[0.0259]$ | 0.819 | $[0.0257]$ | 0.745 | $[0.0288]$ |
| TRINITY | 0.873 | $[0.0119]$ | 0.895 | $[0.0138]$ | 0.849 | $[0.0144]$ | 0.905 | $[0.0124]$ | 0.904 | $[0.0146]$ |
| TULARE | 0.769 | $[0.0656]$ | 0.809 | $[0.0528]$ | 0.762 | $[0.0651]$ | 0.849 | $[0.0554]$ | 0.793 | $[0.0679]$ |
| TUOLUMNE | 0.889 | $[0.0207]$ | 0.908 | $[0.0164]$ | 0.780 | $[0.0222]$ | 0.907 | $[0.0175]$ | 0.879 | $[0.0199]$ |
| VENTURA | 0.813 | $[0.0424]$ | 0.886 | $[0.0395]$ | 0.835 | $[0.0513]$ | 0.907 | $[0.0354]$ | 0.886 | $[0.0468]$ |
| YOLO | 0.808 | $[0.0378]$ | 0.892 | $[0.0377]$ | 0.851 | $[0.0488]$ | 0.880 | $[0.0363]$ | 0.853 | $[0.0495]$ |
| YUBA | 0.651 | $[0.0569]$ | 0.720 | $[0.0565]$ | 0.693 | $[0.0611]$ | 0.811 | $[0.0467]$ | 0.756 | $[0.0568]$ |

Note: The stardard error for each estimate is shown in brackets.
Table A5 Appendix: Latino and White Voter Turnout 1990-1998

|  | Latinos |  |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| County | 1990 |  | 1992 |  | 1994 |  | 1996 |  | 1998 |  |
| ALAMEDA | 0.1502 | [0.1193] | 0.4778 | [0.1234] | 0.3665 | [0.1583] | 0.4387 | [0.13] | 0.3307 | [0.1241] |
| ALPINE | 0.2872 | [0.1443] | 0.6213 | [0.0927] | 0.5165 | [0.1603] | 0.5491 | [0.1209] | 0.4174 | [0.1421] |
| AMADOR | 0.3495 | [0.1634] | 0.6238 | [0.1061] | 0.4653 | [0.1466] | 0.5311 | [0.121] | 0.4238 | [0.1225] |
| BUTTE | 0.2147 | [0.1268] | 0.5535 | [0.1004] | 0.4202 | [0.15] | 0.4832 | [0.1186] | 0.3365 | [0.1508] |
| CALAVERAS | 0.31 | [0.1552] | 0.5861 | [0.0942] | 0.4583 | [0.1494] | 0.5123 | [0.1198] | 0.3995 | [0.1237] |
| COLUSA | 0.5347 | [0.0803] | 0.6778 | [0.0672] | 0.6262 | [0.1026] | 0.6631 | [0.1] | 0.5531 | [0.0932] |
| CONTRA COSTA | 0.1809 | [0.1356] | 0.5313 | [0.0986] | 0.3728 | [0.1721] | 0.4648 | [0.1067] | 0.3875 | [0.1432] |
| DEL NORTE | 0.2087 | [0.1407] | 0.5555 | [0.0972] | 0.4043 | [0.1411] | 0.5003 | [0.1064] | 0.3561 | [0.1224] |
| EL DORADO | 0.2577 | [0.1428] | 0.576 | [0.0826] | 0.4483 | [0.1443] | 0.5206 | [0.1006] | 0.4132 | [0.1391] |
| FRESNO | 0.2176 | [0.061] | 0.5555 | [0.0584] | 0.4125 | [0.0926] | 0.5062 | [0.074] | 0.3832 | [0.0751] |
| GLENN | 0.4294 | [0.13] | 0.6198 | [0.0740] | 0.5488 | [0.1356] | 0.58 | [0.0965] | 0.4609 | [0.1095] |
| HUMBOLDT | 0.3076 | [0.1793] | 0.5424 | [0.1180] | 0.4175 | [0.1688] | 0.4877 | [0.1063] | 0.3912 | [0.1281] |
| IMPERIAL | 0.4308 | [0.0191] | 0.6202 | [0.0223] | 0.5338 | [0.0284] | 0.5509 | [0.0259] | 0.4827 | [0.0266] |
| INYO | 0.3501 | [0.1646] | 0.5702 | [0.0835] | 0.453 | [0.1547] | 0.5274 | [0.1122] | 0.4291 | [0.1305] |
| KERN | 0.1509 | [0.0991] | 0.5487 | [0.0616] | 0.4028 | [0.1142] | 0.4532 | [0.0957] | 0.2882 | [0.1158] |
| KINGS | 0.2679 | [0.0768] | 0.5476 | [0.0606] | 0.4256 | [0.0985] | 0.4756 | [0.0798] | 0.3323 | [0.0841] |
| LAKE | 0.2827 | [0.1433] | 0.5643 | [0.0843] | 0.4442 | [0.1486] | 0.4744 | [0.1164] | 0.3848 | [0.1259] |
| LASSEN | 0.4981 | [0.1904] | 0.6098 | [0.0800] | 0.4602 | [0.1237] | 0.5183 | [0.0875] | 0.3548 | [0.1202] |
| LOS ANGELES | 0.2811 | [0.0621] | 0.6147 | [0.0463] | 0.4383 | [0.0769] | 0.528 | [0.0611] | 0.3736 | [0.0613] |
| MADERA | 0.3099 | [0.0765] | 0.5385 | [0.0600] | 0.4422 | [0.0914] | 0.5114 | [0.0708] | 0.4079 | [0.0749] |
| MARIN | 0.3452 | [0.1758] | 0.6068 | [0.0991] | 0.4549 | [0.1355] | 0.5398 | [0.0907] | 0.4274 | [0.1159] |
| MARIPOSA | 0.2997 | [0.1398] | 0.5643 | [0.0910] | 0.4594 | [0.1426] | 0.5205 | [0.1211] | 0.4032 | [0.1269] |
| MENDOCINO | 0.2992 | [0.1652] | 0.5566 | [0.0971] | 0.4427 | [0.1227] | 0.4953 | [0.1103] | 0.3916 | [0.1217] |
| MERCED | 0.2052 | [0.079] | 0.5365 | [0.0620] | 0.3378 | [0.1294] | 0.4828 | [0.0668] | 0.2857 | [0.1148] |


| County | 1990 |  | 1992 |  | 1994 |  | 1996 |  | 1998 |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| MODOC | 0.2915 | [0.1319] | 0.5485 | [0.1161] | 0.433 | [0.1435] | 0.509 | [0.12] | 0.3714 | [0.1348] |
| MONO | 0.1575 | [0.1108] | 0.5528 | [0.1039] | 0.4282 | [0.1606] | 0.5279 | [0.1232] | 0.3968 | [0.1245] |
| MONTEREY | 0.3506 | [0.0565] | 0.5679 | [0.0571] | 0.4529 | [0.0922] | 0.5387 | [0.0665] | 0.4767 | [0.0699] |
| NAPA | 0.3496 | [0.1178] | 0.6191 | [0.0874] | 0.4367 | [0.1474] | 0.5481 | [0.1056] | 0.438 | [0.119] |
| NEVADA | 0.3224 | [0.1582] | 0.56 | [0.0940] | 0.4408 | [0.1661] | 0.5051 | [0.085] | 0.3926 | [0.1346] |
| ORANGE | 0.3134 | [0.0969] | 0.5985 | [0.0637] | 0.4786 | [0.1107] | 0.5305 | [0.0761] | 0.4149 | [0.1037] |
| PLACER | 0.2827 | [0.1465] | 0.5826 | [0.0781] | 0.418 | [0.1514] | 0.5161 | [0.1177] | 0.4047 | [0.1352] |
| PLUMAS | 0.3569 | [0.1676] | 0.585 | [0.0967] | 0.4671 | [0.1723] | 0.5115 | [0.1064] | 0.3929 | [0.1303] |
| RIVERSIDE | 0.1818 | [0.1001] | 0.5389 | [0.0728] | 0.4057 | [0.1133] | 0.4502 | [0.103] | 0.3653 | [0.1011] |
| SACRAMENTO | 0.1824 | [0.1299] | 0.4819 | [0.1366] | 0.3868 | [0.1397] | 0.4871 | [0.1076] | 0.3839 | [0.1308] |
| SAN BENITO | 0.4815 | [0.0463] | 0.6364 | [0.0390] | 0.5654 | [0.0702] | 0.5731 | [0.0579] | 0.4199 | [0.0619] |
| SAN BERNARDINO | 0.1053 | [0.0852] | 0.4964 | [0.0900] | 0.3241 | [0.147] | 0.411 | [0.1147] | 0.298 | [0.1146] |
| SAN DIEGO | 0.1769 | [0.1115] | 0.5092 | [0.0968] | 0.3697 | [0.1465] | 0.4961 | [0.1074] | 0.3724 | [0.1063] |
| SAN FRANCISCO | 0.1528 | [0.1266] | 0.4458 | [0.1571] | 0.3531 | [0.1528] | 0.4566 | [0.1113] | 0.3524 | [0.122] |
| SAN JOAQUIN | 0.1604 | [0.0946] | 0.4977 | [0.0951] | 0.3507 | [0.1532] | 0.4211 | [0.1165] | 0.3574 | [0.1051] |
| SAN LUIS OBISPO | 0.2151 | [0.107] | 0.6148 | [0.0843] | 0.4529 | [0.128] | 0.5401 | [0.113] | 0.4194 | [0.1507] |
| SAN MATEO | 0.2348 | [0.119] | 0.6067 | [0.0765] | 0.413 | [0.1375] | 0.5333 | [0.1062] | 0.4408 | [0.1051] |
| SANTA BARBARA | 0.3647 | [0.0902] | 0.6016 | [0.0502] | 0.4263 | [0.117] | 0.49 | [0.081] | 0.3435 | [0.097] |
| SANTA CLARA | 0.2177 | [0.1079] | 0.5269 | [0.0543] | 0.3709 | [0.1463] | 0.5081 | [0.0896] | 0.3687 | [0.1154] |
| SANTA CRUZ | 0.3071 | [0.1174] | 0.5707 | [0.0701] | 0.4571 | [0.1311] | 0.5162 | [0.1012] | 0.402 | [0.1241] |
| SHASTA | 0.2491 | [0.1393] | 0.5523 | [0.1028] | 0.4415 | [0.1525] | 0.519 | [0.1079] | 0.4008 | [0.1293] |
| SIERRA | 0.3159 | [0.1619] | 0.5662 | [0.0858] | 0.4439 | [0.1564] | 0.5213 | [0.096] | 0.4329 | [0.1399] |
| SISKIYOU | 0.2979 | [0.1466] | 0.5845 | [0.0790] | 0.4633 | [0.1372] | 0.5158 | [0.1026] | 0.3936 | [0.1168] |
| SOLANO | 0.1421 | [0.1096] | 0.5507 | [0.1025] | 0.3714 | [0.1684] | 0.4904 | [0.1074] | 0.3339 | [0.1249] |
| SONOMA | 0.2485 | [0.1347] | 0.5807 | [0.0843] | 0.4287 | [0.125] | 0.533 | [0.1061] | 0.4135 | [0.1314] |
| STANISLAUS | 0.2066 | [0.1021] | 0.5163 | [0.0952] | 0.3897 | [0.1374] | 0.4681 | [0.1083] | 0.2862 | [0.1381] |


| County | 1990 |  | 1992 |  | 1994 |  | 1996 |  | 1998 |  |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| SUTTER | 0.359 | $[0.129]$ | 0.5479 | $[0.0789]$ | 0.4521 | $[0.1318]$ | 0.4964 | $[0.1038]$ | 0.3862 | $[0.1126]$ |
| TEHAMA | 0.3334 | $[0.1405]$ | 0.5805 | $[0.0906]$ | 0.4756 | $[0.1465]$ | 0.5154 | $[0.109]$ | 0.4216 | $[0.1147]$ |
| TRINITY | 0.2899 | $[0.1489]$ | 0.5645 | $[0.0998]$ | 0.4503 | $[0.16]$ | 0.4953 | $[0.1109]$ | 0.3603 | $[0.1399]$ |
| TULARE | 0.3385 | $[0.0603]$ | 0.5802 | $[0.0419]$ | 0.4894 | $[0.0688]$ | 0.5109 | $[0.0571]$ | 0.4847 | $[0.0654]$ |
| TUOLUMNE | 0.3595 | $[0.1557]$ | 0.5585 | $[0.0967]$ | 0.4325 | $[0.1438]$ | 0.5015 | $[0.1151]$ | 0.4211 | $[0.1264]$ |
| VENTURA | 0.2934 | $[0.0925]$ | 0.5853 | $[0.0677]$ | 0.449 | $[0.1159]$ | 0.5094 | $[0.0767]$ | 0.3268 | $[0.1111]$ |
| YOLO | 0.2699 | $[0.1097]$ | 0.5337 | $[0.0948]$ | 0.3919 | $[0.1362]$ | 0.5245 | $[0.0866]$ | 0.3986 | $[0.1164]$ |
| YUBA | 0.1543 | $[0.1313]$ | 0.5116 | $[0.1040]$ | 0.3722 | $[0.1579]$ | 0.4432 | $[0.1346]$ | 0.3357 | $[0.1339]$ |

Note: The stardard error for each estimate is shown in brackets.

|  | Whites |  |  |  |  |  |  |  |  |  |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| County | 1990 |  | 1992 |  | 1994 |  | 1996 |  | 1998 |  |
| ALAMEDA | 0.7487 | $[0.0347]$ | 0.8492 | $[0.0192]$ | 0.739 | $[0.045]$ | 0.7382 | $[0.0478]$ | 0.6842 | $[0.0476]$ |
| ALPINE | 0.7875 | $[0.0278]$ | 0.8754 | $[0.0302]$ | 0.8526 | $[0.0472]$ | 0.8457 | $[0.0482]$ | 0.8311 | $[0.0352]$ |
| AMADOR | 0.7663 | $[0.0129]$ | 0.8881 | $[0.0218]$ | 0.7728 | $[0.0231]$ | 0.8107 | $[0.0143]$ | 0.7922 | $[0.0138]$ |
| BUTTE | 0.7051 | $[0.0119]$ | 0.8313 | $[0.0150]$ | 0.6796 | $[0.0207]$ | 0.6898 | $[0.0192]$ | 0.5681 | $[0.0169]$ |
| CALAVERAS | 0.7566 | $[0.0063]$ | 0.8609 | $[0.0078]$ | 0.7708 | $[0.0139]$ | 0.7809 | $[0.0082]$ | 0.7178 | $[0.0089]$ |
| COLUSA | 0.7934 | $[0.0348]$ | 0.8662 | $[0.0235]$ | 0.7822 | $[0.0448]$ | 0.8465 | $[0.0601]$ | 0.8062 | $[0.0562]$ |
| CONTRA COSTA | 0.7243 | $[0.0204]$ | 0.8492 | $[0.0168]$ | 0.7225 | $[0.0344]$ | 0.7234 | $[0.0358]$ | 0.7157 | $[0.0292]$ |
| DEL NORTE | 0.7121 | $[0.0199]$ | 0.85 | $[0.0147]$ | 0.717 | $[0.0301]$ | 0.7468 | $[0.0189]$ | 0.6527 | $[0.0187]$ |
| EL DORADO | 0.7022 | $[0.01]$ | 0.8512 | $[0.0106]$ | 0.7245 | $[0.0156]$ | 0.7751 | $[0.0112]$ | 0.7041 | $[0.0113]$ |
| FRESNO | 0.7241 | $[0.0329]$ | 0.8511 | $[0.0204]$ | 0.7336 | $[0.0371]$ | 0.7698 | $[0.0496]$ | 0.6899 | $[0.0469]$ |
| GLENN | 0.7824 | $[0.0229]$ | 0.8668 | $[0.0195]$ | 0.7928 | $[0.0438]$ | 0.8274 | $[0.0322]$ | 0.7563 | $[0.0311]$ |
| HUMBOLDT | 0.7535 | $[0.0082]$ | 0.836 | $[0.0143]$ | 0.6746 | $[0.0196]$ | 0.6612 | $[0.0168]$ | 0.645 | $[0.0115]$ |
| IMPERIAL | 0.7622 | $[0.0435]$ | 0.8523 | $[0.0205]$ | 0.7365 | $[0.0536]$ | 0.7656 | $[0.0478]$ | 0.7242 | $[0.0636]$ |


| County | 1990 |  | 1992 |  | 1994 |  | 1996 |  | 1998 |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| INYO | 0.7723 | [0.0149] | 0.8603 | [0.0152] | 0.7731 | [0.0256] | 0.7983 | [0.024] | 0.7521 | [0.0191] |
| KERN | 0.6904 | [0.0412] | 0.8462 | [0.0222] | 0.7201 | [0.0385] | 0.7179 | [0.0395] | 0.5961 | [0.0577] |
| KINGS | 0.7293 | [0.0263] | 0.8517 | [0.0211] | 0.7355 | [0.0408] | 0.7329 | [0.0481] | 0.6464 | [0.0552] |
| LAKE | 0.7272 | [0.0093] | 0.8479 | [0.0099] | 0.7276 | [0.0202] | 0.7608 | [0.012] | 0.6703 | [0.0118] |
| LASSEN | 0.826 | [0.0285] | 0.8734 | [0.0194] | 0.7649 | [0.0224] | 0.7952 | [0.0296] | 0.6519 | [0.0264] |
| LOS ANGELES | 0.7538 | [0.0268] | 0.8614 | [0.0261] | 0.7405 | [0.0419] | 0.7759 | [0.0536] | 0.6879 | [0.0702] |
| MADERA | 0.7289 | [0.0299] | 0.8468 | [0.0224] | 0.73 | [0.0404] | 0.76 | [0.0333] | 0.6856 | [0.043] |
| MARIN | 0.7638 | [0.0115] | 0.8818 | [0.0212] | 0.7783 | [0.0234] | 0.8348 | [0.0209] | 0.7893 | [0.0173] |
| MARIPOSA | 0.7477 | [0.0083] | 0.859 | [0.0106] | 0.7529 | [0.0149] | 0.7907 | [0.0101] | 0.6964 | [0.009] |
| MENDOCINO | 0.7442 | [0.0126] | 0.8443 | [0.0135] | 0.724 | [0.0208] | 0.741 | [0.0207] | 0.6769 | [0.0161] |
| MERCED | 0.7209 | [0.0356] | 0.8497 | [0.0218] | 0.7195 | [0.0448] | 0.744 | [0.041 | 0.5918 | [0.0747] |
| MODOC | 0.7371 | [0.0099] | 0.8346 | [0.0145] | 0.7291 | [0.0182] | 0.7657 | [0.0136] | 0.6414 | [0.0138] |
| MONO | 0.6749 | [0.0217] | 0.8428 | [0.0139] | 0.7209 | [0.0212] | 0.7861 | [0.018] | 0.6534 | [0.0173] |
| MONTEREY | 0.7553 | [0.0321] | 0.8533 | [0.0207] | 0.7327 | [0.0409] | 0.7803 | [0.0381] | 0.7699 | [0.0569] |
| NAPA | 0.7544 | [0.0141] | 0.8737 | [0.0233] | 0.7301 | [0.0287] | 0.798 | [0.0251] | 0.7454 | [0.0214] |
| NEVADA | 0.7409 | [0.0046] | 0.8467 | [0.0062] | 0.7319 | [0.0102] | 0.7666 | [0.0064] | 0.7102 | [0.0058] |
| ORANGE | 0.7483 | [0.0235] | 0.8619 | [0.022] | 0.7459 | [0.0418] | 0.7745 | [0.0358] | 0.7296 | [0.0433] |
| PLACER | 0.7259 | [0.0118] | 0.8534 | [0.0089] | 0.7165 | [0.0174] | 0.7585 | [0.0111] | 0.6888 | [0.0105] |
| PLUMAS | 0.7709 | [0.0066] | 0.8637 | [0.0088] | 0.7507 | [0.0155] | 0.7779 | [0.0104] | 0.7188 | [0.0087] |
| RIVERSIDE | 0.6989 | [0.0323] | 0.8458 | [0.0238] | 0.7324 | [0.0407] | 0.7207 | [0.0422] | 0.66 | [0.0395] |
| SACRAMENTO | 0.728 | [0.0221] | 0.8415 | [0.0219] | 0.7176 | [0.0325] | 0.7476 | [0.0291] | 0.7021 | [0.0343] |
| SAN BENITO | 0.774 | [0.0355] | 0.8538 | [0.0198] | 0.7482 | [0.046] | 0.7879 | [0.0453] | 0.6799 | [0.0446] |
| SAN BERNARDINO | 0.6805 | [0.0448] | 0.8426 | [0.0229] | 0.7013 | [0.0478] | 0.6864 | [0.0589] | 0.6122 | [0.0603] |
| SAN DIEGO | 0.7091 | [0.0304] | 0.8415 | [0.0212] | 0.7159 | [0.039] | 0.7454 | [0.0396] | 0.6751 | [0.044] |
| SAN FRANCISCO | 0.7618 | [0.0322] | 0.848 | [0.0216] | 0.7297 | [0.0447] | 0.7566 | [0.044] | 0.7012 | [0.05] |
| SAN JOAQUIN | 0.7267 | [0.0297] | 0.8508 | [0.0198] | 0.7165 | [0.041 | 0.7094 | 0.0507] | 0.6789 | [0.0499] |


| County | 1990 |  | 1992 |  | 1994 |  | 1996 |  | 1998 |  |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| SAN LUIS OBISPO | 0.705 | $[0.0182]$ | 0.8647 | $[0.0155]$ | 0.7387 | $[0.0234]$ | 0.8027 | $[0.0245]$ | 0.708 | $[0.0171]$ |
| SAN MATEO | 0.7579 | $[0.0299]$ | 0.8628 | $[0.0216]$ | 0.7409 | $[0.037]$ | 0.8061 | $[0.0469]$ | 0.7704 | $[0.0469]$ |
| SANTA BARBARA | 0.7486 | $[0.0244]$ | 0.8592 | $[0.0206]$ | 0.7277 | $[0.0371]$ | 0.7327 | $[0.0362]$ | 0.6433 | $[0.0435]$ |
| SANTA CLARA | 0.7448 | $[0.0254]$ | 0.851 | $[0.0211]$ | 0.7334 | $[0.0393]$ | 0.7643 | $[0.0384]$ | 0.7319 | $[0.0523]$ |
| SANTA CRUZ | 0.7325 | $[0.0175]$ | 0.8517 | $[0.0175]$ | 0.7344 | $[0.0316]$ | 0.7648 | $[0.0274]$ | 0.6989 | $[0.0248]$ |
| SHASTA | 0.7087 | $[0.0078]$ | 0.8434 | $[0.0084]$ | 0.6932 | $[0.0135]$ | 0.7128 | $[0.0104]$ | 0.6772 | $[0.0089]$ |
| SIERRA | 0.755 | $[0.0074]$ | 0.8434 | $[0.0082]$ | 0.7585 | $[0.0105]$ | 0.7704 | $[0.0082]$ | 0.82 | $[0.0065]$ |
| SISKIYOU | 0.7498 | $[0.0098]$ | 0.8625 | $[0.012]$ | 0.7877 | $[0.02$ | 0.789 | $[0.015]$ | 0.6989 | $[0.0126]$ |
| SOLANO | 0.7276 | $[0.0292]$ | 0.858 | $[0.0209]$ | 0.7282 | $[0.0418]$ | 0.7571 | $[0.0361]$ | 0.6554 | $[0.0463]$ |
| SONOMA | 0.7161 | $[0.014]$ | 0.8565 | $[0.0145]$ | 0.7132 | $[0.0247]$ | 0.7764 | $[0.0181]$ | 0.7443 | $[0.0173]$ |
| STANISLAUS | 0.7035 | $[0.0295]$ | 0.8349 | $[0.0221]$ | 0.7074 | $[0.0384]$ | 0.7267 | $[0.0366]$ | 0.5878 | $[0.0411]$ |
| SUTTER | 0.7756 | $[0.0222]$ | 0.8485 | $[0.0205]$ | 0.7377 | $[0.0328]$ | 0.7544 | $[0.0317]$ | 0.6789 | $[0.0262]$ |
| TEHAMA | 0.7437 | $[0.0112]$ | 0.8481 | $[0.0109]$ | 0.7442 | $[0.0188]$ | 0.745 | $[0.014]$ | 0.7527 | $[0.0151]$ |
| TRINITY | 0.7636 | $[0.0083]$ | 0.8499 | $[0.0091]$ | 0.7094 | $[0.0125]$ | 0.7296 | $[0.0096]$ | 0.6241 | $[0.0079]$ |
| TULARE | 0.74 | $[0.0295]$ | 0.8535 | $[0.0214]$ | 0.7479 | $[0.0391]$ | 0.7517 | $[0.0392]$ | 0.7489 | $[0.0465]$ |
| TUOLUMNE | 0.7821 | $[0.0131]$ | 0.853 | $[0.0113]$ | 0.7149 | $[0.0175]$ | 0.7613 | $[0.0138]$ | 0.707 | $[0.0102]$ |
| VENTURA | 0.7339 | $[0.0247]$ | 0.8551 | $[0.0194]$ | 0.7324 | $[0.0357]$ | 0.7466 | $[0.0309]$ | 0.6097 | $[0.0457]$ |
| YOLO | 0.7437 | $[0.0234]$ | 0.8462 | $[0.0211]$ | 0.73 | $[0.0344]$ | 0.7876 | $[0.0302]$ | 0.7029 | $[0.0356]$ |
| YUBA | 0.6951 | $[0.0262]$ | 0.8412 | $[0.0174]$ | 0.7001 | $[0.0358]$ | 0.674 | $[0.0438]$ | 0.591 | $[0.0349]$ |

Note: The stardard error for each estimate is shown in brackets.
Table A6 Appendix: Latino Voter Registration by Party, 1990-1998

|  | Democrat |  |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| County |  |  |  |  |  |  |  |  |  |  |
| ALAMEDA | 0.5878 | (0.0382) | 0.6989 | (0.0771) | 0.7799 | (0.0899) | 0.6591 | (0.1499) | 0.7861 | (0.0845) |
| ALPINE | 0.5735 | (0.0421) | 0.4934 | (0.0987) | 0.3449 | (0.0417) | 0.3121 | (0.1206) | 0.3308 | (0.0572) |
| AMADOR | 0.5803 | (0.0370) | 0.569 | (0.0777) | 0.5106 | (0.1017) | 0.426 | (0.1539) | 0.4736 | (0.0871) |
| BUTTE | 0.5799 | (0.0444) | 0.5401 | (0.0786) | 0.4697 | (0.0888) | 0.3977 | (0.1325) | 0.4127 | (0.0693) |
| CALAVERAS | 0.5728 | (0.0395) | 0.5421 | (0.0781) | 0.4677 | (0.0871) | 0.3923 | (0.1380) | 0.4134 | (0.0757) |
| COLUSA | 0.5753 | (0.0391) | 0.5431 | (0.0646) | 0.4962 | (0.0800) | 0.4304 | (0.1541) | 0.4671 | (0.0750) |
| CONTRA COSTA | 0.5812 | (0.0389) | 0.6065 | (0.0757) | 0.5879 | (0.0816) | 0.5228 | (0.1198) | 0.598 | (0.0744) |
| DEL NORTE | 0.5783 | (0.0385) | 0.5696 | (0.0819) | 0.5341 | (0.1188) | 0.428 | (0.1463) | 0.4694 | (0.1088) |
| EL DORADO | 0.5797 | (0.0358) | 0.5215 | (0.0888) | 0.415 | (0.0816) | 0.35 | (0.1370) | 0.3447 | (0.0769) |
| FRESNO | 0.582 | (0.0363) | 0.6147 | (0.0670) | 0.5864 | (0.0745) | 0.486 | (0.1581) | 0.5583 | (0.0812) |
| GLENN | 0.5774 | (0.0410) | 0.5607 | (0.0886) | 0.4563 | (0.1086) | 0.3942 | (0.1620) | 0.409 | (0.1023) |
| HUMBOLDT | 0.5848 | (0.0372) | 0.6261 | (0.0730) | 0.6008 | (0.0821) | 0.4969 | (0.1162) | 0.5188 | (0.0720) |
| IMPERIAL | 0.5793 | (0.0362) | 0.62 | (0.0631) | 0.6633 | (0.0797) | 0.5769 | (0.1467) | 0.6429 | (0.0580) |
| INYO | 0.577 | (0.0393) | 0.5154 | (0.1007) | 0.392 | (0.0938) | 0.3467 | (0.1399) | 0.3457 | (0.0874) |
| KERN | 0.5744 | (0.0391) | 0.5561 | (0.0903) | 0.4766 | (0.0952) | 0.4026 | (0.1536) | 0.4335 | (0.0811) |
| KINGS | 0.5868 | (0.0364) | 0.6224 | (0.1013) | 0.5952 | (0.1487) | 0.4489 | (0.1704) | 0.4882 | (0.0855) |
| LAKE | 0.5796 | (0.0377) | 0.6171 | (0.0678) | 0.6106 | (0.0952) | 0.5139 | (0.1588) | 0.6238 | (0.1026) |
| LASSEN | 0.5819 | (0.0388) | 0.5741 | (0.0726) | 0.5493 | (0.1146) | 0.4104 | (0.1578) | 0.4108 | (0.0947) |
| LOS ANGELES | 0.5816 | (0.0377) | 0.6336 | (0.0619) | 0.6635 | (0.0793) | 0.585 | (0.1417) | 0.6438 | (0.0529) |
| MADERA | 0.5776 | (0.0379) | 0.5967 | (0.0681) | 0.5575 | (0.0877) | 0.4336 | (0.1668) | 0.4499 | (0.0947) |
| MARIN | 0.5813 | (0.0382) | 0.616 | (0.0717) | 0.6203 | (0.0826) | 0.5465 | (0.1438) | 0.6241 | (0.0702) |
| MARIPOSA | 0.5791 | (0.0375) | 0.5368 | (0.0893) | 0.4476 | (0.0909) | 0.3792 | (0.1365) | 0.3844 | (0.0628) |
| MENDOCINO | 0.5793 | (0.0377) | 0.6363 | (0.0734) | 0.6356 | (0.0841) | 0.5331 | (0.1584) | 0.5952 | (0.0762) |


| County | 1990 |  | 1992 |  | 1994 |  | 1996 |  | 1998 |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| MERCED | 0.5847 | (0.0427) | 0.6337 | (0.0888) | 0.6111 | (0.0878) | 0.525 | (0.1950) | 0.6869 | (0.0586) |
| MODOC | 0.5802 | (0.0478) | 0.5429 | (0.0802) | 0.4601 | (0.0749) | 0.3924 | (0.1422) | 0.4027 | (0.0733) |
| MONO | 0.5682 | (0.0370) | 0.4516 | (0.0959) | 0.3227 | (0.0987) | 0.3024 | (0.1387) | 0.2749 | (0.0800) |
| MONTEREY | 0.5762 | (0.0370) | 0.5858 | (0.0716) | 0.5938 | (0.0973) | 0.5359 | (0.1328) | 0.6473 | (0.1063) |
| NAPA | 0.58 | (0.0375) | 0.6005 | (0.0706) | 0.5716 | (0.0728) | 0.4951 | (0.1511) | 0.5803 | (0.0819) |
| NEVADA | 0.5674 | (0.0440) | 0.482 | (0.0988) | 0.36 | (0.0873) | 0.3125 | (0.1276) | 0.3056 | (0.0680) |
| ORANGE | 0.5684 | (0.0307) | 0.4533 | (0.1054) | 0.3221 | (0.0931) | 0.3015 | (0.1377) | 0.2596 | (0.0958) |
| PLACER | 0.5742 | (0.0399) | 0.5061 | (0.0852) | 0.4026 | (0.0875) | 0.3288 | (0.1245) | 0.3234 | (0.0653) |
| PLUMAS | 0.5824 | (0.0387) | 0.5725 | (0.0730) | 0.5152 | (0.0880) | 0.4142 | (0.1319) | 0.4305 | (0.0688) |
| RIVERSIDE | 0.5733 | (0.0397) | 0.5425 | (0.0916) | 0.4593 | (0.1072) | 0.399 | (0.1604) | 0.4098 | (0.1261) |
| SACRAMENTO | 0.5817 | (0.0365) | 0.6236 | (0.0749) | 0.609 | (0.0847) | 0.5069 | (0.1573) | 0.5863 | (0.0868) |
| SAN BENITO | 0.5776 | (0.0365) | 0.5641 | (0.0539) | 0.5641 | (0.0653) | 0.5158 | (0.0955) | 0.496 | (0.0259) |
| SAN BERNARDINO | 0.5796 | (0.0451) | 0.5557 | (0.0846) | 0.4911 | (0.0994) | 0.4288 | (0.1434) | 0.5116 | (0.1129) |
| SAN DIEGO | 0.5721 | (0.0399) | 0.4887 | (0.1032) | 0.387 | (0.0849) | 0.3516 | (0.1461) | 0.3522 | (0.0970) |
| SAN FRANCISCO | 0.5859 | (0.0402) | 0.6646 | (0.0191) | 0.759 | (0.0654) | 0.6862 | (0.0945) | 0.7298 | (0.0555) |
| SAN JOAQUIN | 0.5842 | (0.0384) | 0.6244 | (0.0759) | 0.5977 | (0.0925) | 0.5069 | (0.1700) | 0.5957 | (0.1056) |
| SAN LUIS OBISPO | 0.5708 | (0.0421) | 0.5096 | (0.1035) | 0.4586 | (0.0864) | 0.3811 | (0.1400) | 0.3905 | (0.0779) |
| SAN MATEO | 0.582 | (0.0369) | 0.6228 | (0.0778) | 0.636 | (0.0945) | 0.5449 | (0.1687) | 0.6908 | (0.1083) |
| SANTA BARBARA | 0.5686 | (0.0414) | 0.4996 | (0.0654) | 0.4826 | (0.0562) | 0.4256 | (0.0567) | 0.4492 | (0.0342) |
| SANTA CLARA | 0.5795 | (0.0396) | 0.5809 | (0.0681) | 0.5662 | (0.0861) | 0.4957 | (0.1522) | 0.5925 | (0.1127) |
| SANTA CRUZ | 0.5864 | (0.0387) | 0.5975 | (0.0301) | 0.6503 | (0.0601) | 0.6059 | (0.1003) | 0.6407 | (0.0544) |
| SHASTA | 0.5704 | (0.0418) | 0.5277 | (0.0804) | 0.443 | (0.0945) | 0.3741 | (0.1487) | 0.362 | (0.1012) |
| SIERRA | 0.5772 | (0.0374) | 0.5639 | (0.0816) | 0.4789 | (0.0833) | 0.4067 | (0.1335) | 0.3939 | (0.0656) |
| SISKIYOU | 0.5818 | (0.0401) | 0.5902 | (0.0736) | 0.5396 | (0.0854) | 0.4444 | (0.1417) | 0.4825 | (0.0878) |
| SOLANO | 0.5827 | (0.0362) | 0.6482 | (0.0747) | 0.704 | (0.1134) | 0.5512 | (0.1778) | 0.6969 | (0.0890) |
| SONOMA | 0.5883 | (0.0389) | 0.6537 | (0.0805) | 0.679 | (0.0880) | 0.566 | (0.1578) | 0.685 | (0.0890) |


| County | 1990 |  | 1992 |  | 1994 |  | 1996 |  | 1998 |  |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| STANISLAUS | 0.5848 | $(0.0360)$ | 0.6328 | $(0.0820)$ | 0.639 | $(0.0991)$ | 0.5087 | $(0.1772)$ | 0.5931 | $(0.0839)$ |
| SUTTER | 0.5746 | $(0.0400)$ | 0.4966 | $(0.0966)$ | 0.3778 | $(0.0916)$ | 0.3478 | $(0.1412)$ | 0.3522 | $(0.0825)$ |
| TEHAMA | 0.5799 | $(0.0363)$ | 0.5803 | $(0.0766)$ | 0.5336 | $(0.1040)$ | 0.4405 | $(0.1493)$ | 0.4798 | $(0.1117)$ |
| TRINITY | 0.5787 | $(0.0368)$ | 0.5741 | $(0.0796)$ | 0.5089 | $(0.0891)$ | 0.4407 | $(0.1418)$ | 0.4655 | $(0.0649)$ |
| TULARE | 0.5776 | $(0.0379)$ | 0.5812 | $(0.0893)$ | 0.5102 | $(0.0997)$ | 0.4393 | $(0.1762)$ | 0.4883 | $(0.1359)$ |
| TUOLUMNE | 0.5786 | $(0.0372)$ | 0.5857 | $(0.0762)$ | 0.537 | $(0.0873)$ | 0.4417 | $(0.1320)$ | 0.4647 | $(0.0691)$ |
| VENTURA | 0.5741 | $(0.0450)$ | 0.48 | $(0.0636)$ | 0.4321 | $(0.0720)$ | 0.3827 | $(0.0969)$ | 0.4021 | $(0.0310)$ |
| YOLO | 0.5814 | $(0.0386)$ | 0.6419 | $(0.0646)$ | 0.6691 | $(0.0763)$ | 0.5809 | $(0.1569)$ | 0.6519 | $(0.0632)$ |
| YUBA | 0.5816 | $(0.0401)$ | 0.5712 | $(0.0819)$ | 0.4992 | $(0.1106)$ | 0.425 | $(0.1703)$ | 0.4642 | $(0.1393)$ |

Note: The stardard error for each estimate is shown in parentheses.

|  | Republican |  |  |  |  |  |  |  |  |  |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| County | 1990 |  | 1992 |  | 1994 |  | 1996 |  | 1998 |  |
| ALAMEDA | 0.1727 | $(0.1032)$ | 0.0798 | $(0.0570)$ | 0.1755 | $(0.1019)$ | 0.0055 | $(0.0165)$ | 0.1191 | $(0.0767)$ |
| ALPINE | 0.2581 | $(0.1243)$ | 0.2974 | $(0.0937)$ | 0.3977 | $(0.0717)$ | 0.3255 | $(0.0174)$ | 0.3651 | $(0.0850)$ |
| AMADOR | 0.2563 | $(0.1213)$ | 0.2898 | $(0.0883)$ | 0.3371 | $(0.1601)$ | 0.3286 | $(0.0217)$ | 0.3836 | $(0.1216)$ |
| BUTTE | 0.2665 | $(0.1275)$ | 0.2944 | $(0.0837)$ | 0.3436 | $(0.1442)$ | 0.3308 | $(0.0170)$ | 0.3706 | $(0.0964)$ |
| CALAVERAS | 0.2716 | $(0.1285)$ | 0.321 | $(0.0885)$ | 0.364 | $(0.1444)$ | 0.3651 | $(0.0170)$ | 0.4087 | $(0.1186)$ |
| COLUSA | 0.2949 | $(0.1179)$ | 0.3454 | $(0.0743)$ | 0.3779 | $(0.1359)$ | 0.3471 | $(0.0197)$ | 0.4111 | $(0.1103)$ |
| CONTRA COSTA | 0.2326 | $(0.1101)$ | 0.2119 | $(0.0762)$ | 0.277 | $(0.1259)$ | 0.2155 | $(0.0147)$ | 0.262 | $(0.0858)$ |
| DEL NORTE | 0.2291 | $(0.1128)$ | 0.2136 | $(0.0784)$ | 0.2981 | $(0.1508)$ | 0.2269 | $(0.0202)$ | 0.3152 | $(0.1061)$ |
| EL DORADO | 0.2738 | $(0.1323)$ | 0.3376 | $(0.0997)$ | 0.3988 | $(0.1399)$ | 0.402 | $(0.0177)$ | 0.4371 | $(0.1243)$ |
| FRESNO | 0.2475 | $(0.1061)$ | 0.2496 | $(0.0739)$ | 0.315 | $(0.1225)$ | 0.2724 | $(0.0215)$ | 0.3555 | $(0.1150)$ |
| GLENN | 0.2618 | $(0.1302)$ | 0.2942 | $(0.1012)$ | 0.3558 | $(0.1689)$ | 0.3759 | $(0.0215)$ | 0.4097 | $(0.1287)$ |


| County | 1990 |  | 1992 |  | 1994 |  | 1996 |  | 1998 |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| HUMBOLDT | 0.1995 | (0.1043) | 0.1561 | (0.0673) | 0.2391 | (0.1184) | 0.1598 | (0.0145) | 0.2305 | (0.0791) |
| IMPERIAL | 0.2308 | (0.0949) | 0.2261 | (0.0657) | 0.2554 | (0.1206) | 0.1486 | (0.0232) | 0.2272 | (0.0709) |
| INYO | 0.2909 | (0.1421) | 0.365 | (0.1202) | 0.4138 | (0.1584) | 0.4358 | (0.0205) | 0.448 | (0.1406) |
| KERN | 0.2696 | (0.1280) | 0.3094 | (0.1055) | 0.3659 | (0.1565) | 0.3709 | (0.0201) | 0.4181 | (0.1139) |
| KINGS | 0.2288 | (0.1215) | 0.1782 | (0.1011) | 0.3242 | (0.1724) | 0.2952 | (0.0216) | 0.3746 | (0.1172) |
| LAKE | 0.2281 | (0.1126) | 0.2183 | (0.0693) | 0.2837 | (0.1363) | 0.1849 | (0.0184) | 0.2628 | (0.1065) |
| LASSEN | 0.2334 | (0.1165) | 0.2484 | (0.0753) | 0.3052 | (0.1522) | 0.2831 | (0.0219) | 0.3655 | (0.1169) |
| LOS ANGELES | 0.2314 | (0.0995) | 0.2016 | (0.0614) | 0.2444 | (0.1179) | 0.135 | (0.0183) | 0.2044 | (0.0624) |
| MADERA | 0.2432 | (0.1203) | 0.278 | (0.0785) | 0.3246 | (0.1415) | 0.3245 | (0.0215) | 0.4016 | (0.1235) |
| MARIN | 0.2151 | (0.1068) | 0.1613 | (0.0668) | 0.2349 | (0.1194) | 0.1126 | (0.0189) | 0.1954 | (0.0800) |
| MARIPOSA | 0.2623 | (0.1247) | 0.2859 | (0.0924) | 0.3439 | (0.1476) | 0.3566 | (0.0168) | 0.4162 | (0.1000) |
| MENDOCINO | 0.204 | (0.1058) | 0.1421 | (0.0663) | 0.2282 | (0.1170) | 0.0933 | (0.0186) | 0.2079 | (0.0803) |
| MERCED | 0.2208 | (0.1122) | 0.1788 | (0.0849) | 0.279 | (0.1312) | 0.131 | (0.0254) | 0.2453 | (0.0678) |
| MODOC | 0.2672 | (0.1264) | 0.3198 | (0.0916) | 0.3814 | (0.1279) | 0.3592 | (0.0180) | 0.4102 | (0.1141) |
| MONO | 0.2771 | (0.1353) | 0.3414 | (0.0944) | 0.3661 | (0.1608) | 0.3726 | (0.0179) | 0.3964 | (0.1125) |
| MONTEREY | 0.228 | (0.1133) | 0.2118 | (0.0703) | 0.2712 | (0.1357) | 0.1829 | (0.0162) | 0.264 | (0.1058) |
| NAPA | 0.2435 | (0.1157) | 0.2393 | (0.0750) | 0.2914 | (0.1207) | 0.2171 | (0.0185) | 0.2822 | (0.0977) |
| NEVADA | 0.2906 | (0.1380) | 0.3538 | (0.1041) | 0.3971 | (0.1476) | 0.3991 | (0.0188) | 0.4189 | (0.1134) |
| ORANGE | 0.3297 | (0.1641) | 0.426 | (0.1219) | 0.4466 | (0.1590) | 0.4613 | (0.0219) | 0.4751 | (0.1510) |
| PLACER | 0.2823 | (0.1350) | 0.3624 | (0.0958) | 0.4029 | (0.1491) | 0.4334 | (0.0168) | 0.462 | (0.1103) |
| PLUMAS | 0.2378 | (0.1161) | 0.2614 | (0.0779) | 0.3184 | (0.1413) | 0.3126 | (0.0182) | 0.377 | (0.1037) |
| RIVERSIDE | 0.2735 | (0.1388) | 0.324 | (0.1073) | 0.3599 | (0.1696) | 0.3551 | (0.0224) | 0.4028 | (0.1393) |
| SACRAMENTO | 0.2287 | (0.1104) | 0.2166 | (0.0759) | 0.29 | (0.1317) | 0.2131 | (0.0216) | 0.3028 | (0.1017) |
| SAN BENITO | 0.2473 | (0.1061) | 0.2751 | (0.0568) | 0.2956 | (0.1082) | 0.2601 | (0.0116) | 0.328 | (0.0430) |
| SAN BERNARDINO | 0.2715 | (0.1366) | 0.311 | (0.0989) | 0.3472 | (0.1583) | 0.3179 | (0.0196) | 0.3514 | (0.1236) |
| SAN DIEGO | 0.2868 | (0.1404) | 0.3322 | (0.1056) | 0.3716 | (0.1416) | 0.3151 | (0.0207) | 0.3608 | (0.1198) |


| County | 1990 |  | 1992 |  | 1994 |  | 1996 |  | 1998 |  |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| SAN FRANCISCO | 0.1431 | $(0.0972)$ | 0.1199 | $(0.0168)$ | 0.1062 | $(0.0706)$ | 0.0016 | $(0.0075)$ | 0.064 | $(0.0535)$ |
| SAN JOAQUIN | 0.2347 | $(0.1161)$ | 0.2347 | $(0.0804)$ | 0.3153 | $(0.1445)$ | 0.2468 | $(0.0202)$ | 0.3347 | $(0.1165)$ |
| SAN LUIS OBISPO | 0.2825 | $(0.1390)$ | 0.3134 | $(0.1061)$ | 0.356 | $(0.1425)$ | 0.3488 | $(0.0181)$ | 0.4026 | $(0.1080)$ |
| SAN MATEO | 0.2168 | $(0.1082)$ | 0.1658 | $(0.0728)$ | 0.2508 | $(0.1270)$ | 0.0898 | $(0.0227)$ | 0.2145 | $(0.0950)$ |
| SANTA BARBARA | 0.2692 | $(0.1244)$ | 0.3136 | $(0.0652)$ | 0.3414 | $(0.0956)$ | 0.3327 | $(0.0069)$ | 0.3362 | $(0.0508)$ |
| SANTA CLARA | 0.2323 | $(0.1085)$ | 0.2241 | $(0.0677)$ | 0.2694 | $(0.1276)$ | 0.1566 | $(0.0186)$ | 0.2478 | $(0.0969)$ |
| SANTA CRUZ | 0.1917 | $(0.0942)$ | 0.1967 | $(0.0288)$ | 0.1832 | $(0.0947)$ | 0.1064 | $(0.0134)$ | 0.1555 | $(0.0676)$ |
| SHASTA | 0.2714 | $(0.1280)$ | 0.3304 | $(0.0898)$ | 0.3622 | $(0.1544)$ | 0.3615 | $(0.0207)$ | 0.4303 | $(0.1450)$ |
| SIERRA | 0.2351 | $(0.1117)$ | 0.2483 | $(0.0828)$ | 0.3198 | $(0.1368)$ | 0.3055 | $(0.0180)$ | 0.3788 | $(0.0908)$ |
| SISKIYOU | 0.2336 | $(0.1152)$ | 0.2355 | $(0.0765)$ | 0.3022 | $(0.1353)$ | 0.2742 | $(0.0181)$ | 0.342 | $(0.1054)$ |
| SOLANO | 0.2092 | $(0.1098)$ | 0.1588 | $(0.0678)$ | 0.2613 | $(0.1371)$ | 0.0943 | $(0.0226)$ | 0.2087 | $(0.0839)$ |
| SONOMA | 0.2131 | $(0.1059)$ | 0.1517 | $(0.0719)$ | 0.2399 | $(0.1198)$ | 0.1149 | $(0.0202)$ | 0.2169 | $(0.0869)$ |
| STANISLAUS | 0.2284 | $(0.1175)$ | 0.2084 | $(0.0824)$ | 0.2935 | $(0.1399)$ | 0.1956 | $(0.0245)$ | 0.302 | $(0.1009)$ |
| SUTTER | 0.2916 | $(0.1490)$ | 0.3867 | $(0.1130)$ | 0.4277 | $(0.1551)$ | 0.4388 | $(0.0200)$ | 0.4695 | $(0.1318)$ |
| TEHAMA | 0.2399 | $(0.1183)$ | 0.2523 | $(0.0818)$ | 0.3211 | $(0.1515)$ | 0.2943 | $(0.0202)$ | 0.3653 | $(0.1285)$ |
| TRINITY | 0.2314 | $(0.1142)$ | 0.2314 | $(0.0797)$ | 0.2999 | $(0.1380)$ | 0.2478 | $(0.0183)$ | 0.33 | $(0.0893)$ |
| TULARE | 0.2575 | $(0.1219)$ | 0.2648 | $(0.0996)$ | 0.3431 | $(0.1580)$ | 0.2918 | $(0.0244)$ | 0.3685 | $(0.1377)$ |
| TUOLUMNE | 0.2484 | $(0.1196)$ | 0.27 | $(0.0857)$ | 0.3291 | $(0.1422)$ | 0.3218 | $(0.0171)$ | 0.3884 | $(0.1076)$ |
| VENTURA | 0.2904 | $(0.1365)$ | 0.3635 | $(0.0663)$ | 0.3791 | $(0.1238)$ | 0.3601 | $(0.0117)$ | 0.3927 | $(0.0510)$ |
| YOLO | 0.2097 | $(0.1039)$ | 0.1645 | $(0.0598)$ | 0.2241 | $(0.1121)$ | 0.1097 | $(0.0207)$ | 0.2056 | $(0.0810)$ |
| YUBA | 0.2432 | $(0.1234)$ | 0.2611 | $(0.0874)$ | 0.3258 | $(0.1588)$ | 0.2704 | $(0.0239)$ | 0.3456 | $(0.1374)$ |

Table A7 Appendix: White Voter Registration by Party, 1990-1998

|  | Democrat |  |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| County | 1990 |  | 1992 |  | 1994 |  | 1996 |  | 1998 |  |
| ALAMEDA | 0.6767 | (0.0389) | 0.642 | (0.0189) | 0.6739 | (0.0302) | 0.6594 | (0.1500) | 0.6075 | (0.0395) |
| ALPINE | 0.3977 | (0.0293) | 0.3746 | (0.0145) | 0.3524 | (0.0069) | 0.3119 | (0.1206) | 0.3392 | (0.0129) |
| AMADOR | 0.5255 | (0.0407) | 0.4724 | (0.0284) | 0.4753 | (0.0313) | 0.4261 | (0.1532) | 0.4096 | (0.0459) |
| BUTTE | 0.4622 | (0.0578) | 0.4413 | (0.0223) | 0.454 | (0.0358) | 0.3977 | (0.1322) | 0.383 | (0.0270) |
| CALAVERAS | 0.482 | (0.0466) | 0.4437 | (0.0265) | 0.4511 | (0.0327) | 0.3919 | (0.1387) | 0.3798 | (0.0327) |
| COLUSA | 0.4911 | (0.0381) | 0.4634 | (0.0271) | 0.4772 | (0.0354) | 0.4312 | (0.1537) | 0.4108 | (0.0429) |
| CONTRA COSTA | 0.5389 | (0.0296) | 0.5131 | (0.0111) | 0.5279 | (0.0187) | 0.5231 | (0.1196) | 0.4975 | (0.0349) |
| DEL NORTE | 0.5129 | (0.0444) | 0.4672 | (0.0288) | 0.4951 | (0.0451) | 0.4295 | (0.1460) | 0.3967 | (0.0561) |
| EL DORADO | 0.4591 | (0.0373) | 0.411 | (0.0172) | 0.4117 | (0.0296) | 0.3495 | (0.1369) | 0.3389 | (0.0294) |
| FRESNO | 0.5758 | (0.0405) | 0.5452 | (0.0327) | 0.553 | (0.0369) | 0.4851 | (0.1578) | 0.4668 | (0.0423) |
| GLENN | 0.4854 | (0.0589) | 0.4469 | (0.0407) | 0.4418 | (0.0410) | 0.3947 | (0.1618) | 0.3648 | (0.0509) |
| HUMBOLDT | 0.6167 | (0.0358) | 0.5418 | (0.0148) | 0.5345 | (0.0169) | 0.4972 | (0.1161) | 0.4491 | (0.0251) |
| IMPERIAL | 0.5839 | (0.0447) | 0.5576 | (0.0336) | 0.6162 | (0.0419) | 0.5755 | (0.1467) | 0.5493 | (0.0434) |
| INYO | 0.4122 | (0.0364) | 0.3866 | (0.0231) | 0.3948 | (0.0330) | 0.3458 | (0.1402) | 0.3305 | (0.0444) |
| KERN | 0.4884 | (0.0496) | 0.4398 | (0.0322) | 0.4573 | (0.0363) | 0.4024 | (0.1537) | 0.3866 | (0.0440) |
| KINGS | 0.585 | (0.0648) | 0.5299 | (0.0407) | 0.5177 | (0.0412) | 0.4507 | (0.1704) | 0.4194 | (0.0454) |
| LAKE | 0.5956 | (0.0701) | 0.5506 | (0.0377) | 0.5722 | (0.0515) | 0.514 | (0.1585) | 0.4919 | (0.0559) |
| LASSEN | 0.5291 | (0.0561) | 0.4854 | (0.0254) | 0.5064 | (0.0434) | 0.4107 | (0.1579) | 0.3689 | (0.0466) |
| LOS ANGELES | 0.5859 | (0.0426) | 0.5779 | (0.0342) | 0.6108 | (0.0378) | 0.5857 | (0.1414) | 0.5579 | (0.0452) |
| MADERA | 0.5621 | (0.0574) | 0.5183 | (0.0297) | 0.5197 | (0.0355) | 0.4345 | (0.1670) | 0.394 | (0.0424) |
| MARIN | 0.543 | (0.0267) | 0.5262 | (0.0068) | 0.5444 | (0.0144) | 0.5459 | (0.1438) | 0.5173 | (0.0288) |
| MARIPOSA | 0.4534 | (0.0325) | 0.4244 | (0.0151) | 0.4303 | (0.0238) | 0.3789 | (0.1363) | 0.3715 | (0.0159) |
| MENDOCINO | 0.5821 | (0.0457) | 0.5579 | (0.0189) | 0.5676 | (0.0249) | 0.5342 | (0.1581) | 0.4946 | (0.0392) |


| County | 1990 |  | 1992 |  | 1994 |  | 1996 |  | 1998 |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| MERCED | 0.596 | (0.0517) | 0.5527 | (0.0344) | 0.5622 | (0.0376) | 0.5252 | (0.1947) | 0.5786 | (0.0378) |
| MODOC | 0.4704 | (0.0336) | 0.4418 | (0.0144) | 0.4429 | (0.0225) | 0.392 | (0.1422) | 0.3763 | (0.0269) |
| MONO | 0.3519 | (0.0544) | 0.3337 | (0.0243) | 0.3469 | (0.0484) | 0.303 | (0.1386) | 0.2892 | (0.0379) |
| MONTEREY | 0.5278 | (0.0510) | 0.5013 | (0.0312) | 0.5376 | (0.0333) | 0.536 | (0.1330) | 0.5016 | (0.0441) |
| NAPA | 0.533 | (0.0408) | 0.5161 | (0.0195) | 0.5255 | (0.0214) | 0.4954 | (0.1511) | 0.4802 | (0.0383) |
| NEVADA | 0.3971 | (0.0378) | 0.3659 | (0.0130) | 0.3693 | (0.0224) | 0.3121 | (0.1276) | 0.3135 | (0.0279) |
| ORANGE | 0.3341 | (0.0464) | 0.3225 | (0.0245) | 0.3445 | (0.0347) | 0.3027 | (0.1382) | 0.2818 | (0.0421) |
| PLACER | 0.4508 | (0.0503) | 0.4013 | (0.0176) | 0.4002 | (0.0257) | 0.329 | (0.1239) | 0.3289 | (0.0222) |
| PLUMAS | 0.5299 | (0.0470) | 0.482 | (0.0214) | 0.4848 | (0.0316) | 0.414 | (0.1313) | 0.3946 | (0.0267) |
| RIVERSIDE | 0.4639 | (0.0577) | 0.4242 | (0.0281) | 0.4435 | (0.0397) | 0.3999 | (0.1608) | 0.3601 | (0.0565) |
| SACRAMENTO | 0.5769 | (0.0362) | 0.5361 | (0.0132) | 0.5441 | (0.0217) | 0.5074 | (0.1571) | 0.4801 | (0.0354) |
| SAN BENITO | 0.534 | (0.0445) | 0.5004 | (0.0268) | 0.5382 | (0.0333) | 0.5156 | (0.0952) | 0.4664 | (0.0284) |
| SAN BERNARDINO | 0.4658 | (0.0497) | 0.4481 | (0.0323) | 0.4662 | (0.0362) | 0.4288 | (0.1439) | 0.4215 | (0.0485) |
| SAN DIEGO | 0.3864 | (0.0465) | 0.3592 | (0.0227) | 0.3908 | (0.0301) | 0.352 | (0.1467) | 0.3336 | (0.0468) |
| SAN FRANCISCO | 0.6857 | (0.0262) | 0.6373 | (0.0048) | 0.6727 | (0.0201) | 0.6852 | (0.0948) | 0.6115 | (0.0319) |
| SAN JOAQUIN | 0.5794 | (0.0485) | 0.5452 | (0.0277) | 0.5391 | (0.0292) | 0.5068 | (0.1704) | 0.4726 | (0.0482) |
| SAN LUIS OBISPO | 0.3994 | (0.0493) | 0.3788 | (0.0198) | 0.4396 | (0.0245) | 0.3805 | (0.1397) | 0.363 | (0.0369) |
| SAN MATEO | 0.5567 | (0.0384) | 0.5381 | (0.0228) | 0.5624 | (0.0273) | 0.5452 | (0.1688) | 0.5234 | (0.0405) |
| SANTA BARBARA | 0.4348 | (0.0454) | 0.4211 | (0.0172) | 0.4635 | (0.0173) | 0.4259 | (0.0565) | 0.4206 | (0.0263) |
| SANTA CLARA | 0.5276 | (0.0370) | 0.4966 | (0.0184) | 0.5168 | (0.0253) | 0.4957 | (0.1523) | 0.4663 | (0.0468) |
| SANTA CRUZ | 0.5999 | (0.0273) | 0.5552 | (0.0051) | 0.5862 | (0.0142) | 0.6053 | (0.1009) | 0.5471 | (0.0285) |
| SHASTA | 0.4844 | (0.0744) | 0.4238 | (0.0356) | 0.4387 | (0.0466) | 0.374 | (0.1484) | 0.3283 | (0.0653) |
| SIERRA | 0.496 | (0.0229) | 0.4602 | (0.0070) | 0.4482 | (0.0146) | 0.4071 | (0.1327) | 0.3754 | (0.0193) |
| SISKIYOU | 0.5396 | (0.0510) | 0.5007 | (0.0225) | 0.5074 | (0.0351) | 0.4436 | (0.1415) | 0.4174 | (0.0365) |
| SOLANO | 0.6015 | (0.0532) | 0.5823 | (0.0300) | 0.6 | (0.0328) | 0.5511 | (0.1781) | 0.5454 | (0.0377) |
| SONOMA | 0.5918 | (0.0377) | 0.572 | (0.0134) | 0.5837 | (0.0172) | 0.5658 | (0.1578) | 0.5404 | (0.0450) |


| County | 1990 |  | 1992 |  | 1994 |  | 1996 |  | 1998 |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| STANISLAUS | 0.6018 | (0.0619) | 0.5532 | (0.0299) | 0.5747 | (0.0384) | 0.5089 | (0.1770) | 0.4866 | (0.0392) |
| SUTTER | 0.4131 | (0.0548) | 0.3762 | (0.0215) | 0.383 | (0.0273) | 0.3479 | (0.1418) | 0.3393 | (0.0365) |
| TEHAMA | 0.5317 | (0.0703) | 0.4887 | (0.0371) | 0.5055 | (0.0493) | 0.4407 | (0.1497) | 0.3991 | (0.0646) |
| TRINITY | 0.4912 | (0.0275) | 0.4733 | (0.0130) | 0.4715 | (0.0213) | 0.4406 | (0.1419) | 0.4214 | (0.0163) |
| TULARE | 0.519 | (0.0567) | 0.472 | (0.0378) | 0.4852 | (0.0434) | 0.4379 | (0.1760) | 0.3996 | (0.0559) |
| TUOLUMNE | 0.5128 | (0.0237) | 0.4891 | (0.0102) | 0.4886 | (0.0179) | 0.4419 | (0.1320) | 0.418 | (0.0206) |
| VENTURA | 0.4159 | (0.0436) | 0.405 | (0.0167) | 0.4229 | (0.0227) | 0.3828 | (0.0975) | 0.3847 | (0.0217) |
| YOLO | 0.5833 | (0.0451) | 0.5694 | (0.0137) | 0.597 | (0.0232) | 0.5807 | (0.1575) | 0.5447 | (0.0321) |
| YUBA | 0.5308 | (0.1001) | 0.4734 | (0.0683) | 0.4906 | (0.0679) | 0.4247 | (0.1702) | 0.3824 | (0.0669) |
| Note: The stardard error for each estimate is shown in parentheses. |  |  |  |  |  |  |  |  |  |  |
|  | Republican |  |  |  |  |  |  |  |  |  |
| County | 1990 |  | 1992 |  | 1994 |  | 1996 |  | 1998 |  |
| ALAMEDA | 0.1661 | (0.0309) | 0.1762 | (0.0196) | 0.1322 | (0.0193) | 0.1432 | (0.0145) | 0.2102 | (0.0551) |
| ALPINE | 0.3899 | (0.0235) | 0.4075 | (0.0151) | 0.4135 | (0.0044) | 0.3859 | (0.0101) | 0.4205 | (0.0216) |
| AMADOR | 0.3681 | (0.0328) | 0.3801 | (0.0295) | 0.3792 | (0.0200) | 0.3613 | (0.0213) | 0.4663 | (0.0776) |
| BUTTE | 0.3755 | (0.0466) | 0.3843 | (0.0232) | 0.3676 | (0.0229) | 0.3688 | (0.0168) | 0.4403 | (0.0457) |
| CALAVERAS | 0.3955 | (0.0375) | 0.4048 | (0.0276) | 0.3959 | (0.0210) | 0.3917 | (0.0180) | 0.4729 | (0.0564) |
| COLUSA | 0.4076 | (0.0307) | 0.407 | (0.0282) | 0.396 | (0.0227) | 0.3817 | (0.0199) | 0.4775 | (0.0736) |
| CONTRA COSTA | 0.3276 | (0.0238) | 0.336 | (0.0116) | 0.3145 | (0.0119) | 0.3115 | (0.0078) | 0.3505 | (0.0549) |
| DEL NORTE | 0.3029 | (0.0357) | 0.3121 | (0.0298) | 0.2779 | (0.0289) | 0.2809 | (0.0243) | 0.4075 | (0.0871) |
| EL DORADO | 0.4166 | (0.0300) | 0.4378 | (0.0180) | 0.4298 | (0.0190) | 0.4209 | (0.0177) | 0.4972 | (0.0515) |
| FRESNO | 0.3265 | (0.0325) | 0.3224 | (0.0338) | 0.3193 | (0.0237) | 0.3331 | (0.0185) | 0.4337 | (0.0696) |
| GLENN | 0.3758 | (0.0474) | 0.3891 | (0.0421) | 0.4017 | (0.0263) | 0.3896 | (0.0268) | 0.4958 | (0.0877) |


| County | 1990 |  | 1992 |  | 1994 |  | 1996 |  | 1998 |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| HUMBOLDT | 0.2451 | (0.0287) | 0.2739 | (0.0154) | 0.2709 | (0.0108) | 0.2981 | (0.0019) | 0.3145 | (0.0398) |
| IMPERIAL | 0.2776 | (0.0358) | 0.2887 | (0.0348) | 0.2321 | (0.0268) | 0.2324 | (0.0200) | 0.3151 | (0.0645) |
| INYO | 0.4568 | (0.0292) | 0.4724 | (0.0241) | 0.4601 | (0.0211) | 0.4257 | (0.0224) | 0.5262 | (0.0791) |
| KERN | 0.3894 | (0.0400) | 0.4133 | (0.0335) | 0.4055 | (0.0233) | 0.3941 | (0.0208) | 0.4878 | (0.0761) |
| KINGS | 0.283 | (0.0520) | 0.3061 | (0.0420) | 0.3388 | (0.0264) | 0.3528 | (0.0208) | 0.4625 | (0.0765) |
| LAKE | 0.2641 | (0.0562) | 0.2829 | (0.0389) | 0.2495 | (0.0331) | 0.2223 | (0.0332) | 0.3703 | (0.0835) |
| LASSEN | 0.3006 | (0.0452) | 0.3353 | (0.0263) | 0.3038 | (0.0278) | 0.3183 | (0.0264) | 0.45 | (0.0777) |
| LOS ANGELES | 0.2896 | (0.0342) | 0.2592 | (0.0353) | 0.2278 | (0.0241) | 0.2302 | (0.0178) | 0.3036 | (0.0660) |
| MADERA | 0.3254 | (0.0461) | 0.3558 | (0.0307) | 0.3459 | (0.0227) | 0.3707 | (0.0205) | 0.4846 | (0.0733) |
| MARIN | 0.2956 | (0.0215) | 0.2932 | (0.0071) | 0.269 | (0.0092) | 0.2305 | (0.0148) | 0.2886 | (0.0445) |
| MARIPOSA | 0.3916 | (0.0262) | 0.3989 | (0.0157) | 0.3914 | (0.0152) | 0.3916 | (0.0163) | 0.4627 | (0.0271) |
| MENDOCINO | 0.2392 | (0.0367) | 0.2521 | (0.0196) | 0.2326 | (0.0160) | 0.2083 | (0.0208) | 0.299 | (0.0586) |
| MERCED | 0.2731 | (0.0414) | 0.2893 | (0.0355) | 0.2752 | (0.0240) | 0.2564 | (0.0215) | 0.3266 | (0.0578) |
| MODOC | 0.3996 | (0.0271) | 0.4196 | (0.0150) | 0.4147 | (0.0144) | 0.3992 | (0.0148) | 0.4741 | (0.0464) |
| MONO | 0.4111 | (0.0435) | 0.429 | (0.0253) | 0.3916 | (0.0310) | 0.3896 | (0.0226) | 0.4799 | (0.0654) |
| MONTEREY | 0.2932 | (0.0411) | 0.2909 | (0.0323) | 0.2694 | (0.0213) | 0.2559 | (0.0184) | 0.3512 | (0.0675) |
| NAPA | 0.3384 | (0.0328) | 0.3376 | (0.0202) | 0.3244 | (0.0137) | 0.2894 | (0.0191) | 0.3766 | (0.0608) |
| NEVADA | 0.4452 | (0.0303) | 0.4563 | (0.0135) | 0.4466 | (0.0143) | 0.4334 | (0.0123) | 0.4852 | (0.0484) |
| ORANGE | 0.5352 | (0.0371) | 0.5173 | (0.0258) | 0.4918 | (0.0222) | 0.4627 | (0.0165) | 0.547 | (0.0763) |
| PLACER | 0.4174 | (0.0405) | 0.4508 | (0.0183) | 0.4489 | (0.0165) | 0.4464 | (0.0132) | 0.5083 | (0.0388) |
| PLUMAS | 0.3213 | (0.0378) | 0.3545 | (0.0222) | 0.3448 | (0.0202) | 0.3695 | (0.0132) | 0.4378 | (0.0452) |
| RIVERSIDE | 0.4146 | (0.0465) | 0.4281 | (0.0293) | 0.4097 | (0.0255) | 0.3876 | (0.0220) | 0.5001 | (0.0969) |
| SACRAMENTO | 0.3118 | (0.0291) | 0.3351 | (0.0137) | 0.3232 | (0.0139) | 0.294 | (0.0184) | 0.3804 | (0.0569) |
| SAN BENITO | 0.321 | (0.0358) | 0.3244 | (0.0277) | 0.2963 | (0.0213) | 0.2896 | (0.0152) | 0.3768 | (0.0462) |
| SAN BERNARDINO | 0.4148 | (0.0400) | 0.405 | (0.0336) | 0.3836 | (0.0232) | 0.3581 | (0.0193) | 0.4432 | (0.0799) |
| SAN DIEGO | 0.4412 | (0.0373) | 0.4358 | (0.0236) | 0.4069 | (0.0192) | 0.3657 | (0.0190) | 0.4528 | (0.0781) |


| County | 1990 |  | 1992 |  | 1994 |  | 1996 |  | 1998 |  |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| SAN FRANCISCO | 0.1252 | $(0.0207)$ | 0.1554 | $(0.0050)$ | 0.0957 | $(0.0128)$ | 0.0984 | $(0.0105)$ | 0.1336 | $(0.0418)$ |
| SAN JOAQUIN | 0.3138 | $(0.0389)$ | 0.3326 | $(0.0287)$ | 0.3458 | $(0.0187)$ | 0.3277 | $(0.0172)$ | 0.4424 | $(0.0791)$ |
| SAN LUIS OBISPO | 0.4302 | $(0.0396)$ | 0.4276 | $(0.0206)$ | 0.3987 | $(0.0156)$ | 0.3791 | $(0.0195)$ | 0.4686 | $(0.0634)$ |
| SAN MATEO | 0.2821 | $(0.0309)$ | 0.2766 | $(0.0236)$ | 0.25 | $(0.0175)$ | 0.2151 | $(0.0195)$ | 0.3044 | $(0.0604)$ |
| SANTA BARBARA | 0.3846 | $(0.0366)$ | 0.3811 | $(0.0179)$ | 0.3636 | $(0.0111)$ | 0.3494 | $(0.0096)$ | 0.3876 | $(0.0432)$ |
| SANTA CLARA | 0.3135 | $(0.0298)$ | 0.3166 | $(0.0191)$ | 0.2907 | $(0.0162)$ | 0.2576 | $(0.0176)$ | 0.3476 | $(0.0709)$ |
| SANTA CRUZ | 0.2403 | $(0.0219)$ | 0.2507 | $(0.0053)$ | 0.2223 | $(0.0091)$ | 0.2027 | $(0.0097)$ | 0.2421 | $(0.0428)$ |
| SHASTA | 0.3651 | $(0.0600)$ | 0.4047 | $(0.0369)$ | 0.3792 | $(0.0299)$ | 0.3722 | $(0.0254)$ | 0.51 | $(0.1109)$ |
| SIERRA | 0.343 | $(0.0184)$ | 0.3738 | $(0.0073)$ | 0.3735 | $(0.0093)$ | 0.3629 | $(0.0139)$ | 0.444 | $(0.0329)$ |
| SISKIYOU | 0.3071 | $(0.0410)$ | 0.3334 | $(0.0233)$ | 0.3153 | $(0.0225)$ | 0.3206 | $(0.0207)$ | 0.4265 | $(0.0606)$ |
| SOLANO | 0.2398 | $(0.0426)$ | 0.2465 | $(0.0310)$ | 0.2324 | $(0.0209)$ | 0.2295 | $(0.0187)$ | 0.302 | $(0.0566)$ |
| SONOMA | 0.2731 | $(0.0302)$ | 0.2817 | $(0.0139)$ | 0.2659 | $(0.0110)$ | 0.2208 | $(0.0184)$ | 0.3156 | $(0.0666)$ |
| STANISLAUS | 0.2835 | $(0.0496)$ | 0.3145 | $(0.0309)$ | 0.2925 | $(0.0246)$ | 0.2742 | $(0.0234)$ | 0.3899 | $(0.0628)$ |
| SUTTER | 0.4616 | $(0.0441)$ | 0.4818 | $(0.0225)$ | 0.4778 | $(0.0175)$ | 0.4475 | $(0.0188)$ | 0.5254 | $(0.0651)$ |
| TEHAMA | 0.2987 | $(0.0566)$ | 0.333 | $(0.0382)$ | 0.3204 | $(0.0317)$ | 0.3143 | $(0.0287)$ | 0.465 | $(0.1046)$ |
| TRINITY | 0.3336 | $(0.0221)$ | 0.3505 | $(0.0135)$ | 0.3399 | $(0.0136)$ | 0.3315 | $(0.0125)$ | 0.3948 | $(0.0272)$ |
| TULARE | 0.3516 | $(0.0457)$ | 0.371 | $(0.0391)$ | 0.3697 | $(0.0278)$ | 0.3555 | $(0.0227)$ | 0.478 | $(0.0942)$ |
| TUOLUMNE | 0.3745 | $(0.0191)$ | 0.386 | $(0.0106)$ | 0.3817 | $(0.0115)$ | 0.3764 | $(0.0129)$ | 0.4433 | $(0.0350)$ |
| VENTURA | 0.436 | $(0.0350)$ | 0.4233 | $(0.0174)$ | 0.4069 | $(0.0145)$ | 0.3851 | $(0.0145)$ | 0.4346 | $(0.0366)$ |
| YOLO | 0.2527 | $(0.0362)$ | 0.2677 | $(0.0142)$ | 0.2411 | $(0.0148)$ | 0.2217 | $(0.0179)$ | 0.2941 | $(0.0491)$ |
| YUBA | 0.2782 | $(0.0807)$ | 0.3093 | $(0.0698)$ | 0.3005 | $(0.0438)$ | 0.3138 | $(0.0278)$ | 0.4488 | $(0.1053)$ |

[^43]Table A8 Appendix: Texas Latino and White VAP as a Percent of Total VAP, 1990-1998

|  | Latinos |  |  |  |  |  | Whites |  |  |  |  |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| County | 1990 | 1992 | 1994 | 1996 | 1998 |  | 1990 | 1992 | 1994 | 1996 | 1998 |
| Anderson | 0.0822 | 0.0830 | 0.0858 | 0.0897 | 0.0918 |  | 0.6805 | 0.6806 | 0.6757 | 0.6692 | 0.6666 |
| Andrews | 0.3173 | 0.3264 | 0.3356 | 0.3444 | 0.3566 |  | 0.6483 | 0.6392 | 0.6300 | 0.6210 | 0.6085 |
| Angelina | 0.0868 | 0.0923 | 0.0996 | 0.1060 | 0.1143 |  | 0.7556 | 0.7487 | 0.7382 | 0.7316 | 0.7211 |
| Aransas | 0.2006 | 0.2005 | 0.2006 | 0.2004 | 0.2024 |  | 0.7458 | 0.7460 | 0.7450 | 0.7446 | 0.7408 |
| Archer | 0.0237 | 0.0240 | 0.0243 | 0.0241 | 0.0246 |  | 0.9701 | 0.9700 | 0.9698 | 0.9700 | 0.9696 |
| Armstrong | 0.0272 | 0.0286 | 0.0304 | 0.0322 | 0.0340 |  | 0.9654 | 0.9641 | 0.9623 | 0.9605 | 0.9582 |
| Atacosa | 0.5258 | 0.5329 | 0.5401 | 0.5470 | 0.5581 |  | 0.4655 | 0.4584 | 0.4513 | 0.4447 | 0.4338 |
| Austin | 0.1044 | 0.1088 | 0.1132 | 0.1176 | 0.1230 |  | 0.7629 | 0.7574 | 0.7517 | 0.7465 | 0.7395 |
| Bailey | 0.3876 | 0.3987 | 0.4100 | 0.4209 | 0.4352 |  | 0.5929 | 0.5819 | 0.5707 | 0.5598 | 0.5453 |
| Bandera | 0.1108 | 0.1081 | 0.1056 | 0.1035 | 0.1013 |  | 0.8789 | 0.8820 | 0.8848 | 0.8875 | 0.8899 |
| Bastrop | 0.1810 | 0.1825 | 0.1841 | 0.1854 | 0.1888 |  | 0.6974 | 0.7008 | 0.7037 | 0.7071 | 0.7068 |
| Baylor | 0.0762 | 0.0793 | 0.0828 | 0.0865 | 0.0912 |  | 0.8778 | 0.8726 | 0.8670 | 0.8615 | 0.8544 |
| Bee | 0.5135 | 0.5232 | 0.5226 | 0.5287 | 0.5407 |  | 0.4468 | 0.4369 | 0.4084 | 0.3978 | 0.3861 |
| Bell | 0.1308 | 0.1356 | 0.1404 | 0.1457 | 0.1530 |  | 0.6550 | 0.6450 | 0.6352 | 0.6261 | 0.6119 |
| Bexar | 0.4970 | 0.5026 | 0.5091 | 0.5154 | 0.5254 |  | 0.4193 | 0.4122 | 0.4045 | 0.3966 | 0.3847 |
| Blanco | 0.1405 | 0.1422 | 0.1433 | 0.1463 | 0.1499 |  | 0.8441 | 0.8431 | 0.8424 | 0.8405 | 0.8377 |
| Borden | 0.1502 | 0.1540 | 0.1580 | 0.1610 | 0.1663 |  | 0.8373 | 0.8335 | 0.8296 | 0.8256 | 0.8205 |
| Bosque | 0.0944 | 0.0972 | 0.1006 | 0.1046 | 0.1101 |  | 0.8811 | 0.8786 | 0.8754 | 0.8720 | 0.8669 |
| Bowie | 0.0163 | 0.0167 | 0.0171 | 0.0176 | 0.0181 |  | 0.7591 | 0.7558 | 0.7527 | 0.7501 | 0.7445 |
| Brazoria | 0.1762 | 0.1849 | 0.1940 | 0.2037 | 0.2165 |  | 0.7295 | 0.7179 | 0.7055 | 0.6925 | 0.6753 |
| Brazos | 0.1372 | 0.1432 | 0.1506 | 0.1580 | 0.1670 |  | 0.7168 | 0.7082 | 0.6975 | 0.6879 | 0.6750 |
| Brewster | 0.4262 | 0.4304 | 0.4341 | 0.4383 | 0.4455 |  | 0.5574 | 0.5516 | 0.5466 | 0.5422 | 0.5344 |
| Briscoe | 0.1862 | 0.1924 | 0.1999 | 0.2075 | 0.2177 |  | 0.7773 | 0.7712 | 0.7644 | 0.7556 | 0.7457 |


| County | 1990 | 1992 | 1994 | 1996 | 1998 |  | 1990 | 1992 | 1994 | 1996 | 1998 |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Brooks | 0.8944 | 0.8974 | 0.9007 | 0.9038 | 0.9078 |  | 0.1007 | 0.0978 | 0.0946 | 0.0915 | 0.0877 |
| Brown | 0.1104 | 0.1157 | 0.1210 | 0.1286 | 0.1355 |  | 0.8388 | 0.8328 | 0.8273 | 0.8160 | 0.8082 |
| Burleson | 0.1190 | 0.1200 | 0.1208 | 0.1222 | 0.1241 |  | 0.7007 | 0.7001 | 0.6991 | 0.6977 | 0.6940 |
| Burnet | 0.1075 | 0.1119 | 0.1167 | 0.1221 | 0.1284 |  | 0.8742 | 0.8704 | 0.8664 | 0.8552 | 0.8497 |
| Caldwell | 0.3781 | 0.3846 | 0.3907 | 0.3926 | 0.4017 |  | 0.5139 | 0.5088 | 0.5033 | 0.4952 | 0.4863 |
| Calhoun | 0.3620 | 0.3689 | 0.3765 | 0.3834 | 0.3934 |  | 0.5799 | 0.5728 | 0.5649 | 0.5575 | 0.5466 |
| Callahan | 0.0412 | 0.0421 | 0.0429 | 0.0437 | 0.0443 |  | 0.9523 | 0.9515 | 0.9508 | 0.9500 | 0.9496 |
| Cameron | 0.8187 | 0.8234 | 0.8276 | 0.8312 | 0.8366 |  | 0.1748 | 0.1701 | 0.1658 | 0.1621 | 0.1566 |
| Camp | 0.0506 | 0.0524 | 0.0546 | 0.0572 | 0.0601 |  | 0.7083 | 0.7061 | 0.7028 | 0.6993 | 0.6930 |
| Carson | 0.0538 | 0.0562 | 0.0584 | 0.0610 | 0.0647 |  | 0.9369 | 0.9343 | 0.9317 | 0.9287 | 0.9250 |
| Cass | 0.0124 | 0.0127 | 0.0129 | 0.0131 | 0.0135 |  | 0.7827 | 0.7793 | 0.7755 | 0.7723 | 0.7658 |
| Castro | 0.4613 | 0.4730 | 0.4852 | 0.4978 | 0.5127 |  | 0.5050 | 0.4928 | 0.4802 | 0.4678 | 0.4527 |
| Chambers | 0.0594 | 0.0601 | 0.0607 | 0.0618 | 0.0635 |  | 0.8055 | 0.8041 | 0.8028 | 0.8010 | 0.7965 |
| Cherokee | 0.0656 | 0.0699 | 0.0746 | 0.0815 | 0.0874 |  | 0.7605 | 0.7546 | 0.7487 | 0.7336 | 0.7244 |
| Childress | 0.1433 | 0.1494 | 0.1556 | 0.1902 | 0.1976 |  | 0.7961 | 0.7886 | 0.7812 | 0.6849 | 0.6770 |
| Clay | 0.0241 | 0.0247 | 0.0252 | 0.0259 | 0.0271 |  | 0.9625 | 0.9618 | 0.9612 | 0.9607 | 0.9596 |
| Cochran | 0.4238 | 0.4335 | 0.4423 | 0.4516 | 0.4626 |  | 0.5204 | 0.5105 | 0.5015 | 0.4915 | 0.4801 |
| Coke | 0.1232 | 0.1292 | 0.1358 | 0.1416 | 0.1487 |  | 0.8700 | 0.8640 | 0.8575 | 0.8516 | 0.8445 |
| Coleman | 0.1171 | 0.1218 | 0.1266 | 0.1319 | 0.1385 |  | 0.8540 | 0.8486 | 0.8433 | 0.8375 | 0.8301 |
| Collin | 0.0688 | 0.0709 | 0.0729 | 0.0749 | 0.0782 |  | 0.8601 | 0.8575 | 0.8551 | 0.8530 | 0.8486 |
| Collingsworth | 0.1570 | 0.1650 | 0.1731 | 0.1815 | 0.1908 |  | 0.7702 | 0.7617 | 0.7532 | 0.7445 | 0.7344 |
| Colorado | 0.1539 | 0.1612 | 0.1693 | 0.1777 | 0.1876 |  | 0.6768 | 0.6686 | 0.6595 | 0.6501 | 0.6375 |
| Comal | 0.2287 | 0.2249 | 0.2211 | 0.2171 | 0.2156 |  | 0.7575 | 0.7621 | 0.7668 | 0.7717 | 0.7739 |
| Comanche | 0.1646 | 0.1718 | 0.1795 | 0.1871 | 0.1957 |  | 0.8307 | 0.8235 | 0.8158 | 0.8082 | 0.7997 |
| Concho | 0.3919 | 0.4049 | 0.4184 | 0.4320 | 0.4458 |  | 0.6005 | 0.5877 | 0.5739 | 0.5604 | 0.5468 |
| Cooke | 0.0457 | 0.0468 | 0.0478 | 0.0488 | 0.0505 |  | 0.9060 | 0.9047 | 0.9036 | 0.9023 | 0.8997 |


| County | 1990 | 1992 | 1994 | 1996 | 1998 |  | 1990 | 1992 | 1994 | 1996 | 1998 |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Coryell | 0.0972 | 0.1004 | 0.1040 | 0.1101 | 0.1152 |  | 0.6660 | 0.6607 | 0.6513 | 0.6329 | 0.6214 |
| Cottle | 0.1633 | 0.1715 | 0.1803 | 0.1912 | 0.2036 |  | 0.7459 | 0.7350 | 0.7240 | 0.7105 | 0.6963 |
| Crane | 0.3386 | 0.3477 | 0.3566 | 0.3652 | 0.3753 |  | 0.6285 | 0.6197 | 0.6110 | 0.6026 | 0.5927 |
| Crockett | 0.4951 | 0.5007 | 0.5074 | 0.5137 | 0.5217 |  | 0.4951 | 0.4898 | 0.4834 | 0.4774 | 0.4699 |
| Crosby | 0.4257 | 0.4392 | 0.4530 | 0.4664 | 0.4829 |  | 0.5303 | 0.5172 | 0.5041 | 0.4909 | 0.4750 |
| Culberson | 0.7100 | 0.7155 | 0.7210 | 0.7279 | 0.7358 |  | 0.2794 | 0.2742 | 0.2686 | 0.2620 | 0.2547 |
| Dallam | 0.2104 | 0.2163 | 0.2222 | 0.2287 | 0.2353 |  | 0.7621 | 0.7564 | 0.7501 | 0.7435 | 0.7366 |
| Dallas | 0.1704 | 0.1751 | 0.1798 | 0.1845 | 0.1912 |  | 0.6031 | 0.5964 | 0.5902 | 0.5844 | 0.5745 |
| Dawson | 0.4261 | 0.4387 | 0.4466 | 0.4568 | 0.4713 |  | 0.5281 | 0.5151 | 0.4839 | 0.4680 | 0.4532 |
| Deaf Smith | 0.4882 | 0.5004 | 0.5127 | 0.5241 | 0.5393 |  | 0.4922 | 0.4798 | 0.4675 | 0.4563 | 0.4412 |
| Delta | 0.0138 | 0.0142 | 0.0146 | 0.0153 | 0.0161 |  | 0.8948 | 0.8925 | 0.8900 | 0.8882 | 0.8853 |
| Denton | 0.0695 | 0.0725 | 0.0755 | 0.0784 | 0.0826 |  | 0.8530 | 0.8492 | 0.8457 | 0.8426 | 0.8370 |
| DeWitt | 0.2421 | 0.2507 | 0.2599 | 0.2729 | 0.2836 |  | 0.6514 | 0.6414 | 0.6307 | 0.5961 | 0.5834 |
| Dickens | 0.1863 | 0.1956 | 0.2040 | 0.2135 | 0.2231 |  | 0.7643 | 0.7541 | 0.7443 | 0.7337 | 0.7231 |
| Dimmit | 0.8326 | 0.8359 | 0.8390 | 0.8415 | 0.8455 |  | 0.1590 | 0.1559 | 0.1530 | 0.1507 | 0.1467 |
| Donley | 0.0376 | 0.0393 | 0.0410 | 0.0419 | 0.0438 |  | 0.9242 | 0.9211 | 0.9183 | 0.9156 | 0.9119 |
| Duval | 0.8720 | 0.8743 | 0.8771 | 0.8634 | 0.8678 |  | 0.1242 | 0.1221 | 0.1194 | 0.1234 | 0.1197 |
| Eastland | 0.0758 | 0.0782 | 0.0805 | 0.0828 | 0.0856 |  | 0.8985 | 0.8962 | 0.8941 | 0.8912 | 0.8877 |
| Ector | 0.3136 | 0.3231 | 0.3326 | 0.3421 | 0.3554 |  | 0.6299 | 0.6197 | 0.6096 | 0.5997 | 0.5855 |
| Edwards | 0.5216 | 0.5266 | 0.5293 | 0.5330 | 0.5375 |  | 0.4748 | 0.4700 | 0.4674 | 0.4638 | 0.4595 |
| El Paso | 0.6959 | 0.7040 | 0.7098 | 0.7168 | 0.7264 |  | 0.2564 | 0.2484 | 0.2421 | 0.2352 | 0.2255 |
| Ellis | 0.1319 | 0.1362 | 0.1404 | 0.1445 | 0.1506 |  | 0.7624 | 0.7577 | 0.7531 | 0.7487 | 0.7407 |
| Erath | 0.0877 | 0.0941 | 0.1015 | 0.1091 | 0.1175 |  | 0.8981 | 0.8913 | 0.8835 | 0.8756 | 0.8670 |
| Falls | 0.1168 | 0.1220 | 0.1270 | 0.1325 | 0.1391 |  | 0.6124 | 0.6025 | 0.5939 | 0.5861 | 0.5759 |
| Fannin | 0.0196 | 0.0200 | 0.0204 | 0.0258 | 0.0262 |  | 0.9062 | 0.9042 | 0.9024 | 0.8826 | 0.8800 |
| Fayette | 0.0846 | 0.0894 | 0.0947 | 0.1005 | 0.1075 |  | 0.8302 | 0.8264 | 0.8218 | 0.8169 | 0.8105 |


| County | 1990 | 1992 | 1994 | 1996 | 1998 |  | 1990 | 1992 | 1994 | 1996 | 1998 |
| :--- | :---: | :---: | :---: | :---: | :---: | :--- | :--- | :--- | :--- | :--- | :--- |
| Fisher | 0.2055 | 0.2129 | 0.2214 | 0.2299 | 0.2392 |  | 0.7546 | 0.7453 | 0.7346 | 0.7242 | 0.7136 |
| Floyd | 0.3977 | 0.4118 | 0.4263 | 0.4413 | 0.4583 |  | 0.5606 | 0.5464 | 0.5318 | 0.5169 | 0.4996 |
| Foard | 0.1299 | 0.1350 | 0.1398 | 0.1444 | 0.1503 |  | 0.8239 | 0.8186 | 0.8129 | 0.8077 | 0.8011 |
| Fort Bend | 0.1951 | 0.1960 | 0.1970 | 0.1980 | 0.2013 |  | 0.5400 | 0.5336 | 0.5260 | 0.5179 | 0.5054 |
| Franklin | 0.0458 | 0.0465 | 0.0471 | 0.0476 | 0.0487 |  | 0.9028 | 0.9027 | 0.9024 | 0.9025 | 0.9015 |
| Freestone | 0.0391 | 0.0401 | 0.0520 | 0.0562 | 0.0572 |  | 0.7667 | 0.7659 | 0.7370 | 0.7288 | 0.7262 |
| Frio | 0.7234 | 0.7049 | 0.7089 | 0.7043 | 0.7105 |  | 0.2610 | 0.2558 | 0.2540 | 0.2509 | 0.2470 |
| Gaines | 0.3260 | 0.3325 | 0.3394 | 0.3463 | 0.3570 |  | 0.6448 | 0.6382 | 0.6313 | 0.6246 | 0.6137 |
| Galveston | 0.1423 | 0.1475 | 0.1529 | 0.1587 | 0.1665 |  | 0.6672 | 0.6597 | 0.6519 | 0.6437 | 0.6310 |
| Garza | 0.2823 | 0.2902 | 0.2981 | 0.3073 | 0.3168 |  | 0.6529 | 0.6439 | 0.6346 | 0.6255 | 0.6151 |
| Gillespie | 0.1408 | 0.1474 | 0.1549 | 0.1623 | 0.1712 |  | 0.8535 | 0.8470 | 0.8397 | 0.8324 | 0.8235 |
| Glasscock | 0.2930 | 0.3005 | 0.3064 | 0.3131 | 0.3190 |  | 0.7035 | 0.6961 | 0.6903 | 0.6837 | 0.6773 |
| Goliad | 0.3584 | 0.3617 | 0.3665 | 0.3707 | 0.3774 |  | 0.5726 | 0.5696 | 0.5654 | 0.5613 | 0.5545 |
| Gonzales | 0.3566 | 0.3663 | 0.3760 | 0.3864 | 0.3999 |  | 0.5468 | 0.5364 | 0.5260 | 0.5150 | 0.5006 |
| Gray | 0.0790 | 0.0818 | 0.0847 | 0.0931 | 0.0969 |  | 0.8704 | 0.8667 | 0.8627 | 0.8367 | 0.8310 |
| Grayson | 0.0294 | 0.0320 | 0.0349 | 0.0379 | 0.0417 |  | 0.8877 | 0.8830 | 0.8781 | 0.8732 | 0.8663 |
| Gregg | 0.0359 | 0.0382 | 0.0405 | 0.0429 | 0.0460 |  | 0.7661 | 0.7628 | 0.7594 | 0.7568 | 0.7509 |
| Grimes | 0.1409 | 0.1432 | 0.1481 | 0.1513 | 0.1555 |  | 0.6139 | 0.6149 | 0.6096 | 0.6096 | 0.6059 |
| Guadalupe | 0.2965 | 0.3051 | 0.3134 | 0.3219 | 0.3341 |  | 0.6398 | 0.6317 | 0.6240 | 0.6160 | 0.6038 |
| Hale | 0.4159 | 0.4283 | 0.4407 | 0.4506 | 0.4665 |  | 0.5250 | 0.5119 | 0.4987 | 0.4843 | 0.4678 |
| Hall | 0.1862 | 0.1949 | 0.2038 | 0.2131 | 0.2230 |  | 0.7303 | 0.7198 | 0.7097 | 0.6988 | 0.6863 |
| Hamilton | 0.0521 | 0.0540 | 0.0556 | 0.0572 | 0.0595 |  | 0.9422 | 0.9404 | 0.9389 | 0.9371 | 0.9351 |
| Hansford | 0.2004 | 0.2084 | 0.2160 | 0.2233 | 0.2312 |  | 0.7936 | 0.7857 | 0.7779 | 0.7708 | 0.7628 |
| Hardeman | 0.1115 | 0.1171 | 0.1224 | 0.1279 | 0.1337 |  | 0.8204 | 0.8132 | 0.8065 | 0.7992 | 0.7922 |
| Hardin | 0.0164 | 0.0165 | 0.0168 | 0.0171 | 0.0174 |  | 0.8958 | 0.8931 | 0.8898 | 0.8865 | 0.8817 |
| Harris | 0.2290 | 0.2364 | 0.2438 | 0.2514 | 0.2614 |  | 0.5438 | 0.5349 | 0.5266 | 0.5185 | 0.5061 |


| County | 1990 | 1992 | 1994 | 1996 | 1998 |  | 1990 | 1992 | 1994 | 1996 | 1998 |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Harrison | 0.0222 | 0.0231 | 0.0245 | 0.0258 | 0.0274 |  | 0.6944 | 0.6911 | 0.6871 | 0.6839 | 0.6770 |
| Hartley | 0.0553 | 0.0578 | 0.0601 | 0.1273 | 0.1286 |  | 0.9329 | 0.9299 | 0.9276 | 0.7643 | 0.7627 |
| Haskell | 0.1921 | 0.2009 | 0.2095 | 0.2188 | 0.2291 |  | 0.7673 | 0.7574 | 0.7480 | 0.7376 | 0.7265 |
| Hays | 0.2779 | 0.2774 | 0.2784 | 0.2773 | 0.2785 |  | 0.6814 | 0.6827 | 0.6824 | 0.6820 | 0.6812 |
| Hemphill | 0.1108 | 0.1138 | 0.1166 | 0.1192 | 0.1233 |  | 0.8809 | 0.8780 | 0.8754 | 0.8729 | 0.8687 |
| Henderson | 0.0404 | 0.0410 | 0.0417 | 0.0423 | 0.0432 |  | 0.8738 | 0.8738 | 0.8739 | 0.8743 | 0.8734 |
| Hidalgo | 0.8524 | 0.8622 | 0.8714 | 0.8790 | 0.8884 |  | 0.1418 | 0.1320 | 0.1229 | 0.1147 | 0.1054 |
| Hill | 0.0820 | 0.0843 | 0.0865 | 0.0887 | 0.0919 |  | 0.8221 | 0.8184 | 0.8147 | 0.8110 | 0.8052 |
| Hockley | 0.3160 | 0.3245 | 0.3335 | 0.3423 | 0.3543 |  | 0.6374 | 0.6280 | 0.6185 | 0.6091 | 0.5965 |
| Hood | 0.0466 | 0.0478 | 0.0490 | 0.0501 | 0.0517 |  | 0.9410 | 0.9399 | 0.9387 | 0.9376 | 0.9359 |
| Hopkins | 0.0487 | 0.0511 | 0.0537 | 0.0567 | 0.0603 |  | 0.8589 | 0.8563 | 0.8533 | 0.8504 | 0.8459 |
| Houston | 0.0451 | 0.0464 | 0.0483 | 0.0540 | 0.0554 |  | 0.6571 | 0.6531 | 0.6487 | 0.6387 | 0.6330 |
| Howard | 0.2659 | 0.2730 | 0.2805 | 0.2871 | 0.2972 |  | 0.6879 | 0.6802 | 0.6718 | 0.6647 | 0.6536 |
| Hudspeth | 0.6638 | 0.6714 | 0.6799 | 0.6879 | 0.6969 |  | 0.3280 | 0.3206 | 0.3124 | 0.3043 | 0.2956 |
| Hunt | 0.0446 | 0.0474 | 0.0502 | 0.0531 | 0.0568 |  | 0.8416 | 0.8365 | 0.8312 | 0.8261 | 0.8188 |
| Hutchinson | 0.0976 | 0.1015 | 0.1054 | 0.1095 | 0.1150 |  | 0.8612 | 0.8566 | 0.8522 | 0.8476 | 0.8410 |
| Irion | 0.2363 | 0.2429 | 0.2488 | 0.2529 | 0.2578 |  | 0.7612 | 0.7547 | 0.7488 | 0.7448 | 0.7399 |
| Jack | 0.0332 | 0.0341 | 0.0349 | 0.0357 | 0.0372 |  | 0.9555 | 0.9547 | 0.9542 | 0.9536 | 0.9519 |
| Jackson | 0.2123 | 0.2169 | 0.2217 | 0.2266 | 0.2337 |  | 0.6941 | 0.6893 | 0.6838 | 0.6784 | 0.6700 |
| Jasper | 0.0191 | 0.0192 | 0.0194 | 0.0196 | 0.0198 |  | 0.7888 | 0.7854 | 0.7815 | 0.7781 | 0.7722 |
| Jeff Davis | 0.3957 | 0.4028 | 0.4096 | 0.4146 | 0.4197 |  | 0.5935 | 0.5865 | 0.5798 | 0.5750 | 0.5696 |
| Jefferson | 0.0527 | 0.0549 | 0.0590 | 0.0634 | 0.0664 |  | 0.6163 | 0.6088 | 0.5989 | 0.5891 | 0.5785 |
| Jim Hogg | 0.9119 | 0.9133 | 0.9141 | 0.9147 | 0.9162 |  | 0.0834 | 0.0821 | 0.0812 | 0.0807 | 0.0792 |
| Jim Wells | 0.7217 | 0.7258 | 0.7297 | 0.7339 | 0.7408 |  | 0.2684 | 0.2643 | 0.2606 | 0.2565 | 0.2496 |
| Johnson | 0.0767 | 0.0804 | 0.0843 | 0.0907 | 0.0962 |  | 0.8901 | 0.8862 | 0.8819 | 0.8722 | 0.8661 |
| Jones | 0.1687 | 0.1744 | 0.1932 | 0.2024 | 0.2096 |  | 0.7870 | 0.7808 | 0.7170 | 0.6987 | 0.6914 |


| County | 1990 | 1992 | 1994 | 1996 | 1998 |  | 1990 | 1992 | 1994 | 1996 | 1998 |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Karnes | 0.4747 | 0.4784 | 0.4820 | 0.4567 | 0.4647 |  | 0.4932 | 0.4896 | 0.4863 | 0.4440 | 0.4386 |
| Kaufman | 0.0639 | 0.0668 | 0.0702 | 0.0735 | 0.0782 |  | 0.7899 | 0.7888 | 0.7875 | 0.7870 | 0.7835 |
| Kendall | 0.1638 | 0.1646 | 0.1656 | 0.1665 | 0.1686 |  | 0.8266 | 0.8262 | 0.8258 | 0.8255 | 0.8239 |
| Kenedy | 0.7870 | 0.7895 | 0.7901 | 0.7932 | 0.7961 |  | 0.2022 | 0.2000 | 0.1996 | 0.1968 | 0.1942 |
| Kent | 0.1188 | 0.1243 | 0.1299 | 0.1344 | 0.1392 |  | 0.8743 | 0.8688 | 0.8632 | 0.8587 | 0.8539 |
| Kerr | 0.1649 | 0.1729 | 0.1810 | 0.1892 | 0.1995 |  | 0.8077 | 0.8005 | 0.7930 | 0.7857 | 0.7760 |
| Kimble | 0.1873 | 0.1980 | 0.2096 | 0.2230 | 0.2375 |  | 0.8083 | 0.7977 | 0.7861 | 0.7727 | 0.7583 |
| King | 0.1497 | 0.1528 | 0.1553 | 0.1578 | 0.1597 |  | 0.8503 | 0.8472 | 0.8447 | 0.8422 | 0.8403 |
| Kinney | 0.5034 | 0.5136 | 0.5250 | 0.5376 | 0.5514 |  | 0.4697 | 0.4598 | 0.4488 | 0.4365 | 0.4224 |
| Kleberg | 0.6121 | 0.6165 | 0.6200 | 0.6248 | 0.6334 |  | 0.3403 | 0.3357 | 0.3318 | 0.3269 | 0.3180 |
| Knox | 0.2245 | 0.2332 | 0.2418 | 0.2501 | 0.2589 |  | 0.7027 | 0.6924 | 0.6823 | 0.6720 | 0.6612 |
| La Salle | 0.7743 | 0.7793 | 0.7400 | 0.7479 | 0.7535 |  | 0.2101 | 0.2055 | 0.2036 | 0.2013 | 0.1969 |
| Lamar | 0.0108 | 0.0112 | 0.0115 | 0.0118 | 0.0122 |  | 0.8321 | 0.8286 | 0.8248 | 0.8211 | 0.8150 |
| Lamb | 0.3651 | 0.3771 | 0.3894 | 0.4026 | 0.4184 |  | 0.5778 | 0.5654 | 0.5524 | 0.5389 | 0.5224 |
| Lampasas | 0.1295 | 0.1362 | 0.1436 | 0.1517 | 0.1611 |  | 0.8383 | 0.8330 | 0.8268 | 0.8200 | 0.8115 |
| Lavaca | 0.0853 | 0.0885 | 0.0921 | 0.0958 | 0.1002 |  | 0.8411 | 0.8372 | 0.8330 | 0.8288 | 0.8234 |
| Lee | 0.1095 | 0.1157 | 0.1226 | 0.1302 | 0.1393 |  | 0.7511 | 0.7482 | 0.7447 | 0.7405 | 0.7338 |
| Leon | 0.0402 | 0.0407 | 0.0410 | 0.0418 | 0.0427 |  | 0.8298 | 0.8332 | 0.8358 | 0.8381 | 0.8393 |
| Liberty | 0.0545 | 0.0589 | 0.0641 | 0.0743 | 0.0802 |  | 0.8102 | 0.8025 | 0.7913 | 0.7603 | 0.7495 |
| Limestone | 0.0696 | 0.0736 | 0.0780 | 0.0828 | 0.0887 |  | 0.7278 | 0.7226 | 0.7162 | 0.7100 | 0.7002 |
| Lipscomb | 0.1206 | 0.1249 | 0.1295 | 0.1338 | 0.1390 |  | 0.8670 | 0.8627 | 0.8577 | 0.8535 | 0.8477 |
| Live Oak | 0.3476 | 0.3566 | 0.3665 | 0.3762 | 0.3897 |  | 0.6450 | 0.6362 | 0.6265 | 0.6169 | 0.6036 |
| Llano | 0.0389 | 0.0395 | 0.0399 | 0.0406 | 0.0411 |  | 0.9545 | 0.9542 | 0.9540 | 0.9535 | 0.9531 |
| Loving | 0.1308 | 0.1284 | 0.1273 | 0.1250 | 0.1228 |  | 0.8692 | 0.8716 | 0.8727 | 0.8750 | 0.8772 |
| Lubbock | 0.2290 | 0.2360 | 0.2428 | 0.2497 | 0.2591 |  | 0.6810 | 0.6723 | 0.6639 | 0.6547 | 0.6430 |
| Lynn | 0.4168 | 0.4272 | 0.4383 | 0.4485 | 0.4609 |  | 0.5456 | 0.5349 | 0.5236 | 0.5129 | 0.5001 |


| County | 1990 | 1992 | 1994 | 1996 | 1998 |  | 1990 | 1992 | 1994 | 1996 | 1998 |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Madison | 0.1077 | 0.1104 | 0.1137 | 0.1148 | 0.1169 |  | 0.6522 | 0.6469 | 0.6432 | 0.6456 | 0.6425 |
| Marion | 0.0147 | 0.0153 | 0.0157 | 0.0162 | 0.0168 |  | 0.6708 | 0.6687 | 0.6661 | 0.6631 | 0.6556 |
| Martin | 0.3951 | 0.4042 | 0.4131 | 0.4219 | 0.4322 |  | 0.5821 | 0.5731 | 0.5642 | 0.5558 | 0.5458 |
| Mason | 0.1960 | 0.2048 | 0.2134 | 0.2231 | 0.2332 |  | 0.7990 | 0.7903 | 0.7816 | 0.7717 | 0.7616 |
| Matagorda | 0.2461 | 0.2532 | 0.2602 | 0.2674 | 0.2773 |  | 0.5936 | 0.5862 | 0.5783 | 0.5708 | 0.5589 |
| Maverick | 0.9362 | 0.9373 | 0.9380 | 0.9384 | 0.9394 |  | 0.0434 | 0.0419 | 0.0405 | 0.0391 | 0.0373 |
| McCulloch | 0.2637 | 0.2758 | 0.2887 | 0.3019 | 0.3183 |  | 0.7168 | 0.7046 | 0.6916 | 0.6779 | 0.6614 |
| McLennan | 0.1249 | 0.1296 | 0.1342 | 0.1387 | 0.1452 |  | 0.7118 | 0.7047 | 0.6982 | 0.6920 | 0.6819 |
| McMullen | 0.3917 | 0.4024 | 0.4128 | 0.4209 | 0.4302 |  | 0.6034 | 0.5928 | 0.5824 | 0.5744 | 0.5652 |
| Medina | 0.4440 | 0.4439 | 0.4402 | 0.4375 | 0.4412 |  | 0.5472 | 0.5475 | 0.5374 | 0.5325 | 0.5300 |
| Menard | 0.3224 | 0.3322 | 0.3426 | 0.3525 | 0.3646 |  | 0.6710 | 0.6612 | 0.6508 | 0.6409 | 0.6288 |
| Midland | 0.2135 | 0.2222 | 0.2307 | 0.2395 | 0.2511 |  | 0.6995 | 0.6912 | 0.6828 | 0.6744 | 0.6622 |
| Milam | 0.1504 | 0.1587 | 0.1675 | 0.1768 | 0.1878 |  | 0.7206 | 0.7126 | 0.7036 | 0.6946 | 0.6822 |
| Mills | 0.1068 | 0.1116 | 0.1170 | 0.1224 | 0.1265 |  | 0.8892 | 0.8845 | 0.8791 | 0.8738 | 0.8695 |
| Mitchell | 0.2978 | 0.3082 | 0.3187 | 0.3282 | 0.3392 |  | 0.6543 | 0.6433 | 0.5899 | 0.5668 | 0.5559 |
| Montague | 0.0317 | 0.0330 | 0.0344 | 0.0358 | 0.0374 |  | 0.9631 | 0.9616 | 0.9602 | 0.9589 | 0.9571 |
| Montgomery | 0.0726 | 0.0765 | 0.0804 | 0.0843 | 0.0897 |  | 0.8757 | 0.8723 | 0.8689 | 0.8654 | 0.8597 |
| Moore | 0.3187 | 0.3284 | 0.3385 | 0.3480 | 0.3601 |  | 0.6565 | 0.6468 | 0.6365 | 0.6267 | 0.6143 |
| Morris | 0.0181 | 0.0185 | 0.0189 | 0.0193 | 0.0200 |  | 0.7320 | 0.7290 | 0.7259 | 0.7234 | 0.7178 |
| Motley | 0.0888 | 0.0922 | 0.0963 | 0.0995 | 0.1049 |  | 0.8610 | 0.8562 | 0.8507 | 0.8461 | 0.8387 |
| Nacogdoches | 0.0508 | 0.0548 | 0.0594 | 0.0641 | 0.0698 |  | 0.7780 | 0.7726 | 0.7658 | 0.7600 | 0.7523 |
| Navarro | 0.0723 | 0.0772 | 0.0825 | 0.0879 | 0.0944 |  | 0.7298 | 0.7243 | 0.7183 | 0.7127 | 0.7041 |
| Newton | 0.0113 | 0.0112 | 0.0111 | 0.0109 | 0.0110 |  | 0.7613 | 0.7599 | 0.7581 | 0.7564 | 0.7527 |
| Nolan | 0.2556 | 0.2628 | 0.2706 | 0.2769 | 0.2866 |  | 0.6950 | 0.6877 | 0.6811 | 0.6728 | 0.6628 |
| Nueces | 0.5221 | 0.5291 | 0.5360 | 0.5434 | 0.5545 |  | 0.4256 | 0.4175 | 0.4093 | 0.4007 | 0.3879 |
| Ochiltree | 0.1796 | 0.1870 | 0.1940 | 0.2008 | 0.2098 |  | 0.8086 | 0.8010 | 0.7941 | 0.7873 | 0.7782 |


| County | 1990 | 1992 | 1994 | 1996 | 1998 |  | 1990 | 1992 | 1994 | 1996 | 1998 |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Oldham | 0.0878 | 0.0906 | 0.0928 | 0.0949 | 0.0978 |  | 0.8881 | 0.8854 | 0.8826 | 0.8809 | 0.8781 |
| Orange | 0.0240 | 0.0249 | 0.0259 | 0.0270 | 0.0285 |  | 0.8841 | 0.8811 | 0.8778 | 0.8745 | 0.8692 |
| Palo Pinto | 0.0918 | 0.0990 | 0.1070 | 0.1160 | 0.1268 |  | 0.8670 | 0.8595 | 0.8511 | 0.8417 | 0.8302 |
| Panola | 0.0216 | 0.0223 | 0.0230 | 0.0236 | 0.0242 |  | 0.7911 | 0.7896 | 0.7878 | 0.7860 | 0.7819 |
| Parker | 0.0416 | 0.0435 | 0.0455 | 0.0475 | 0.0503 |  | 0.9414 | 0.9397 | 0.9376 | 0.9357 | 0.9327 |
| Parmer | 0.4149 | 0.4273 | 0.4399 | 0.4522 | 0.4675 |  | 0.5685 | 0.5559 | 0.5433 | 0.5310 | 0.5158 |
| Pecos | 0.5674 | 0.5756 | 0.5744 | 0.5634 | 0.5750 |  | 0.4236 | 0.4154 | 0.4009 | 0.3822 | 0.3714 |
| Polk | 0.0525 | 0.0532 | 0.0539 | 0.0726 | 0.0728 |  | 0.8005 | 0.8059 | 0.8108 | 0.7741 | 0.7788 |
| Potter | 0.1967 | 0.2040 | 0.2110 | 0.2177 | 0.2269 |  | 0.6848 | 0.6749 | 0.6656 | 0.6497 | 0.6376 |
| Presidio | 0.8159 | 0.8208 | 0.8264 | 0.8316 | 0.8382 |  | 0.1810 | 0.1762 | 0.1706 | 0.1653 | 0.1589 |
| Rains | 0.0235 | 0.0234 | 0.0234 | 0.0233 | 0.0239 |  | 0.9287 | 0.9294 | 0.9298 | 0.9300 | 0.9292 |
| Randall | 0.0684 | 0.0728 | 0.0777 | 0.0827 | 0.0892 |  | 0.9081 | 0.9033 | 0.8978 | 0.8921 | 0.8845 |
| Reagan | 0.4296 | 0.4381 | 0.4469 | 0.4550 | 0.4665 |  | 0.5450 | 0.5369 | 0.5288 | 0.5212 | 0.5104 |
| Real | 0.2380 | 0.2420 | 0.2465 | 0.2519 | 0.2593 |  | 0.7529 | 0.7491 | 0.7444 | 0.7392 | 0.7320 |
| Red River | 0.0191 | 0.0198 | 0.0204 | 0.0211 | 0.0220 |  | 0.7760 | 0.7718 | 0.7671 | 0.7626 | 0.7562 |
| Reeves | 0.7280 | 0.7370 | 0.7455 | 0.7533 | 0.7634 |  | 0.2471 | 0.2379 | 0.2295 | 0.2216 | 0.2116 |
| Refugio | 0.3963 | 0.4040 | 0.4112 | 0.4177 | 0.4249 |  | 0.5248 | 0.5167 | 0.5090 | 0.5024 | 0.4942 |
| Roberts | 0.0332 | 0.0339 | 0.0354 | 0.0369 | 0.0381 |  | 0.9639 | 0.9632 | 0.9617 | 0.9603 | 0.9591 |
| Robertson | 0.1226 | 0.1256 | 0.1285 | 0.1318 | 0.1357 |  | 0.6044 | 0.6021 | 0.5990 | 0.5959 | 0.5894 |
| Rockwall | 0.0585 | 0.0606 | 0.0627 | 0.0651 | 0.0680 |  | 0.8982 | 0.8989 | 0.8992 | 0.8992 | 0.8981 |
| Runnels | 0.2423 | 0.2492 | 0.2558 | 0.2619 | 0.2704 |  | 0.7390 | 0.7321 | 0.7256 | 0.7196 | 0.7114 |
| Rusk | 0.0396 | 0.0422 | 0.0449 | 0.0497 | 0.0538 |  | 0.7524 | 0.7486 | 0.7447 | 0.7364 | 0.7294 |
| Sabine | 0.0116 | 0.0115 | 0.0115 | 0.0114 | 0.0113 |  | 0.8701 | 0.8716 | 0.8728 | 0.8728 | 0.8709 |
| San Augustine | 0.0173 | 0.0177 | 0.0183 | 0.0189 | 0.0200 |  | 0.7010 | 0.6938 | 0.6882 | 0.6822 | 0.6727 |
| San Jacinto | 0.0263 | 0.0262 | 0.0259 | 0.0258 | 0.0257 |  | 0.8137 | 0.8187 | 0.8232 | 0.8280 | 0.8305 |
| San Patricio | 0.5071 | 0.5115 | 0.5154 | 0.5190 | 0.5268 |  | 0.4716 | 0.4677 | 0.4641 | 0.4607 | 0.4532 |


| County | 1990 | 1992 | 1994 | 1996 | 1998 |  | 1990 | 1992 | 1994 | 1996 | 1998 |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| San Saba | 0.1844 | 0.1976 | 0.2071 | 0.2124 | 0.2202 |  | 0.8102 | 0.7529 | 0.7328 | 0.7648 | 0.7568 |
| Schleicher | 0.3545 | 0.3624 | 0.3692 | 0.3764 | 0.3819 |  | 0.6355 | 0.6277 | 0.6212 | 0.6142 | 0.6090 |
| Scurry | 0.2388 | 0.2467 | 0.2554 | 0.2651 | 0.2763 |  | 0.7096 | 0.7013 | 0.6914 | 0.6776 | 0.6657 |
| Shackelford | 0.0820 | 0.0860 | 0.0900 | 0.0942 | 0.0988 |  | 0.9095 | 0.9056 | 0.9016 | 0.8974 | 0.8929 |
| Shelby | 0.0244 | 0.0253 | 0.0260 | 0.0269 | 0.0281 |  | 0.7589 | 0.7552 | 0.7519 | 0.7492 | 0.7436 |
| Sherman | 0.1882 | 0.1939 | 0.1995 | 0.2055 | 0.2122 |  | 0.8055 | 0.7999 | 0.7944 | 0.7885 | 0.7819 |
| Smith | 0.0593 | 0.0633 | 0.0676 | 0.0721 | 0.0778 |  | 0.7264 | 0.7230 | 0.7198 | 0.7169 | 0.7106 |
| Somervell | 0.1397 | 0.1424 | 0.1448 | 0.1481 | 0.1517 |  | 0.8489 | 0.8461 | 0.8434 | 0.8401 | 0.8368 |
| Starr | 0.9721 | 0.9733 | 0.9743 | 0.9754 | 0.9766 |  | 0.0249 | 0.0238 | 0.0229 | 0.0218 | 0.0207 |
| Stephens | 0.0851 | 0.0882 | 0.0908 | 0.0981 | 0.1012 |  | 0.8828 | 0.8796 | 0.8769 | 0.8538 | 0.8509 |
| Sterling | 0.2545 | 0.2600 | 0.2662 | 0.2707 | 0.2796 |  | 0.7420 | 0.7366 | 0.7304 | 0.7260 | 0.7171 |
| Stonewall | 0.1177 | 0.1223 | 0.1267 | 0.1311 | 0.1365 |  | 0.8331 | 0.8281 | 0.8240 | 0.8184 | 0.8109 |
| Sutton | 0.4508 | 0.4562 | 0.4631 | 0.4701 | 0.4779 |  | 0.5437 | 0.5384 | 0.5317 | 0.5247 | 0.5170 |
| Swisher | 0.3067 | 0.3147 | 0.3232 | 0.3348 | 0.3475 |  | 0.6466 | 0.6207 | 0.5988 | 0.5899 | 0.5765 |
| Tarrant | 0.1196 | 0.1240 | 0.1286 | 0.1333 | 0.1398 |  | 0.7340 | 0.7279 | 0.7218 | 0.7159 | 0.7062 |
| Taylor | 0.1462 | 0.1502 | 0.1541 | 0.1578 | 0.1640 |  | 0.7777 | 0.7725 | 0.7675 | 0.7628 | 0.7546 |
| Terrell | 0.5326 | 0.5388 | 0.5461 | 0.5541 | 0.5646 |  | 0.4617 | 0.4556 | 0.4483 | 0.4405 | 0.4301 |
| Terry | 0.3926 | 0.4025 | 0.4132 | 0.4181 | 0.4320 |  | 0.5671 | 0.5567 | 0.5454 | 0.5274 | 0.5128 |
| Throckmorton | 0.0723 | 0.0753 | 0.0780 | 0.0804 | 0.0838 |  | 0.9213 | 0.9184 | 0.9157 | 0.9133 | 0.9099 |
| Titus | 0.1063 | 0.1132 | 0.1203 | 0.1276 | 0.1365 |  | 0.7554 | 0.7478 | 0.7400 | 0.7328 | 0.7228 |
| Tom Green | 0.2589 | 0.2684 | 0.2784 | 0.2878 | 0.3007 |  | 0.6879 | 0.6769 | 0.6660 | 0.6557 | 0.6412 |
| Travis | 0.2112 | 0.2175 | 0.2238 | 0.2298 | 0.2384 |  | 0.6525 | 0.6444 | 0.6365 | 0.6290 | 0.6171 |
| Trinity | 0.0238 | 0.0238 | 0.0239 | 0.0240 | 0.0245 |  | 0.8288 | 0.8300 | 0.8309 | 0.8311 | 0.8299 |
| Tyler | 0.0106 | 0.0238 | 0.0282 | 0.0288 | 0.0289 |  | 0.8668 | 0.8342 | 0.8234 | 0.8222 | 0.8211 |
| Upshur | 0.0204 | 0.0216 | 0.0227 | 0.0241 | 0.0257 |  | 0.8518 | 0.8507 | 0.8492 | 0.8479 | 0.8445 |
| Upton | 0.3742 | 0.3825 | 0.3906 | 0.3985 | 0.4080 |  | 0.6004 | 0.5924 | 0.5845 | 0.5770 | 0.5670 |


| County | 1990 | 1992 | 1994 | 1996 | 1998 |  | 1990 | 1992 | 1994 | 1996 | 1998 |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Uvalde | 0.6041 | 0.6121 | 0.6206 | 0.6285 | 0.6409 |  | 0.3875 | 0.3795 | 0.3711 | 0.3632 | 0.3507 |
| Val Verde | 0.7049 | 0.7097 | 0.7154 | 0.7206 | 0.7298 |  | 0.2696 | 0.2646 | 0.2586 | 0.2535 | 0.2444 |
| Van Zandt | 0.0399 | 0.0399 | 0.0398 | 0.0396 | 0.0399 |  | 0.9171 | 0.9175 | 0.9181 | 0.9190 | 0.9188 |
| Victoria | 0.3409 | 0.3476 | 0.3537 | 0.3603 | 0.3712 |  | 0.5901 | 0.5836 | 0.5778 | 0.5713 | 0.5603 |
| Walker | 0.1078 | 0.1110 | 0.1137 | 0.1155 | 0.1188 |  | 0.6457 | 0.6395 | 0.6366 | 0.6368 | 0.6322 |
| Waller | 0.1106 | 0.1193 | 0.1273 | 0.1358 | 0.1459 |  | 0.5114 | 0.5080 | 0.5017 | 0.4938 | 0.4816 |
| Ward | 0.3680 | 0.3764 | 0.3847 | 0.3929 | 0.4046 |  | 0.5901 | 0.5810 | 0.5725 | 0.5641 | 0.5521 |
| Washington | 0.0442 | 0.0463 | 0.0487 | 0.0511 | 0.0540 |  | 0.7392 | 0.7377 | 0.7364 | 0.7357 | 0.7320 |
| Webb | 0.9387 | 0.9425 | 0.9460 | 0.9494 | 0.9534 |  | 0.0560 | 0.0524 | 0.0490 | 0.0457 | 0.0419 |
| Wharton | 0.2526 | 0.2596 | 0.2671 | 0.2747 | 0.2853 |  | 0.5886 | 0.5815 | 0.5745 | 0.5673 | 0.5559 |
| Wheeler | 0.0643 | 0.0674 | 0.0706 | 0.0738 | 0.0782 |  | 0.9017 | 0.8982 | 0.8946 | 0.8905 | 0.8854 |
| Wichita | 0.0862 | 0.0903 | 0.0941 | 0.1013 | 0.1066 |  | 0.8030 | 0.7974 | 0.7915 | 0.7753 | 0.7665 |
| Wilbarger | 0.1444 | 0.1489 | 0.1538 | 0.1590 | 0.1655 |  | 0.7570 | 0.7512 | 0.7454 | 0.7393 | 0.7312 |
| Willacy | 0.8434 | 0.8508 | 0.8579 | 0.8648 | 0.8730 |  | 0.1499 | 0.1426 | 0.1356 | 0.1289 | 0.1209 |
| Williamson | 0.1433 | 0.1460 | 0.1488 | 0.1515 | 0.1565 |  | 0.7944 | 0.7914 | 0.7886 | 0.7858 | 0.7798 |
| Wilson | 0.3552 | 0.3527 | 0.3505 | 0.3482 | 0.3497 |  | 0.6307 | 0.6337 | 0.6365 | 0.6394 | 0.6385 |
| Winkler | 0.3675 | 0.3782 | 0.3889 | 0.4001 | 0.4146 |  | 0.6077 | 0.5976 | 0.5875 | 0.5768 | 0.5629 |
| Wise | 0.0767 | 0.0802 | 0.0839 | 0.0908 | 0.0961 |  | 0.9043 | 0.9011 | 0.8976 | 0.8864 | 0.8817 |
| Wood | 0.0268 | 0.0285 | 0.0301 | 0.0333 | 0.0356 |  | 0.8875 | 0.8871 | 0.8865 | 0.8815 | 0.8804 |
| Yoakum | 0.3659 | 0.3749 | 0.3837 | 0.3919 | 0.4036 |  | 0.6198 | 0.6112 | 0.6024 | 0.5944 | 0.5826 |
| Young | 0.0641 | 0.0667 | 0.0691 | 0.0716 | 0.0747 |  | 0.9161 | 0.9134 | 0.9110 | 0.9085 | 0.9051 |
| Zapata | 0.8101 | 0.8221 | 0.8347 | 0.8459 | 0.8580 |  | 0.1864 | 0.1746 | 0.1622 | 0.1509 | 0.1389 |
| Zavala | 0.8941 | 0.8967 | 0.8993 | 0.9019 | 0.9058 |  | 0.0787 | 0.0766 | 0.0745 | 0.0728 | 0.0695 |

Table A9 Appendix: Latino and White Voter Registration in Texas, 1990-1998

|  | Latinos |  |  |  |  |  |  |  |  |  |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| County | 1990 |  | 1992 |  | 1994 |  | 1996 |  | 1998 |  |
| Anderson | 0.8028 | $(0.1106)$ | 0.791 | $(0.0633)$ | 0.6568 | $(0.2057)$ | 0.8147 | $(0.0607)$ | 0.5476 | $(0.2589)$ |
| Andrews | 0.7656 | $(0.0818)$ | 0.7064 | $(0.0698)$ | 0.5207 | $(0.1770)$ | 0.73 | $(0.0572)$ | 0.7092 | $(0.1581)$ |
| Angelina | 0.7948 | $(0.0808)$ | 0.7502 | $(0.0700)$ | 0.6639 | $(0.2078)$ | 0.8296 | $(0.0620)$ | 0.6236 | $(0.1897)$ |
| Aransas | 0.7339 | $(0.0911)$ | 0.6915 | $(0.0824)$ | 0.5698 | $(0.1950)$ | 0.76 | $(0.0689)$ | 0.6078 | $(0.2292)$ |
| Archer | 0.864 | $(0.0979)$ | 0.845 | $(0.0839)$ | 0.7043 | $(0.1824)$ | 0.8684 | $(0.0912)$ | 0.5579 | $(0.2577)$ |
| Armstrong | 0.8751 | $(0.0962)$ | 0.8751 | $(0.0675)$ | 0.7099 | $(0.1863)$ | 0.868 | $(0.0772)$ | 0.5311 | $(0.2398)$ |
| Atacosa | 0.8021 | $(0.0594)$ | 0.7671 | $(0.0410)$ | 0.6915 | $(0.0950)$ | 0.6833 | $(0.0378)$ | 0.6549 | $(0.1479)$ |
| Austin | 0.7919 | $(0.0809)$ | 0.7634 | $(0.0814)$ | 0.6507 | $(0.1997)$ | 0.8154 | $(0.0606)$ | 0.5923 | $(0.2260)$ |
| Bailey | 0.7949 | $(0.0621)$ | 0.7532 | $(0.0548)$ | 0.6458 | $(0.1500)$ | 0.7709 | $(0.0509)$ | 0.6654 | $(0.1632)$ |
| Bandera | 0.8262 | $(0.0924)$ | 0.8007 | $(0.0700)$ | 0.6596 | $(0.2121)$ | 0.8446 | $(0.0660)$ | 0.5934 | $(0.2098)$ |
| Bastrop | 0.8284 | $(0.0713)$ | 0.7765 | $(0.0604)$ | 0.6352 | $(0.1841)$ | 0.8098 | $(0.0547)$ | 0.6411 | $(0.1982)$ |
| Baylor | 0.8905 | $(0.0784)$ | 0.8614 | $(0.0788)$ | 0.7101 | $(0.1793)$ | 0.8855 | $(0.0690)$ | 0.5606 | $(0.2061)$ |
| Bee | 0.8442 | $(0.0508)$ | 0.8851 | $(0.0451)$ | 0.7065 | $(0.0936)$ | 0.8598 | $(0.0327)$ | 0.8341 | $(0.0818)$ |
| Bell | 0.6328 | $(0.1100)$ | 0.6062 | $(0.1010)$ | 0.6145 | $(0.2249)$ | 0.7561 | $(0.0733)$ | 0.5687 | $(0.2373)$ |
| Bexar | 0.6823 | $(0.0633)$ | 0.7177 | $(0.0477)$ | 0.666 | $(0.1027)$ | 0.8369 | $(0.0338)$ | 0.8869 | $(0.0609)$ |
| Blanco | 0.847 | $(0.0800)$ | 0.8355 | $(0.0700)$ | 0.6965 | $(0.1953)$ | 0.7585 | $(0.0691)$ | 0.7338 | $(0.1019)$ |
| Borden | 0.8853 | $(0.0732)$ | 0.8743 | $(0.0627)$ | 0.7321 | $(0.1858)$ | 0.7985 | $(0.0553)$ | 0.528 | $(0.2744)$ |
| Bosque | 0.8218 | $(0.0929)$ | 0.7871 | $(0.0771)$ | 0.6478 | $(0.2139)$ | 0.7917 | $(0.0779)$ | 0.5595 | $(0.2414)$ |
| Bowie | 0.804 | $(0.0812)$ | 0.7863 | $(0.0775)$ | 0.6722 | $(0.1773)$ | 0.8301 | $(0.0663)$ | 0.5189 | $(0.2476)$ |
| Brazoria | 0.7714 | $(0.0812)$ | 0.7737 | $(0.0677)$ | 0.656 | $(0.2003)$ | 0.847 | $(0.0584)$ | 0.7987 | $(0.1181)$ |
| Brazos | 0.7476 | $(0.1001)$ | 0.7008 | $(0.0782)$ | 0.6479 | $(0.2100)$ | 0.729 | $(0.0726)$ | 0.5423 | $(0.2229)$ |
| Brewster | 0.8492 | $(0.0612)$ | 0.778 | $(0.0549)$ | 0.8335 | $(0.0953)$ | 0.7588 | $(0.0449)$ | 0.6978 | $(0.1456)$ |
| Briscoe | 0.8848 | $(0.0776)$ | 0.8848 | $(0.0652)$ | 0.8015 | $(0.1210)$ | 0.8376 | $(0.0598)$ | 0.8772 | $(0.0686)$ |


| County | 1990 |  | 1992 |  | 1994 |  | 1996 |  | 1998 |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Brooks | 0.826 | (0.0092) | 0.7837 | (0.0073) | 0.7733 | (0.0128) | 0.8205 | (0.0056) | 0.8691 | (0.0242) |
| Brown | 0.7714 | (0.0907) | 0.7544 | (0.0761) | 0.6628 | (0.1936) | 0.7962 | (0.0579) | 0.5461 | (0.2577) |
| Burleson | 0.8244 | (0.0745) | 0.8084 | (0.0737) | 0.6744 | (0.2068) | 0.7922 | (0.0683) | 0.5484 | (0.2367) |
| Burnet | 0.817 | (0.0899) | 0.8009 | (0.0604) | 0.6834 | (0.1888) | 0.8082 | (0.0675) | 0.5665 | (0.2317) |
| Caldwell | 0.7069 | (0.0837) | 0.6748 | (0.0575) | 0.5323 | (0.1617) | 0.7645 | (0.0522) | 0.4735 | (0.2097) |
| Calhoun | 0.8484 | (0.0669) | 0.7847 | (0.0514) | 0.6914 | (0.1406) | 0.8445 | (0.0460) | 0.8706 | (0.0800) |
| Callahan | 0.8524 | (0.0960) | 0.8151 | (0.0809) | 0.6689 | (0.1897) | 0.8639 | (0.0571) | 0.5626 | (0.2575) |
| Cameron | 0.7017 | (0.0224) | 0.6972 | (0.0161) | 0.6623 | (0.0216) | 0.7857 | (0.0115) | 0.8366 | (0.0445) |
| Camp | 0.8428 | (0.0771) | 0.8126 | (0.0740) | 0.6869 | (0.1731) | 0.8033 | (0.0765) | 0.5295 | (0.2439) |
| Carson | 0.8905 | (0.0730) | 0.8649 | (0.0654) | 0.695 | (0.2044) | 0.8829 | (0.0616) | 0.5004 | (0.2324) |
| Cass | 0.833 | (0.0808) | 0.7967 | (0.0790) | 0.7012 | (0.1895) | 0.7989 | (0.0741) | 0.5393 | (0.2394) |
| Castro | 0.8599 | (0.0632) | 0.811 | (0.0478) | 0.7591 | (0.1036) | 0.8122 | (0.0373) | 0.7988 | (0.1092) |
| Chambers | 0.8089 | (0.0846) | 0.8329 | (0.0700) | 0.7047 | (0.2139) | 0.891 | (0.0723) | 0.5892 | (0.2142) |
| Cherokee | 0.788 | (0.0899) | 0.7361 | (0.0871) | 0.6947 | (0.2108) | 0.766 | (0.0814) | 0.5867 | (0.2307) |
| Childress | 0.7933 | (0.1010) | 0.7923 | (0.0671) | 0.6699 | (0.2043) | 0.7393 | (0.0596) | 0.5622 | (0.2394) |
| Clay | 0.8402 | (0.0905) | 0.8515 | (0.0675) | 0.6395 | (0.2158) | 0.8649 | (0.0822) | 0.5486 | (0.2592) |
| Cochran | 0.8096 | (0.0609) | 0.776 | (0.0481) | 0.6933 | (0.1187) | 0.7686 | (0.0451) | 0.6962 | (0.1327) |
| Coke | 0.888 | (0.0694) | 0.863 | (0.0659) | 0.7245 | (0.2048) | 0.8457 | (0.0680) | 0.576 | (0.2460) |
| Coleman | 0.8624 | (0.0777) | 0.8349 | (0.0690) | 0.7025 | (0.2100) | 0.8624 | (0.0636) | 0.7236 | (0.1261) |
| Collin | 0.7813 | (0.0861) | 0.8037 | (0.0757) | 0.6662 | (0.2142) | 0.882 | (0.0737) | 0.5158 | (0.2352) |
| Collingsworth | 0.9011 | (0.0696) | 0.8336 | (0.0652) | 0.6956 | (0.2118) | 0.8636 | (0.0579) | 0.7578 | (0.1189) |
| Colorado | 0.8523 | (0.0942) | 0.7978 | (0.0765) | 0.6624 | (0.2004) | 0.8533 | (0.0695) | 0.5565 | (0.2147) |
| Comal | 0.7846 | (0.0801) | 0.7836 | (0.0700) | 0.6754 | (0.2127) | 0.8684 | (0.0503) | 0.822 | (0.0825) |
| Comanche | 0.7901 | (0.0826) | 0.7529 | (0.0814) | 0.643 | (0.2102) | 0.7965 | (0.0626) | 0.5979 | (0.2385) |
| Concho | 0.9013 | (0.0465) | 0.851 | (0.0550) | 0.8272 | (0.1069) | 0.8622 | (0.0471) | 0.8449 | (0.0842) |
| Cooke | 0.7888 | (0.0814) | 0.796 | (0.0677) | 0.6657 | (0.2017) | 0.8579 | (0.0645) | 0.5605 | (0.2428) |


| County | 1990 |  | 1992 |  | 1994 |  | 1996 |  | 1998 |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Coryell | 0.6363 | (0.1275) | 0.573 | (0.1061) | 0.6131 | (0.2406) | 0.658 | (0.0992) | 0.536 | (0.2198) |
| Cottle | 0.882 | (0.0838) | 0.9158 | (0.0546) | 0.8338 | (0.1099) | 0.8468 | (0.0595) | 0.6242 | (0.1872) |
| Crane | 0.9274 | (0.0463) | 0.8759 | (0.0507) | 0.767 | (0.1413) | 0.9035 | (0.0432) | 0.8742 | (0.0720) |
| Crockett | 0.9038 | (0.0429) | 0.8532 | (0.0440) | 0.9516 | (0.0334) | 0.8646 | (0.0367) | 0.9571 | (0.0237) |
| Crosby | 0.8043 | (0.0714) | 0.7426 | (0.0466) | 0.6181 | (0.1186) | 0.7655 | (0.0429) | 0.726 | (0.1066) |
| Culberson | 0.9133 | (0.0305) | 0.8566 | (0.0227) | 0.8529 | (0.0430) | 0.8641 | (0.0178) | 0.9126 | (0.0490) |
| Dallam | 0.743 | (0.0867) | 0.6595 | (0.0825) | 0.5143 | (0.2312) | 0.6769 | (0.0810) | 0.5318 | (0.2433) |
| Dallas | 0.729 | (0.0959) | 0.7341 | (0.0914) | 0.6227 | (0.1969) | 0.7972 | (0.0585) | 0.6036 | (0.2044) |
| Dawson | 0.8901 | (0.0505) | 0.7739 | (0.0453) | 0.612 | (0.1198) | 0.7549 | (0.0462) | 0.7754 | (0.1352) |
| Deaf Smith | 0.7918 | (0.0572) | 0.7105 | (0.0430) | 0.6675 | (0.1152) | 0.7701 | (0.0310) | 0.7961 | (0.1012) |
| Delta | 0.8426 | (0.0759) | 0.7817 | (0.0780) | 0.6807 | (0.2050) | 0.8171 | (0.0601) | 0.5584 | (0.2356) |
| Denton | 0.7382 | (0.1073) | 0.7705 | (0.0683) | 0.6643 | (0.1899) | 0.8517 | (0.0702) | 0.7193 | (0.1364) |
| DeWitt | 0.7843 | (0.0853) | 0.7378 | (0.0668) | 0.6673 | (0.1848) | 0.7405 | (0.0713) | 0.6234 | (0.2014) |
| Dickens | 0.8835 | (0.0804) | 0.8558 | (0.0630) | 0.7606 | (0.1552) | 0.8738 | (0.0507) | 0.5887 | (0.2160) |
| Dimmit | 0.8315 | (0.0170) | 0.7857 | (0.0128) | 0.7734 | (0.0227) | 0.8207 | (0.0102) | 0.8457 | (0.0436) |
| Donley | 0.8262 | (0.0901) | 0.8087 | (0.0780) | 0.679 | (0.1899) | 0.841 | (0.0641) | 0.5551 | (0.2443) |
| Duval | 0.826 | (0.0133) | 0.7865 | (0.0094) | 0.7762 | (0.0162) | 0.8226 | (0.0083) | 0.853 | (0.0370) |
| Eastland | 0.8319 | (0.0940) | 0.7628 | (0.0738) | 0.6594 | (0.2137) | 0.7433 | (0.0723) | 0.5534 | (0.2309) |
| Ector | 0.694 | (0.0701) | 0.663 | (0.0716) | 0.5334 | (0.1807) | 0.7433 | (0.0479) | 0.716 | (0.1373) |
| Edwards | 0.9559 | (0.0262) | 0.9323 | (0.0346) | 0.9109 | (0.0545) | 0.9567 | (0.0231) | 0.9348 | (0.0333) |
| El Paso | 0.6184 | (0.0436) | 0.6334 | (0.0330) | 0.6199 | (0.0465) | 0.827 | (0.0188) | 0.9216 | (0.0457) |
| Ellis | 0.8029 | (0.0738) | 0.7807 | (0.0711) | 0.7121 | (0.1670) | 0.7343 | (0.0837) | 0.7189 | (0.1656) |
| Erath | 0.7202 | (0.0982) | 0.6647 | (0.0963) | 0.6538 | (0.2218) | 0.7278 | (0.0720) | 0.5717 | (0.2414) |
| Falls | 0.8278 | (0.0800) | 0.7657 | (0.0756) | 0.6084 | (0.2267) | 0.7775 | (0.0710) | 0.5285 | (0.2376) |
| Fannin | 0.8 | (0.0855) | 0.7395 | (0.0797) | 0.6915 | (0.1767) | 0.7773 | (0.0778) | 0.5759 | (0.2466) |
| Fayette | 0.8086 | (0.0874) | 0.7804 | (0.0734) | 0.6888 | (0.1937) | 0.7877 | (0.0654) | 0.5592 | (0.2318) |


| County | 1990 |  | 1992 |  | 1994 |  | 1996 |  | 1998 |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Fisher | 0.8728 | (0.0757) | 0.8751 | (0.0690) | 0.7043 | (0.1945) | 0.8086 | (0.0583) | 0.6322 | (0.1921) |
| Floyd | 0.8753 | (0.0576) | 0.8321 | (0.0530) | 0.7565 | (0.1202) | 0.8082 | (0.0567) | 0.7637 | (0.1021) |
| Foard | 0.8963 | (0.0774) | 0.8672 | (0.0619) | 0.6698 | (0.2171) | 0.8382 | (0.0632) | 0.5022 | (0.2503) |
| Fort Bend | 0.7252 | (0.0967) | 0.7098 | (0.0728) | 0.6549 | (0.2035) | 0.8311 | (0.0593) | 0.7444 | (0.1254) |
| Franklin | 0.8312 | (0.0797) | 0.8053 | (0.0835) | 0.6465 | (0.1985) | 0.8345 | (0.0660) | 0.5443 | (0.2345) |
| Freestone | 0.83 | (0.0806) | 0.7928 | (0.0745) | 0.6672 | (0.2088) | 0.7847 | (0.0655) | 0.5121 | (0.2485) |
| Frio | 0.9371 | (0.0251) | 0.8879 | (0.0243) | 0.887 | (0.0414) | 0.9008 | (0.0197) | 0.9079 | (0.0533) |
| Gaines | 0.7572 | (0.0708) | 0.7137 | (0.0648) | 0.5555 | (0.1792) | 0.7176 | (0.0591) | 0.683 | (0.1619) |
| Galveston | 0.7794 | (0.1018) | 0.7055 | (0.0758) | 0.6948 | (0.2027) | 0.8801 | (0.0628) | 0.6148 | (0.1968) |
| Garza | 0.8394 | (0.0728) | 0.8006 | (0.0658) | 0.6319 | (0.1783) | 0.783 | (0.0562) | 0.6641 | (0.1719) |
| Gillespie | 0.8035 | (0.0939) | 0.792 | (0.0700) | 0.647 | (0.2074) | 0.8176 | (0.0745) | 0.6058 | (0.2078) |
| Glasscock | 0.8676 | (0.0702) | 0.883 | (0.0581) | 0.8034 | (0.1266) | 0.8216 | (0.0550) | 0.75 | (0.1211) |
| Goliad | 0.8582 | (0.0650) | 0.8576 | (0.0495) | 0.8502 | (0.1009) | 0.9289 | (0.0376) | 0.7258 | (0.1323) |
| Gonzales | 0.854 | (0.0587) | 0.8198 | (0.0427) | 0.7247 | (0.1381) | 0.8508 | (0.0479) | 0.8752 | (0.0669) |
| Gray | 0.815 | (0.0886) | 0.7915 | (0.0704) | 0.6668 | (0.1872) | 0.7837 | (0.0578) | 0.5929 | (0.2413) |
| Grayson | 0.78 | (0.0836) | 0.7517 | (0.0872) | 0.694 | (0.1833) | 0.832 | (0.0720) | 0.5252 | (0.2631) |
| Gregg | 0.8106 | (0.0727) | 0.771 | (0.0650) | 0.668 | (0.1954) | 0.8543 | (0.0706) | 0.5162 | (0.2360) |
| Grimes | 0.8196 | (0.0783) | 0.787 | (0.0697) | 0.6719 | (0.1744) | 0.8146 | (0.0554) | 0.5475 | (0.2214) |
| Guadalupe | 0.7216 | (0.0833) | 0.7132 | (0.0736) | 0.6533 | (0.1777) | 0.851 | (0.0488) | 0.923 | (0.0412) |
| Hale | 0.6828 | (0.0763) | 0.6742 | (0.0550) | 0.5506 | (0.1301) | 0.7414 | (0.0439) | 0.7513 | (0.1190) |
| Hall | 0.8948 | (0.0750) | 0.9207 | (0.0486) | 0.737 | (0.1610) | 0.8535 | (0.0534) | 0.723 | (0.1366) |
| Hamilton | 0.8102 | (0.0847) | 0.7825 | (0.0707) | 0.6492 | (0.2027) | 0.7835 | (0.0688) | 0.5351 | (0.2382) |
| Hansford | 0.8834 | (0.0593) | 0.8123 | (0.0602) | 0.6491 | (0.1979) | 0.7869 | (0.0679) | 0.6476 | (0.1914) |
| Hardeman | 0.8126 | (0.0927) | 0.7658 | (0.0718) | 0.6738 | (0.1836) | 0.762 | (0.0698) | 0.5523 | (0.2267) |
| Hardin | 0.8539 | (0.0986) | 0.8439 | (0.0732) | 0.6745 | (0.2065) | 0.8213 | (0.0662) | 0.5398 | (0.2151) |
| Harris | 0.7416 | (0.0851) | 0.7393 | (0.0737) | 0.6344 | (0.1975) | 0.8057 | (0.0571) | 0.6999 | (0.1247) |


| County | 1990 |  | 1992 |  | 1994 |  | 1996 |  | 1998 |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Harrison | 0.8281 | (0.0807) | 0.7896 | (0.0770) | 0.6868 | (0.1896) | 0.8616 | (0.0622) | 0.5451 | (0.2550) |
| Hartley | 0.8795 | (0.0961) | 0.8744 | (0.0659) | 0.6667 | (0.2284) | 0.737 | (0.0716) | 0.5589 | (0.2282) |
| Haskell | 0.8529 | (0.0831) | 0.8219 | (0.0651) | 0.7319 | (0.1562) | 0.8513 | (0.0541) | 0.7262 | (0.1466) |
| Hays | 0.74 | (0.0841) | 0.7417 | (0.0604) | 0.6447 | (0.1915) | 0.8497 | (0.0495) | 0.8822 | (0.0639) |
| Hemphill | 0.8702 | (0.0761) | 0.8323 | (0.0673) | 0.6781 | (0.2087) | 0.8183 | (0.0589) | 0.5544 | (0.2344) |
| Henderson | 0.7982 | (0.0757) | 0.7764 | (0.0777) | 0.6873 | (0.1972) | 0.8014 | (0.0627) | 0.498 | (0.2438) |
| Hidalgo | 0.7573 | (0.0157) | 0.7403 | (0.0090) | 0.7104 | (0.0144) | 0.8283 | (0.0078) | 0.8823 | (0.0324) |
| Hill | 0.7649 | (0.0929) | 0.7323 | (0.0825) | 0.6546 | (0.2011) | 0.789 | (0.0589) | 0.5275 | (0.2413) |
| Hockley | 0.7351 | (0.0785) | 0.7135 | (0.0609) | 0.5973 | (0.1819) | 0.7528 | (0.0574) | 0.6877 | (0.1672) |
| Hood | 0.8236 | (0.0929) | 0.8063 | (0.0619) | 0.6612 | (0.1861) | 0.8154 | (0.0651) | 0.549 | (0.2625) |
| Hopkins | 0.7808 | (0.0908) | 0.7182 | (0.0706) | 0.6919 | (0.1889) | 0.7906 | (0.0649) | 0.5254 | (0.2343) |
| Houston | 0.843 | (0.0928) | 0.8338 | (0.0629) | 0.701 | (0.1776) | 0.8535 | (0.0760) | 0.5707 | (0.2372) |
| Howard | 0.7504 | (0.0990) | 0.7277 | (0.0693) | 0.5945 | (0.2065) | 0.762 | (0.0674) | 0.6831 | (0.1637) |
| Hudspeth | 0.8733 | (0.0333) | 0.9026 | (0.0271) | 0.8985 | (0.0467) | 0.8689 | (0.0228) | 0.9148 | (0.0516) |
| Hunt | 0.7638 | (0.0948) | 0.7283 | (0.0985) | 0.6454 | (0.1990) | 0.7882 | (0.0748) | 0.5456 | (0.2318) |
| Hutchinson | 0.8424 | (0.0806) | 0.8209 | (0.0733) | 0.6983 | (0.1725) | 0.8735 | (0.0663) | 0.7261 | (0.1341) |
| Irion | 0.8987 | (0.0680) | 0.8968 | (0.0621) | 0.9207 | (0.0536) | 0.8496 | (0.0507) | 0.6808 | (0.1558) |
| Jack | 0.8674 | (0.0792) | 0.8408 | (0.0798) | 0.6971 | (0.1912) | 0.8357 | (0.0732) | 0.5312 | (0.2403) |
| Jackson | 0.7996 | (0.0734) | 0.7777 | (0.0696) | 0.6898 | (0.1769) | 0.803 | (0.0536) | 0.7234 | (0.1552) |
| Jasper | 0.8629 | (0.0814) | 0.8664 | (0.0760) | 0.706 | (0.1701) | 0.8038 | (0.0689) | 0.5243 | (0.2522) |
| Jeff Davis | 0.8961 | (0.0581) | 0.8789 | (0.0418) | 0.938 | (0.0416) | 0.8559 | (0.0444) | 0.8145 | (0.1017) |
| Jefferson | 0.821 | (0.0834) | 0.8046 | (0.0763) | 0.6288 | (0.2100) | 0.8718 | (0.0710) | 0.5335 | (0.2333) |
| Jim Hogg | 0.8603 | (0.0083) | 0.794 | (0.0064) | 0.7689 | (0.0110) | 0.8225 | (0.0056) | 0.8341 | (0.0236) |
| Jim Wells | 0.8619 | (0.0278) | 0.8354 | (0.0239) | 0.8494 | (0.0407) | 0.9363 | (0.0196) | 0.9667 | (0.0202) |
| Johnson | 0.7714 | (0.0913) | 0.7467 | (0.0872) | 0.6712 | (0.2043) | 0.8063 | (0.0683) | 0.5204 | (0.2566) |
| Jones | 0.7899 | (0.0862) | 0.7164 | (0.0750) | 0.5559 | (0.2245) | 0.7024 | (0.0752) | 0.5636 | (0.2244) |


| County | 1990 |  | 1992 |  | 1994 |  | 1996 |  | 1998 |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Karnes | 0.8604 | (0.0533) | 0.8199 | (0.0435) | 0.751 | (0.1019) | 0.6845 | (0.0458) | 0.6604 | (0.1548) |
| Kaufman | 0.7758 | (0.0938) | 0.7315 | (0.0860) | 0.6703 | (0.1972) | 0.817 | (0.0624) | 0.497 | (0.2567) |
| Kendall | 0.7961 | (0.1022) | 0.8191 | (0.0686) | 0.664 | (0.2262) | 0.8972 | (0.0590) | 0.5426 | (0.2447) |
| Kenedy | 0.9119 | (0.0207) | 0.9087 | (0.0171) | 0.9255 | (0.0271) | 0.673 | (0.0167) | 0.8917 | (0.0479) |
| Kent | 0.8758 | (0.1077) | 0.8839 | (0.0661) | 0.7011 | (0.1844) | 0.8414 | (0.0548) | 0.5714 | (0.2320) |
| Kerr | 0.8003 | (0.0697) | 0.7799 | (0.0662) | 0.6985 | (0.2036) | 0.8313 | (0.0553) | 0.6524 | (0.1556) |
| Kimble | 0.8102 | (0.0824) | 0.7839 | (0.0687) | 0.671 | (0.1927) | 0.8568 | (0.0539) | 0.7415 | (0.1281) |
| King | 0.8892 | (0.0831) | 0.869 | (0.0625) | 0.7318 | (0.1888) | 0.845 | (0.0630) | 0.6074 | (0.2143) |
| Kinney | 0.8614 | (0.0496) | 0.9172 | (0.0378) | 0.9319 | (0.0473) | 0.8597 | (0.0330) | 0.8715 | (0.0699) |
| Kleberg | 0.6964 | (0.0447) | 0.6923 | (0.0367) | 0.6471 | (0.0658) | 0.7906 | (0.0269) | 0.8445 | (0.0823) |
| Knox | 0.8276 | (0.0733) | 0.8082 | (0.0650) | 0.708 | (0.1858) | 0.8005 | (0.0552) | 0.5548 | (0.2105) |
| La Salle | 0.8331 | (0.0227) | 0.7959 | (0.0175) | 0.7718 | (0.0426) | 0.819 | (0.0181) | 0.9688 | (0.0213) |
| Lamar | 0.8054 | (0.0841) | 0.7777 | (0.0752) | 0.7297 | (0.1891) | 0.8147 | (0.0682) | 0.5443 | (0.2528) |
| Lamb | 0.8365 | (0.0655) | 0.8039 | (0.0525) | 0.6621 | (0.1404) | 0.7845 | (0.0457) | 0.7374 | (0.1252) |
| Lampasas | 0.7997 | (0.0818) | 0.7364 | (0.0827) | 0.6284 | (0.2312) | 0.7296 | (0.0750) | 0.6069 | (0.2445) |
| Lavaca | 0.8161 | (0.0857) | 0.7807 | (0.0755) | 0.6755 | (0.1958) | 0.8045 | (0.0660) | 0.569 | (0.2342) |
| Lee | 0.8208 | (0.0718) | 0.7791 | (0.0714) | 0.6843 | (0.1864) | 0.7037 | (0.0754) | 0.5387 | (0.2390) |
| Leon | 0.8628 | (0.0777) | 0.8452 | (0.0851) | 0.6668 | (0.2122) | 0.8901 | (0.0633) | 0.4967 | (0.2429) |
| Liberty | 0.7871 | (0.0741) | 0.7483 | (0.0839) | 0.6793 | (0.2012) | 0.8493 | (0.0626) | 0.5565 | (0.2235) |
| Limestone | 0.7749 | (0.0967) | 0.7364 | (0.0751) | 0.6211 | (0.1874) | 0.7642 | (0.0740) | 0.5032 | (0.2337) |
| Lipscomb | 0.8757 | (0.0864) | 0.839 | (0.0695) | 0.6902 | (0.1864) | 0.8482 | (0.0591) | 0.6088 | (0.1935) |
| Live Oak | 0.8947 | (0.0609) | 0.9001 | (0.0471) | 0.8379 | (0.1015) | 0.9007 | (0.0421) | 0.8994 | (0.0449) |
| Llano | 0.8528 | (0.1028) | 0.8491 | (0.0700) | 0.6648 | (0.2198) | 0.8093 | (0.0631) | 0.5638 | (0.2423) |
| Loving | 0.8998 | (0.0672) | 0.8767 | (0.0675) | 0.7002 | (0.2126) | 0.8398 | (0.0642) | 0.5372 | (0.2496) |
| Lubbock | 0.7168 | (0.0936) | 0.6995 | (0.0721) | 0.5678 | (0.2177) | 0.788 | (0.0707) | 0.6825 | (0.1713) |
| Lynn | 0.8652 | (0.0626) | 0.8513 | (0.0469) | 0.7819 | (0.1088) | 0.8105 | (0.0445) | 0.7966 | (0.0981) |


| County | 1990 |  | 1992 |  | 1994 |  | 1996 |  | 1998 |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Madison | 0.8659 | (0.0667) | 0.8671 | (0.0637) | 0.7033 | (0.2162) | 0.8891 | (0.0707) | 0.5277 | (0.2542) |
| Marion | 0.8765 | (0.0756) | 0.8539 | (0.0695) | 0.6628 | (0.2175) | 0.8087 | (0.0654) | 0.5441 | (0.2248) |
| Martin | 0.8338 | (0.0573) | 0.8704 | (0.0490) | 0.8166 | (0.1090) | 0.902 | (0.0390) | 0.7582 | (0.1274) |
| Mason | 0.8962 | (0.0598) | 0.8813 | (0.0586) | 0.7756 | (0.1432) | 0.8564 | (0.0558) | 0.7122 | (0.1500) |
| Matagorda | 0.7533 | (0.0709) | 0.7579 | (0.0650) | 0.5989 | (0.1956) | 0.8125 | (0.0561) | 0.7032 | (0.1532) |
| Maverick | 0.7987 | (0.0062) | 0.845 | (0.0046) | 0.8563 | (0.0069) | 0.821 | (0.0036) | 0.8443 | (0.0141) |
| McCulloch | 0.7956 | (0.0848) | 0.7878 | (0.0611) | 0.6272 | (0.2062) | 0.8239 | (0.0520) | 0.7294 | (0.1264) |
| McLennan | 0.7616 | (0.0921) | 0.751 | (0.0758) | 0.6476 | (0.1985) | 0.7959 | (0.0644) | 0.5715 | (0.2421) |
| McMullen | 0.9421 | (0.0369) | 0.9108 | (0.0449) | 0.8999 | (0.0655) | 0.8551 | (0.0472) | 0.8029 | (0.0964) |
| Medina | 0.7899 | (0.0698) | 0.7915 | (0.0454) | 0.6788 | (0.1233) | 0.8041 | (0.0477) | 0.8021 | (0.1129) |
| Menard | 0.9172 | (0.0524) | 0.9013 | (0.0510) | 0.9143 | (0.0605) | 0.8488 | (0.0487) | 0.7842 | (0.1099) |
| Midland | 0.7704 | (0.0844) | 0.7309 | (0.0676) | 0.6228 | (0.1689) | 0.8144 | (0.0660) | 0.7361 | (0.1402) |
| Milam | 0.8062 | (0.0870) | 0.7554 | (0.0801) | 0.6406 | (0.2062) | 0.7482 | (0.0623) | 0.5388 | (0.2331) |
| Mills | 0.8016 | (0.0886) | 0.7884 | (0.0711) | 0.6694 | (0.2011) | 0.7938 | (0.0687) | 0.5437 | (0.2171) |
| Mitchell | 0.8627 | (0.0663) | 0.8026 | (0.0512) | 0.6554 | (0.1781) | 0.6955 | (0.0545) | 0.6444 | (0.1846) |
| Montague | 0.8429 | (0.0870) | 0.8008 | (0.0705) | 0.6995 | (0.1978) | 0.8599 | (0.0644) | 0.538 | (0.2430) |
| Montgomery | 0.7885 | (0.0912) | 0.7651 | (0.0746) | 0.6441 | (0.2089) | 0.8142 | (0.0725) | 0.5347 | (0.2334) |
| Moore | 0.7676 | (0.0757) | 0.7165 | (0.0542) | 0.6399 | (0.1751) | 0.7904 | (0.0471) | 0.7808 | (0.1265) |
| Morris | 0.8591 | (0.0880) | 0.8452 | (0.0792) | 0.6544 | (0.2109) | 0.8021 | (0.0730) | 0.5395 | (0.2566) |
| Motley | 0.9021 | (0.0692) | 0.8843 | (0.0686) | 0.7136 | (0.1848) | 0.8229 | (0.0671) | 0.5509 | (0.2531) |
| Nacogdoches | 0.772 | (0.0941) | 0.7733 | (0.0799) | 0.664 | (0.1671) | 0.8033 | (0.0735) | 0.5666 | (0.2408) |
| Navarro | 0.7832 | (0.0939) | 0.7673 | (0.0751) | 0.6293 | (0.2215) | 0.7473 | (0.0787) | 0.514 | (0.2394) |
| Newton | 0.8672 | (0.0852) | 0.8497 | (0.0824) | 0.6839 | (0.2084) | 0.8514 | (0.0691) | 0.535 | (0.2743) |
| Nolan | 0.7543 | (0.0916) | 0.716 | (0.0621) | 0.6029 | (0.2333) | 0.8082 | (0.0535) | 0.7179 | (0.1376) |
| Nueces | 0.7438 | (0.0500) | 0.7336 | (0.0470) | 0.7191 | (0.0928) | 0.8497 | (0.0281) | 0.8961 | (0.0579) |
| Ochiltree | 0.8373 | (0.0713) | 0.7798 | (0.0701) | 0.6095 | (0.2378) | 0.7694 | (0.0651) | 0.5763 | (0.2484) |


| County | 1990 |  | 1992 |  | 1994 |  | 1996 |  | 1998 |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Oldham | 0.892 | (0.0691) | 0.8748 | (0.0602) | 0.7114 | (0.1771) | 0.8392 | (0.0653) | 0.5443 | (0.2268) |
| Orange | 0.8131 | (0.0903) | 0.7867 | (0.0865) | 0.7041 | (0.1887) | 0.8333 | (0.0644) | 0.5323 | (0.2526) |
| Palo Pinto | 0.7743 | (0.0935) | 0.7546 | (0.0819) | 0.6502 | (0.1922) | 0.8003 | (0.0675) | 0.557 | (0.2509) |
| Panola | 0.838 | (0.0901) | 0.8107 | (0.0752) | 0.6576 | (0.2027) | 0.8373 | (0.0731) | 0.5549 | (0.2524) |
| Parker | 0.7832 | (0.0940) | 0.7582 | (0.0938) | 0.6549 | (0.1965) | 0.8444 | (0.0526) | 0.551 | (0.2452) |
| Parmer | 0.6955 | (0.0690) | 0.6664 | (0.0588) | 0.5496 | (0.1588) | 0.7053 | (0.0522) | 0.7067 | (0.1587) |
| Pecos | 0.9154 | (0.0416) | 0.8389 | (0.0368) | 0.7844 | (0.0743) | 0.7611 | (0.0333) | 0.7831 | (0.1043) |
| Polk | 0.8588 | (0.0783) | 0.8365 | (0.0779) | 0.692 | (0.2039) | 0.8616 | (0.0609) | 0.5415 | (0.2635) |
| Potter | 0.6329 | (0.1234) | 0.5981 | (0.0919) | 0.5355 | (0.2222) | 0.6942 | (0.0847) | 0.5882 | (0.2525) |
| Presidio | 0.9249 | (0.0196) | 0.8764 | (0.0133) | 0.8777 | (0.0250) | 0.9457 | (0.0097) | 0.8563 | (0.0503) |
| Rains | 0.8215 | (0.0814) | 0.7955 | (0.0797) | 0.656 | (0.2085) | 0.8082 | (0.0625) | 0.5776 | (0.2383) |
| Randall | 0.8009 | (0.0914) | 0.78 | (0.0729) | 0.6925 | (0.1909) | 0.8562 | (0.0623) | 0.6992 | (0.1487) |
| Reagan | 0.8032 | (0.0629) | 0.7328 | (0.0486) | 0.5608 | (0.1278) | 0.7164 | (0.0509) | 0.6472 | (0.1696) |
| Real | 0.8904 | (0.0688) | 0.8932 | (0.0622) | 0.7675 | (0.1372) | 0.8421 | (0.0600) | 0.7132 | (0.1390) |
| Red River | 0.8504 | (0.0790) | 0.8011 | (0.0858) | 0.6907 | (0.2049) | 0.7831 | (0.0733) | 0.5465 | (0.2287) |
| Reeves | 0.8818 | (0.0266) | 0.8409 | (0.0211) | 0.7893 | (0.0347) | 0.831 | (0.0149) | 0.8763 | (0.0653) |
| Refugio | 0.9169 | (0.0461) | 0.906 | (0.0499) | 0.8291 | (0.1051) | 0.8219 | (0.0474) | 0.7656 | (0.1074) |
| Roberts | 0.8655 | (0.0865) | 0.866 | (0.0707) | 0.6712 | (0.2244) | 0.8415 | (0.0590) | 0.5565 | (0.2287) |
| Robertson | 0.8723 | (0.0706) | 0.8094 | (0.0710) | 0.6826 | (0.2142) | 0.8347 | (0.0715) | 0.624 | (0.1962) |
| Rockwall | 0.8211 | (0.0880) | 0.8383 | (0.0692) | 0.6873 | (0.2123) | 0.8863 | (0.0644) | 0.5386 | (0.2453) |
| Runnels | 0.8153 | (0.0766) | 0.786 | (0.0573) | 0.6312 | (0.1845) | 0.7824 | (0.0549) | 0.6529 | (0.1810) |
| Rusk | 0.8329 | (0.0891) | 0.8099 | (0.0706) | 0.7033 | (0.1931) | 0.8289 | (0.0669) | 0.5364 | (0.2662) |
| Sabine | 0.8522 | (0.0812) | 0.8524 | (0.0712) | 0.681 | (0.2034) | 0.8804 | (0.0653) | 0.5459 | (0.2440) |
| San Augustine | 0.8625 | (0.0734) | 0.8041 | (0.0720) | 0.6571 | (0.2122) | 0.8096 | (0.0650) | 0.5437 | (0.2272) |
| San Jacinto | 0.8143 | (0.0826) | 0.805 | (0.0754) | 0.6696 | (0.1887) | 0.8473 | (0.0651) | 0.534 | (0.2564) |
| San Patricio | 0.7829 | (0.0644) | 0.7533 | (0.0413) | 0.6635 | (0.0985) | 0.8212 | (0.0409) | 0.8714 | (0.0696) |


| County | 1990 |  | 1992 |  | 1994 |  | 1996 |  | 1998 |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| San Saba | 0.833 | (0.0734) | 0.7794 | (0.0652) | 0.6496 | (0.1802) | 0.7862 | (0.0625) | 0.5886 | (0.2241) |
| Schleicher | 0.9107 | (0.0573) | 0.8947 | (0.0462) | 0.8144 | (0.1190) | 0.9287 | (0.0363) | 0.8749 | (0.0671) |
| Scurry | 0.7685 | (0.0825) | 0.7518 | (0.0622) | 0.6937 | (0.1867) | 0.8138 | (0.0552) | 0.7305 | (0.1379) |
| Shackelford | 0.8728 | (0.0836) | 0.8403 | (0.0698) | 0.7067 | (0.2111) | 0.8851 | (0.0581) | 0.6184 | (0.1995) |
| Shelby | 0.8518 | (0.0772) | 0.8348 | (0.0680) | 0.6913 | (0.1937) | 0.8573 | (0.0681) | 0.5605 | (0.2286) |
| Sherman | 0.9014 | (0.0652) | 0.8856 | (0.0653) | 0.7186 | (0.1898) | 0.8282 | (0.0513) | 0.5877 | (0.1909) |
| Smith | 0.804 | (0.0749) | 0.766 | (0.0791) | 0.6642 | (0.1889) | 0.7752 | (0.0732) | 0.5499 | (0.2552) |
| Somervell | 0.9139 | (0.0701) | 0.8082 | (0.0736) | 0.6506 | (0.1910) | 0.8402 | (0.0629) | 0.5461 | (0.2273) |
| Starr | 0.7562 | (0.0024) | 0.7451 | (0.0021) | 0.7349 | (0.0028) | 0.8216 | (0.0014) | 0.8925 | (0.0062) |
| Stephens | 0.8476 | (0.0822) | 0.8277 | (0.0662) | 0.6881 | (0.1929) | 0.7957 | (0.0628) | 0.5753 | (0.2512) |
| Sterling | 0.9061 | (0.0608) | 0.8871 | (0.0571) | 0.8202 | (0.1116) | 0.8481 | (0.0540) | 0.7037 | (0.1602) |
| Stonewall | 0.8816 | (0.0656) | 0.8397 | (0.0733) | 0.7486 | (0.1704) | 0.8563 | (0.0613) | 0.5874 | (0.2275) |
| Sutton | 0.8913 | (0.0541) | 0.8856 | (0.0480) | 0.8056 | (0.1002) | 0.853 | (0.0412) | 0.832 | (0.0987) |
| Swisher | 0.8343 | (0.0710) | 0.7641 | (0.0564) | 0.6623 | (0.1653) | 0.7756 | (0.0516) | 0.7415 | (0.1500) |
| Tarrant | 0.7606 | (0.0836) | 0.7559 | (0.0750) | 0.6502 | (0.1980) | 0.8096 | (0.0576) | 0.5699 | (0.2334) |
| Taylor | 0.7462 | (0.0926) | 0.7019 | (0.0765) | 0.6338 | (0.1776) | 0.7874 | (0.0598) | 0.5983 | (0.2237) |
| Terrell | 0.9159 | (0.0436) | 0.9416 | (0.0320) | 0.9669 | (0.0251) | 0.873 | (0.0353) | 0.8548 | (0.0804) |
| Terry | 0.84 | (0.0649) | 0.8022 | (0.0497) | 0.6581 | (0.1344) | 0.7751 | (0.0545) | 0.7728 | (0.1195) |
| Throckmorton | 0.8836 | (0.0917) | 0.8967 | (0.0579) | 0.7077 | (0.2012) | 0.8533 | (0.0572) | 0.5597 | (0.2151) |
| Titus | 0.811 | (0.0814) | 0.7723 | (0.0695) | 0.6664 | (0.2009) | 0.7743 | (0.0704) | 0.5751 | (0.1819) |
| Tom Green | 0.7166 | (0.0806) | 0.7067 | (0.0683) | 0.5977 | (0.2121) | 0.7767 | (0.0506) | 0.6743 | (0.1411) |
| Travis | 0.8299 | (0.0801) | 0.8252 | (0.0603) | 0.7161 | (0.1904) | 0.9166 | (0.0514) | 0.7114 | (0.1500) |
| Trinity | 0.8352 | (0.0843) | 0.8057 | (0.0807) | 0.6505 | (0.2176) | 0.8266 | (0.0641) | 0.5537 | (0.2660) |
| Tyler | 0.8522 | (0.1101) | 0.8238 | (0.0709) | 0.6758 | (0.1616) | 0.84 | (0.0710) | 0.5366 | (0.2402) |
| Upshur | 0.822 | (0.0914) | 0.7769 | (0.0702) | 0.69 | (0.1903) | 0.8085 | (0.0670) | 0.5639 | (0.2430) |
| Upton | 0.8896 | (0.0573) | 0.8819 | (0.0534) | 0.7476 | (0.1311) | 0.7527 | (0.0469) | 0.7283 | (0.1369) |


| County | 1990 |  | 1992 |  | 1994 |  | 1996 |  | 1998 |  |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Uvalde | 0.8626 | $(0.0476)$ | 0.9014 | $(0.0336)$ | 0.9023 | $(0.0550)$ | 0.9682 | $(0.0168)$ | 0.8714 | $(0.0786)$ |
| Val Verde | 0.6594 | $(0.0371)$ | 0.7021 | $(0.0214)$ | 0.6577 | $(0.0419)$ | 0.8243 | $(0.0207)$ | 0.9274 | $(0.0418)$ |
| Van Zandt | 0.8289 | $(0.0804)$ | 0.8141 | $(0.0777)$ | 0.6593 | $(0.1877)$ | 0.8654 | $(0.0603)$ | 0.5461 | $(0.2461)$ |
| Victoria | 0.7526 | $(0.0848)$ | 0.7345 | $(0.0636)$ | 0.655 | $(0.1580)$ | 0.8694 | $(0.0466)$ | 0.9091 | $(0.0528)$ |
| Walker | 0.7445 | $(0.0887)$ | 0.7579 | $(0.0749)$ | 0.6595 | $(0.1804)$ | 0.8317 | $(0.0677)$ | 0.6103 | $(0.1803)$ |
| Waller | 0.8248 | $(0.0799)$ | 0.8692 | $(0.0639)$ | 0.6626 | $(0.2128)$ | 0.8834 | $(0.0647)$ | 0.7341 | $(0.1361)$ |
| Ward | 0.8288 | $(0.0671)$ | 0.7581 | $(0.0578)$ | 0.5945 | $(0.1615)$ | 0.7438 | $(0.0487)$ | 0.7261 | $(0.1383)$ |
| Washington | 0.7941 | $(0.0899)$ | 0.7793 | $(0.0668)$ | 0.6984 | $(0.1677)$ | 0.7925 | $(0.0749)$ | 0.5613 | $(0.2477)$ |
| Webb | 0.75 | $(0.0053)$ | 0.7624 | $(0.0045)$ | 0.7488 | $(0.0061)$ | 0.8535 | $(0.0027)$ | 0.9159 | $(0.0115)$ |
| Wharton | 0.766 | $(0.0868)$ | 0.7129 | $(0.0695)$ | 0.5884 | $(0.2038)$ | 0.7247 | $(0.0638)$ | 0.5901 | $(0.2003)$ |
| Wheeler | 0.8878 | $(0.0711)$ | 0.8751 | $(0.0725)$ | 0.6719 | $(0.2183)$ | 0.8572 | $(0.0561)$ | 0.5556 | $(0.2388)$ |
| Wichita | 0.7603 | $(0.0914)$ | 0.7222 | $(0.0795)$ | 0.6324 | $(0.2075)$ | 0.7674 | $(0.0674)$ | 0.5729 | $(0.2435)$ |
| Wilbarger | 0.7497 | $(0.0860)$ | 0.7165 | $(0.0619)$ | 0.67 | $(0.1960)$ | 0.7432 | $(0.0688)$ | 0.5694 | $(0.2328)$ |
| Willacy | 0.8693 | $(0.0158)$ | 0.8917 | $(0.0125)$ | 0.8349 | $(0.0157)$ | 0.9205 | $(0.0082)$ | 0.942 | $(0.0319)$ |
| Williamson | 0.7486 | $(0.0900)$ | 0.7375 | $(0.0706)$ | 0.6717 | $(0.1983)$ | 0.8262 | $(0.0791)$ | 0.757 | $(0.1145)$ |
| Wilson | 0.8755 | $(0.0566)$ | 0.845 | $(0.0519)$ | 0.8084 | $(0.1211)$ | 0.9006 | $(0.0460)$ | 0.8902 | $(0.0531)$ |
| Winkler | 0.8082 | $(0.0675)$ | 0.7624 | $(0.0465)$ | 0.6835 | $(0.1467)$ | 0.7982 | $(0.0483)$ | 0.7532 | $(0.1204)$ |
| Wise | 0.7877 | $(0.0824)$ | 0.7616 | $(0.0816)$ | 0.6739 | $(0.2001)$ | 0.8412 | $(0.0701)$ | 0.5987 | $(0.1879)$ |
| Wood | 0.7882 | $(0.0792)$ | 0.7698 | $(0.0789)$ | 0.6416 | $(0.1947)$ | 0.7453 | $(0.0766)$ | 0.551 | $(0.2404)$ |
| Yoakum | 0.7373 | $(0.0725)$ | 0.6813 | $(0.0648)$ | 0.5744 | $(0.1521)$ | 0.7308 | $(0.0564)$ | 0.6658 | $(0.1513)$ |
| Young | 0.8168 | $(0.0924)$ | 0.7961 | $(0.0727)$ | 0.6714 | $(0.1971)$ | 0.8297 | $(0.0680)$ | 0.5221 | $(0.2599)$ |
| Zapata | 0.8342 | $(0.0215)$ | 0.7871 | $(0.0136)$ | 0.9722 | $(0.0165)$ | 0.8207 | $(0.0105)$ | 0.8814 | $(0.0399)$ |
| Zavala | 0.8258 | $(0.0100)$ | 0.784 | $(0.0074)$ | 0.776 | $(0.0116)$ | 0.821 | $(0.0057)$ | 0.8691 | $(0.0241)$ |

Note: The stardard error for each estimate is shown in parentheses.

|  | Whites |  |  |  |  |  |  |  |  | 1994 |  |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| County | 1990 |  | 1992 |  | 1994 |  | 1998 |  |  |  |  |
| Anderson | 0.7293 | $(0.0403)$ | 0.8016 | $(0.0826)$ | 0.7118 | $(0.0333)$ | 0.8527 | $(0.0653)$ | 0.9129 | $(0.0468)$ |  |
| Andrews | 0.6803 | $(0.0470)$ | 0.7064 | $(0.1118)$ | 0.6349 | $(0.0436)$ | 0.7638 | $(0.0938)$ | 0.8241 | $(0.0899)$ |  |
| Angelina | 0.6973 | $(0.0370)$ | 0.7273 | $(0.0635)$ | 0.6919 | $(0.0281)$ | 0.883 | $(0.0514)$ | 0.9412 | $(0.0333)$ |  |
| Aransas | 0.5981 | $(0.0425)$ | 0.622 | $(0.0702)$ | 0.6214 | $(0.0305)$ | 0.7654 | $(0.0617)$ | 0.816 | $(0.0578)$ |  |
| Archer | 0.8512 | $(0.0032)$ | 0.8802 | $(0.0064)$ | 0.8392 | $(0.0030)$ | 0.9486 | $(0.0060)$ | 0.9615 | $(0.0053)$ |  |
| Armstrong | 0.8959 | $(0.0049)$ | 0.8959 | $(0.0078)$ | 0.8763 | $(0.0028)$ | 0.9364 | $(0.0068)$ | 0.8504 | $(0.0078)$ |  |
| Atacosa | 0.7513 | $(0.0767)$ | 0.763 | $(0.1242)$ | 0.7475 | $(0.0541)$ | 0.805 | $(0.1361)$ | 0.8017 | $(0.1450)$ |  |
| Austin | 0.687 | $(0.0359)$ | 0.7239 | $(0.0676)$ | 0.7399 | $(0.0257)$ | 0.8535 | $(0.0522)$ | 0.8775 | $(0.0535)$ |  |
| Bailey | 0.7421 | $(0.0641)$ | 0.7562 | $(0.1114)$ | 0.7152 | $(0.0418)$ | 0.8133 | $(0.1004)$ | 0.7996 | $(0.1172)$ |  |
| Bandera | 0.7702 | $(0.0142)$ | 0.7954 | $(0.0247)$ | 0.7649 | $(0.0106)$ | 0.8949 | $(0.0225)$ | 0.9419 | $(0.0220)$ |  |
| Bastrop | 0.7765 | $(0.0369)$ | 0.7858 | $(0.0828)$ | 0.6967 | $(0.0277)$ | 0.8369 | $(0.0610)$ | 0.8985 | $(0.0517)$ |  |
| Baylor | 0.8969 | $(0.0133)$ | 0.9222 | $(0.0286)$ | 0.8741 | $(0.0104)$ | 0.9676 | $(0.0177)$ | 0.9499 | $(0.0250)$ |  |
| Bee | 0.7924 | $(0.0750)$ | 0.8391 | $(0.0799)$ | 0.7491 | $(0.0477)$ | 0.8496 | $(0.0910)$ | 0.8473 | $(0.1028)$ |  |
| Bell | 0.446 | $(0.0674)$ | 0.5356 | $(0.1236)$ | 0.5556 | $(0.0447)$ | 0.7994 | $(0.0899)$ | 0.8633 | $(0.0753)$ |  |
| Bexar | 0.646 | $(0.0686)$ | 0.7891 | $(0.1449)$ | 0.7241 | $(0.0555)$ | 0.8339 | $(0.1059)$ | 0.8771 | $(0.0722)$ |  |
| Blanco | 0.8301 | $(0.0173)$ | 0.8435 | $(0.0375)$ | 0.8099 | $(0.0148)$ | 0.7523 | $(0.0380)$ | 0.9614 | $(0.0208)$ |  |
| Borden | 0.9028 | $(0.0197)$ | 0.9235 | $(0.0354)$ | 0.8654 | $(0.0153)$ | 0.8216 | $(0.0382)$ | 0.7825 | $(0.0399)$ |  |
| Bosque | 0.7416 | $(0.0158)$ | 0.75 | $(0.0301)$ | 0.7273 | $(0.0113)$ | 0.8004 | $(0.0274)$ | 0.7598 | $(0.0261)$ |  |
| Bowie | 0.7023 | $(0.0303)$ | 0.7497 | $(0.0682)$ | 0.7485 | $(0.0247)$ | 0.8951 | $(0.0480)$ | 0.9066 | $(0.0462)$ |  |
| Brazoria | 0.667 | $(0.0362)$ | 0.7563 | $(0.0758)$ | 0.7299 | $(0.0277)$ | 0.8839 | $(0.0599)$ | 0.9389 | $(0.0323)$ |  |
| Brazos | 0.6139 | $(0.0450)$ | 0.6522 | $(0.0883)$ | 0.6124 | $(0.0364)$ | 0.7384 | $(0.0920)$ | 0.7644 | $(0.0783)$ |  |
| Brewster | 0.7984 | $(0.0612)$ | 0.7949 | $(0.1130)$ | 0.8233 | $(0.0397)$ | 0.814 | $(0.0980)$ | 0.8097 | $(0.1066)$ |  |
| Briscoe | 0.9025 | $(0.0222)$ | 0.9377 | $(0.0371)$ | 0.9204 | $(0.0185)$ | 0.8901 | $(0.0460)$ | 0.97 | $(0.0193)$ |  |


| County | 1990 |  | 1992 |  | 1994 |  | 1996 |  | 1998 |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Brooks | 0.7731 | (0.0998) | 0.7294 | (0.1838) | 0.7827 | (0.0620) | 0.826 | (0.1339) | 0.8405 | (0.1289) |
| Brown | 0.6625 | (0.0221) | 0.7008 | (0.0369) | 0.6792 | (0.0138) | 0.815 | (0.0474) | 0.8444 | (0.0479) |
| Burleson | 0.7321 | (0.0436) | 0.8192 | (0.0734) | 0.7456 | (0.0263) | 0.8255 | (0.0688) | 0.8797 | (0.0568) |
| Burnet | 0.7491 | (0.0143) | 0.7797 | (0.0285) | 0.7217 | (0.0119) | 0.8397 | (0.0333) | 0.9075 | (0.0300) |
| Caldwell | 0.653 | (0.0704) | 0.736 | (0.1618) | 0.6523 | (0.0575) | 0.7977 | (0.1160) | 0.7168 | (0.2102) |
| Calhoun | 0.7926 | (0.0540) | 0.7756 | (0.1064) | 0.7589 | (0.0455) | 0.8772 | (0.0685) | 0.897 | (0.0605) |
| Callahan | 0.8151 | (0.0052) | 0.8104 | (0.0105) | 0.8188 | (0.0036) | 0.9006 | (0.0101) | 0.9547 | (0.0076) |
| Cameron | 0.6938 | (0.1223) | 0.7589 | (0.1660) | 0.7068 | (0.0748) | 0.8023 | (0.1393) | 0.8342 | (0.1257) |
| Camp | 0.7737 | (0.0403) | 0.8228 | (0.0695) | 0.7414 | (0.0298) | 0.8409 | (0.0601) | 0.849 | (0.0707) |
| Carson | 0.8988 | (0.0069) | 0.8781 | (0.0146) | 0.8726 | (0.0055) | 0.9418 | (0.0126) | 0.8203 | (0.0152) |
| Cass | 0.77 | (0.0290) | 0.8009 | (0.0591) | 0.7423 | (0.0227) | 0.8435 | (0.0480) | 0.8332 | (0.0472) |
| Castro | 0.8121 | (0.0724) | 0.7916 | (0.1007) | 0.7768 | (0.0510) | 0.8401 | (0.1039) | 0.829 | (0.1109) |
| Chambers | 0.7553 | (0.0258) | 0.849 | (0.0431) | 0.8542 | (0.0166) | 0.9726 | (0.0168) | 0.8376 | (0.0419) |
| Cherokee | 0.6628 | (0.0306) | 0.6912 | (0.0688) | 0.6807 | (0.0230) | 0.7821 | (0.0644) | 0.8437 | (0.0630) |
| Childress | 0.72 | (0.0297) | 0.7786 | (0.0520) | 0.7653 | (0.0175) | 0.7358 | (0.0812) | 0.7885 | (0.0882) |
| Clay | 0.8099 | (0.0041) | 0.8559 | (0.0081) | 0.8383 | (0.0028) | 0.9186 | (0.0072) | 0.9342 | (0.0068) |
| Cochran | 0.74 | (0.0715) | 0.8019 | (0.1323) | 0.7526 | (0.0448) | 0.8104 | (0.1073) | 0.8083 | (0.1276) |
| Coke | 0.8974 | (0.0157) | 0.9066 | (0.0282) | 0.8782 | (0.0137) | 0.8926 | (0.0337) | 0.8856 | (0.0267) |
| Coleman | 0.8613 | (0.0180) | 0.8545 | (0.0363) | 0.7978 | (0.0122) | 0.9296 | (0.0325) | 0.9605 | (0.0212) |
| Collin | 0.6679 | (0.0195) | 0.7791 | (0.0346) | 0.7912 | (0.0114) | 0.9623 | (0.0217) | 0.9163 | (0.0288) |
| Collingsworth | 0.9215 | (0.0247) | 0.8692 | (0.0516) | 0.8349 | (0.0227) | 0.9239 | (0.0409) | 0.9474 | (0.0290) |
| Colorado | 0.8191 | (0.0461) | 0.7839 | (0.0812) | 0.7434 | (0.0363) | 0.9005 | (0.0511) | 0.8607 | (0.0745) |
| Comal | 0.7172 | (0.0310) | 0.7939 | (0.0622) | 0.777 | (0.0232) | 0.9262 | (0.0331) | 0.96 | (0.0250) |
| Comanche | 0.7083 | (0.0224) | 0.7219 | (0.0433) | 0.709 | (0.0186) | 0.8031 | (0.0422) | 0.8164 | (0.0420) |
| Concho | 0.8813 | (0.0464) | 0.8518 | (0.0752) | 0.8294 | (0.0365) | 0.8797 | (0.0601) | 0.8836 | (0.0663) |
| Cooke | 0.7086 | (0.0132) | 0.7904 | (0.0218) | 0.753 | (0.0088) | 0.8954 | (0.0185) | 0.9556 | (0.0168) |


| County | 1990 |  | 1992 |  | 1994 |  | 1996 |  | 1998 |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Coryell | 0.3803 | (0.0777) | 0.4502 | (0.1294) | 0.4769 | (0.0492) | 0.6451 | (0.1174) | 0.666 | (0.1305) |
| Cottle | 0.9035 | (0.0308) | 0.9679 | (0.0178) | 0.9406 | (0.0215) | 0.8953 | (0.0469) | 0.8711 | (0.0531) |
| Crane | 0.9383 | (0.0293) | 0.8766 | (0.0616) | 0.822 | (0.0337) | 0.9235 | (0.0430) | 0.9297 | (0.0441) |
| Crockett | 0.8712 | (0.0577) | 0.8325 | (0.0931) | 0.9383 | (0.0309) | 0.8679 | (0.0764) | 0.9535 | (0.0262) |
| Crosby | 0.738 | (0.0695) | 0.759 | (0.1253) | 0.7049 | (0.0417) | 0.8386 | (0.1141) | 0.8117 | (0.1228) |
| Culberson | 0.8313 | (0.0908) | 0.7348 | (0.1385) | 0.8213 | (0.0628) | 0.8143 | (0.1231) | 0.8244 | (0.1230) |
| Dallam | 0.6338 | (0.0349) | 0.5743 | (0.0649) | 0.5735 | (0.0321) | 0.656 | (0.0642) | 0.6355 | (0.0568) |
| Dallas | 0.631 | (0.0577) | 0.7157 | (0.1233) | 0.6794 | (0.0473) | 0.8307 | (0.0786) | 0.8771 | (0.0704) |
| Dawson | 0.8449 | (0.0544) | 0.7859 | (0.1186) | 0.692 | (0.0579) | 0.8194 | (0.1165) | 0.8324 | (0.1133) |
| Deaf Smith | 0.7216 | (0.0674) | 0.7368 | (0.1411) | 0.7206 | (0.0477) | 0.8084 | (0.1098) | 0.8295 | (0.1066) |
| Delta | 0.7792 | (0.0127) | 0.7729 | (0.0268) | 0.7498 | (0.0099) | 0.8403 | (0.0228) | 0.842 | (0.0194) |
| Denton | 0.5827 | (0.0189) | 0.7239 | (0.0360) | 0.6807 | (0.0161) | 0.9056 | (0.0357) | 0.9779 | (0.0139) |
| DeWitt | 0.6904 | (0.0537) | 0.7651 | (0.0990) | 0.7136 | (0.0326) | 0.7975 | (0.1077) | 0.8313 | (0.0974) |
| Dickens | 0.8926 | (0.0244) | 0.8989 | (0.0522) | 0.8799 | (0.0221) | 0.9348 | (0.0413) | 0.8516 | (0.0600) |
| Dimmit | 0.7786 | (0.1005) | 0.7118 | (0.1640) | 0.7802 | (0.0663) | 0.8077 | (0.1401) | 0.8214 | (0.1216) |
| Donley | 0.7859 | (0.0091) | 0.791 | (0.0172) | 0.8107 | (0.0065) | 0.8653 | (0.0165) | 0.8781 | (0.0149) |
| Duval | 0.7598 | (0.0954) | 0.7463 | (0.1406) | 0.781 | (0.0668) | 0.7865 | (0.1510) | 0.8307 | (0.1302) |
| Eastland | 0.7503 | (0.0120) | 0.7044 | (0.0238) | 0.6758 | (0.0100) | 0.7251 | (0.0199) | 0.7193 | (0.0202) |
| Ector | 0.595 | (0.0672) | 0.6643 | (0.1305) | 0.6346 | (0.0411) | 0.7817 | (0.0880) | 0.8371 | (0.0800) |
| Edwards | 0.9337 | (0.0380) | 0.9056 | (0.0491) | 0.8832 | (0.0452) | 0.9463 | (0.0305) | 0.9304 | (0.0415) |
| El Paso | 0.6577 | (0.1131) | 0.7476 | (0.1849) | 0.7048 | (0.0596) | 0.8089 | (0.1573) | 0.8174 | (0.1220) |
| Ellis | 0.7084 | (0.0326) | 0.7604 | (0.0690) | 0.7517 | (0.0252) | 0.7126 | (0.0650) | 0.9448 | (0.0321) |
| Erath | 0.5633 | (0.0164) | 0.5914 | (0.0271) | 0.6394 | (0.0107) | 0.7073 | (0.0285) | 0.7833 | (0.0260) |
| Falls | 0.7497 | (0.0509) | 0.7692 | (0.1126) | 0.6782 | (0.0435) | 0.8101 | (0.0981) | 0.7562 | (0.1191) |
| Fannin | 0.6755 | (0.0111) | 0.6795 | (0.0225) | 0.7198 | (0.0100) | 0.7656 | (0.0242) | 0.7856 | (0.0229) |
| Fayette | 0.7204 | (0.0257) | 0.7569 | (0.0433) | 0.7473 | (0.0171) | 0.7963 | (0.0448) | 0.8025 | (0.0336) |


| County | 1990 |  | 1992 |  | 1994 |  | 1996 |  | 1998 |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Fisher | 0.888 | (0.0293) | 0.9036 | (0.0419) | 0.818 | (0.0200) | 0.8449 | (0.0588) | 0.8244 | (0.0574) |
| Floyd | 0.8278 | (0.0510) | 0.8218 | (0.0877) | 0.7884 | (0.0423) | 0.8411 | (0.0912) | 0.8189 | (0.1099) |
| Foard | 0.9167 | (0.0216) | 0.901 | (0.0436) | 0.7973 | (0.0171) | 0.8612 | (0.0430) | 0.8536 | (0.0393) |
| Fort Bend | 0.615 | (0.0792) | 0.7268 | (0.1255) | 0.7336 | (0.0487) | 0.8624 | (0.0834) | 0.916 | (0.0509) |
| Franklin | 0.7504 | (0.0118) | 0.7721 | (0.0233) | 0.7197 | (0.0080) | 0.8752 | (0.0193) | 0.8844 | (0.0216) |
| Freestone | 0.757 | (0.0347) | 0.802 | (0.0572) | 0.714 | (0.0234) | 0.7971 | (0.0607) | 0.7746 | (0.0599) |
| Frio | 0.8402 | (0.0841) | 0.7639 | (0.1279) | 0.8374 | (0.0665) | 0.812 | (0.1039) | 0.822 | (0.1242) |
| Gaines | 0.6812 | (0.0519) | 0.7136 | (0.1059) | 0.6695 | (0.0358) | 0.7498 | (0.0945) | 0.8154 | (0.0965) |
| Galveston | 0.6812 | (0.0496) | 0.7071 | (0.1011) | 0.7888 | (0.0343) | 0.9286 | (0.0402) | 0.8951 | (0.0609) |
| Garza | 0.7857 | (0.0461) | 0.8215 | (0.0801) | 0.7142 | (0.0327) | 0.8368 | (0.0867) | 0.8262 | (0.0847) |
| Gillespie | 0.7416 | (0.0189) | 0.7897 | (0.0390) | 0.7522 | (0.0153) | 0.8219 | (0.0416) | 0.8678 | (0.0357) |
| Glasscock | 0.8657 | (0.0384) | 0.9127 | (0.0489) | 0.8486 | (0.0239) | 0.8647 | (0.0637) | 0.884 | (0.0577) |
| Goliad | 0.8207 | (0.0540) | 0.8661 | (0.0736) | 0.867 | (0.0412) | 0.9332 | (0.0352) | 0.8547 | (0.0910) |
| Gonzales | 0.8195 | (0.0643) | 0.8016 | (0.0970) | 0.7756 | (0.0405) | 0.8822 | (0.0670) | 0.9039 | (0.0466) |
| Gray | 0.7495 | (0.0162) | 0.7635 | (0.0298) | 0.7613 | (0.0105) | 0.8112 | (0.0325) | 0.8616 | (0.0329) |
| Grayson | 0.651 | (0.0152) | 0.7226 | (0.0304) | 0.7289 | (0.0112) | 0.8939 | (0.0274) | 0.9454 | (0.0209) |
| Gregg | 0.7007 | (0.0281) | 0.7676 | (0.0633) | 0.764 | (0.0226) | 0.9393 | (0.0353) | 0.9661 | (0.0213) |
| Grimes | 0.7436 | (0.0613) | 0.7791 | (0.0966) | 0.7387 | (0.0354) | 0.8437 | (0.0741) | 0.8799 | (0.0623) |
| Guadalupe | 0.6252 | (0.0470) | 0.6875 | (0.1022) | 0.7243 | (0.0364) | 0.8857 | (0.0576) | 0.963 | (0.0219) |
| Hale | 0.605 | (0.0733) | 0.6977 | (0.1581) | 0.6614 | (0.0550) | 0.8034 | (0.1205) | 0.8528 | (0.1123) |
| Hall | 0.9501 | (0.0222) | 0.9706 | (0.0178) | 0.8535 | (0.0240) | 0.8995 | (0.0436) | 0.9096 | (0.0424) |
| Hamilton | 0.7457 | (0.0067) | 0.739 | (0.0122) | 0.7122 | (0.0056) | 0.7833 | (0.0123) | 0.8233 | (0.0130) |
| Hansford | 0.8835 | (0.0246) | 0.8283 | (0.0563) | 0.7472 | (0.0191) | 0.8138 | (0.0532) | 0.86 | (0.0535) |
| Hardeman | 0.7475 | (0.0245) | 0.7307 | (0.0424) | 0.6885 | (0.0157) | 0.7594 | (0.0454) | 0.7357 | (0.0451) |
| Hardin | 0.8344 | (0.0131) | 0.8932 | (0.0255) | 0.8752 | (0.0122) | 0.8344 | (0.0250) | 0.8433 | (0.0226) |
| Harris | 0.6474 | (0.0888) | 0.7633 | (0.1194) | 0.6883 | (0.0408) | 0.8637 | (0.0812) | 0.869 | (0.0656) |


| County | 1990 |  | 1992 |  | 1994 |  | 1996 |  | 1998 |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Harrison | 0.7321 | (0.0377) | 0.8013 | (0.0759) | 0.7776 | (0.0273) | 0.9112 | (0.0462) | 0.9473 | (0.0307) |
| Hartley | 0.8885 | (0.0070) | 0.9121 | (0.0155) | 0.9226 | (0.0067) | 0.7247 | (0.0611) | 0.788 | (0.0519) |
| Haskell | 0.8255 | (0.0306) | 0.8556 | (0.0582) | 0.8096 | (0.0229) | 0.903 | (0.0472) | 0.9176 | (0.0441) |
| Hays | 0.6488 | (0.0520) | 0.7443 | (0.0915) | 0.699 | (0.0362) | 0.8994 | (0.0505) | 0.9638 | (0.0263) |
| Hemphill | 0.8735 | (0.0126) | 0.8508 | (0.0264) | 0.7931 | (0.0114) | 0.8509 | (0.0281) | 0.89 | (0.0261) |
| Henderson | 0.684 | (0.0151) | 0.73 | (0.0255) | 0.7334 | (0.0108) | 0.8376 | (0.0272) | 0.8562 | (0.0224) |
| Hidalgo | 0.7514 | (0.0889) | 0.7504 | (0.1540) | 0.7349 | (0.0659) | 0.7897 | (0.1525) | 0.7995 | (0.1456) |
| Hill | 0.6443 | (0.0255) | 0.6795 | (0.0405) | 0.6951 | (0.0178) | 0.7922 | (0.0401) | 0.796 | (0.0449) |
| Hockley | 0.6773 | (0.0630) | 0.722 | (0.1086) | 0.6873 | (0.0367) | 0.7917 | (0.0861) | 0.8237 | (0.0891) |
| Hood | 0.7391 | (0.0065) | 0.7884 | (0.0139) | 0.7283 | (0.0052) | 0.8269 | (0.0132) | 0.8366 | (0.0104) |
| Hopkins | 0.6635 | (0.0175) | 0.6347 | (0.0349) | 0.6721 | (0.0134) | 0.7906 | (0.0335) | 0.829 | (0.0321) |
| Houston | 0.7902 | (0.0506) | 0.8406 | (0.0742) | 0.8685 | (0.0272) | 0.9099 | (0.0565) | 0.9441 | (0.0311) |
| Howard | 0.6623 | (0.0482) | 0.6954 | (0.0977) | 0.6659 | (0.0358) | 0.8039 | (0.0840) | 0.8209 | (0.0745) |
| Hudspeth | 0.8158 | (0.0815) | 0.7973 | (0.0878) | 0.8452 | (0.0583) | 0.8109 | (0.1158) | 0.8326 | (0.1120) |
| Hunt | 0.6232 | (0.0219) | 0.6616 | (0.0417) | 0.677 | (0.0176) | 0.7985 | (0.0374) | 0.8599 | (0.0398) |
| Hutchinson | 0.8056 | (0.0133) | 0.8033 | (0.0355) | 0.8066 | (0.0117) | 0.9314 | (0.0257) | 0.97 | (0.0167) |
| Irion | 0.8991 | (0.0251) | 0.9351 | (0.0391) | 0.9597 | (0.0154) | 0.9054 | (0.0478) | 0.883 | (0.0527) |
| Jack | 0.8221 | (0.0060) | 0.8345 | (0.0090) | 0.7974 | (0.0036) | 0.884 | (0.0089) | 0.9052 | (0.0083) |
| Jackson | 0.7236 | (0.0484) | 0.7762 | (0.0837) | 0.7301 | (0.0327) | 0.8428 | (0.0677) | 0.9013 | (0.0546) |
| Jasper | 0.8234 | (0.0297) | 0.9199 | (0.0395) | 0.7417 | (0.0186) | 0.8338 | (0.0498) | 0.8425 | (0.0527) |
| Jeff Davis | 0.8526 | (0.0445) | 0.8843 | (0.0633) | 0.9476 | (0.0265) | 0.8733 | (0.0647) | 0.8764 | (0.0759) |
| Jefferson | 0.7457 | (0.0532) | 0.8186 | (0.0860) | 0.799 | (0.0304) | 0.9232 | (0.0420) | 0.9541 | (0.0291) |
| Jim Hogg | 0.8014 | (0.0833) | 0.7183 | (0.1582) | 0.7899 | (0.0694) | 0.796 | (0.1568) | 0.8287 | (0.1364) |
| Jim Wells | 0.7959 | (0.0938) | 0.751 | (0.1278) | 0.8273 | (0.0583) | 0.8429 | (0.0778) | 0.8881 | (0.0588) |
| Johnson | 0.6609 | (0.0150) | 0.7101 | (0.0259) | 0.7105 | (0.0122) | 0.8226 | (0.0307) | 0.8419 | (0.0250) |
| Jones | 0.6984 | (0.0260) | 0.6628 | (0.0582) | 0.6017 | (0.0368) | 0.6902 | (0.0877) | 0.7083 | (0.0848) |


| County | 1990 |  | 1992 |  | 1994 |  | 1996 |  | 1998 |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Karnes | 0.8155 | (0.0661) | 0.7946 | (0.1073) | 0.7782 | (0.0444) | 0.8062 | (0.1381) | 0.7986 | (0.1398) |
| Kaufman | 0.6546 | (0.0328) | 0.6569 | (0.0544) | 0.7238 | (0.0207) | 0.8571 | (0.0406) | 0.8971 | (0.0401) |
| Kendall | 0.7357 | (0.0218) | 0.8506 | (0.0444) | 0.7772 | (0.0165) | 0.9565 | (0.0235) | 0.8375 | (0.0344) |
| Kenedy | 0.8226 | (0.0992) | 0.7397 | (0.1318) | 0.8657 | (0.0627) | 0.7972 | (0.1442) | 0.8548 | (0.1277) |
| Kent | 0.8979 | (0.0136) | 0.9305 | (0.0306) | 0.9047 | (0.0131) | 0.8813 | (0.0317) | 0.8614 | (0.0286) |
| Kerr | 0.7193 | (0.0237) | 0.7445 | (0.0459) | 0.7408 | (0.0211) | 0.8836 | (0.0479) | 0.9148 | (0.0450) |
| Kimble | 0.7595 | (0.0275) | 0.7629 | (0.0496) | 0.8076 | (0.0164) | 0.9144 | (0.0425) | 0.9169 | (0.0381) |
| King | 0.899 | (0.0176) | 0.9266 | (0.0334) | 0.8769 | (0.0135) | 0.8893 | (0.0360) | 0.8712 | (0.0320) |
| Kinney | 0.7971 | (0.0642) | 0.8845 | (0.0548) | 0.8999 | (0.0416) | 0.8645 | (0.0868) | 0.8627 | (0.0813) |
| Kleberg | 0.6715 | (0.0956) | 0.7675 | (0.1357) | 0.7198 | (0.0631) | 0.8057 | (0.1337) | 0.8303 | (0.1244) |
| Knox | 0.7735 | (0.0374) | 0.809 | (0.0803) | 0.8222 | (0.0285) | 0.8508 | (0.0700) | 0.8107 | (0.0820) |
| La Salle | 0.7825 | (0.0966) | 0.7405 | (0.1442) | 0.7716 | (0.0657) | 0.828 | (0.1285) | 0.8716 | (0.0698) |
| Lamar | 0.695 | (0.0212) | 0.718 | (0.0447) | 0.8476 | (0.0145) | 0.853 | (0.0388) | 0.9166 | (0.0341) |
| Lamb | 0.7939 | (0.0581) | 0.8187 | (0.1001) | 0.742 | (0.0414) | 0.8142 | (0.0974) | 0.8505 | (0.0922) |
| Lampasas | 0.6931 | (0.0211) | 0.6861 | (0.0451) | 0.6372 | (0.0188) | 0.7097 | (0.0407) | 0.7093 | (0.0352) |
| Lavaca | 0.7451 | (0.0176) | 0.7699 | (0.0456) | 0.7421 | (0.0203) | 0.822 | (0.0408) | 0.8414 | (0.0329) |
| Lee | 0.7527 | (0.0319) | 0.7635 | (0.0694) | 0.7152 | (0.0256) | 0.6769 | (0.0661) | 0.8445 | (0.0540) |
| Leon | 0.8641 | (0.0237) | 0.8991 | (0.0381) | 0.8508 | (0.0141) | 0.9709 | (0.0176) | 0.8699 | (0.0295) |
| Liberty | 0.7019 | (0.0263) | 0.7171 | (0.0529) | 0.7665 | (0.0204) | 0.9049 | (0.0456) | 0.9399 | (0.0354) |
| Limestone | 0.6322 | (0.0435) | 0.6804 | (0.0795) | 0.6581 | (0.0346) | 0.7647 | (0.0617) | 0.7909 | (0.0667) |
| Lipscomb | 0.8864 | (0.0134) | 0.8729 | (0.0328) | 0.8065 | (0.0116) | 0.8841 | (0.0309) | 0.9126 | (0.0305) |
| Live Oak | 0.8785 | (0.0392) | 0.9004 | (0.0488) | 0.8677 | (0.0303) | 0.9302 | (0.0394) | 0.9436 | (0.0318) |
| Llano | 0.8144 | (0.0046) | 0.8705 | (0.0106) | 0.8477 | (0.0038) | 0.8259 | (0.0084) | 0.8503 | (0.0085) |
| Loving | 0.8999 | (0.0147) | 0.9243 | (0.0275) | 0.9017 | (0.0111) | 0.8698 | (0.0250) | 0.8321 | (0.0221) |
| Lubbock | 0.5831 | (0.0510) | 0.6752 | (0.0959) | 0.6491 | (0.0348) | 0.8241 | (0.0736) | 0.8674 | (0.0699) |
| Lynn | 0.8173 | (0.0569) | 0.8319 | (0.0754) | 0.7921 | (0.0484) | 0.8333 | (0.0894) | 0.8466 | (0.0929) |


| County | 1990 |  | 1992 |  | 1994 |  | 1996 |  | 1998 |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Madison | 0.8494 | (0.0451) | 0.8883 | (0.0541) | 0.8664 | (0.0294) | 0.9539 | (0.0301) | 0.8698 | (0.0627) |
| Marion | 0.8856 | (0.0408) | 0.8995 | (0.0572) | 0.8903 | (0.0270) | 0.8589 | (0.0646) | 0.8836 | (0.0640) |
| Martin | 0.7725 | (0.0586) | 0.8578 | (0.0727) | 0.8393 | (0.0367) | 0.9195 | (0.0463) | 0.8398 | (0.0972) |
| Mason | 0.8982 | (0.0234) | 0.9251 | (0.0380) | 0.8955 | (0.0173) | 0.897 | (0.0376) | 0.9008 | (0.0404) |
| Matagorda | 0.6798 | (0.0647) | 0.7769 | (0.1002) | 0.7185 | (0.0400) | 0.834 | (0.0848) | 0.8646 | (0.0848) |
| Maverick | 0.7511 | (0.1132) | 0.7229 | (0.1469) | 0.8298 | (0.0675) | 0.8148 | (0.1306) | 0.8123 | (0.1457) |
| McCulloch | 0.711 | (0.0407) | 0.8061 | (0.0816) | 0.7243 | (0.0375) | 0.8499 | (0.0587) | 0.8854 | (0.0599) |
| McLennan | 0.6536 | (0.0488) | 0.7257 | (0.0885) | 0.7082 | (0.0367) | 0.8403 | (0.0689) | 0.8584 | (0.0634) |
| McMullen | 0.944 | (0.0318) | 0.9064 | (0.0514) | 0.9018 | (0.0336) | 0.8775 | (0.0696) | 0.871 | (0.0729) |
| Medina | 0.7265 | (0.0697) | 0.784 | (0.1069) | 0.7252 | (0.0431) | 0.8405 | (0.0925) | 0.8577 | (0.0806) |
| Menard | 0.9234 | (0.0317) | 0.9186 | (0.0395) | 0.9407 | (0.0242) | 0.8888 | (0.0562) | 0.8722 | (0.0623) |
| Midland | 0.669 | (0.0527) | 0.7136 | (0.0801) | 0.7139 | (0.0290) | 0.8486 | (0.0673) | 0.9056 | (0.0518) |
| Milam | 0.7262 | (0.0390) | 0.7221 | (0.0808) | 0.6796 | (0.0288) | 0.7682 | (0.0758) | 0.8294 | (0.0722) |
| Mills | 0.7301 | (0.0145) | 0.7548 | (0.0255) | 0.7575 | (0.0101) | 0.8083 | (0.0290) | 0.7947 | (0.0272) |
| Mitchell | 0.8162 | (0.0470) | 0.8134 | (0.0890) | 0.7217 | (0.0393) | 0.7322 | (0.1091) | 0.8042 | (0.1211) |
| Montague | 0.7741 | (0.0043) | 0.7775 | (0.0084) | 0.7985 | (0.0036) | 0.9039 | (0.0081) | 0.9073 | (0.0085) |
| Montgomery | 0.6755 | (0.0164) | 0.7326 | (0.0301) | 0.7483 | (0.0106) | 0.8645 | (0.0296) | 0.9137 | (0.0236) |
| Moore | 0.6957 | (0.0490) | 0.7287 | (0.0997) | 0.7217 | (0.0347) | 0.8376 | (0.0813) | 0.8739 | (0.0709) |
| Morris | 0.8388 | (0.0319) | 0.8822 | (0.0648) | 0.8577 | (0.0243) | 0.8461 | (0.0626) | 0.9711 | (0.0178) |
| Motley | 0.9395 | (0.0140) | 0.9496 | (0.0274) | 0.8731 | (0.0115) | 0.8623 | (0.0324) | 0.8359 | (0.0309) |
| Nacogdoches | 0.6134 | (0.0389) | 0.7542 | (0.0675) | 0.6705 | (0.0226) | 0.8227 | (0.0459) | 0.8304 | (0.0497) |
| Navarro | 0.6732 | (0.0335) | 0.7271 | (0.0745) | 0.6592 | (0.0286) | 0.7507 | (0.0709) | 0.8338 | (0.0718) |
| Newton | 0.9157 | (0.0251) | 0.9079 | (0.0502) | 0.8221 | (0.0220) | 0.9312 | (0.0379) | 0.9037 | (0.0432) |
| Nolan | 0.6893 | (0.0452) | 0.7097 | (0.0925) | 0.7134 | (0.0295) | 0.8628 | (0.0649) | 0.8733 | (0.0611) |
| Nueces | 0.6976 | (0.0922) | 0.7647 | (0.1418) | 0.7389 | (0.0507) | 0.8315 | (0.0933) | 0.8647 | (0.0730) |
| Ochiltree | 0.7861 | (0.0225) | 0.7751 | (0.0525) | 0.6879 | (0.0203) | 0.7868 | (0.0545) | 0.8005 | (0.0546) |


| County | 1990 |  | 1992 |  | 1994 |  | 1996 |  | 1998 |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Oldham | 0.8991 | (0.0132) | 0.9327 | (0.0250) | 0.9345 | (0.0095) | 0.8877 | (0.0278) | 0.8593 | (0.0229) |
| Orange | 0.7212 | (0.0143) | 0.7498 | (0.0300) | 0.7447 | (0.0111) | 0.858 | (0.0276) | 0.8821 | (0.0274) |
| Palo Pinto | 0.642 | (0.0164) | 0.7048 | (0.0351) | 0.7042 | (0.0151) | 0.8171 | (0.0320) | 0.8722 | (0.0342) |
| Panola | 0.785 | (0.0240) | 0.8293 | (0.0494) | 0.7734 | (0.0172) | 0.8884 | (0.0411) | 0.9174 | (0.0393) |
| Parker | 0.6652 | (0.0079) | 0.7069 | (0.0131) | 0.7438 | (0.0060) | 0.8855 | (0.0128) | 0.9576 | (0.0124) |
| Parmer | 0.6356 | (0.0788) | 0.6856 | (0.1352) | 0.6547 | (0.0476) | 0.789 | (0.1268) | 0.7875 | (0.1418) |
| Pecos | 0.8649 | (0.0635) | 0.7924 | (0.1092) | 0.7919 | (0.0522) | 0.7978 | (0.1401) | 0.8162 | (0.1383) |
| Polk | 0.8404 | (0.0228) | 0.885 | (0.0476) | 0.8756 | (0.0180) | 0.9159 | (0.0417) | 0.8578 | (0.0521) |
| Potter | 0.4794 | (0.0680) | 0.5086 | (0.1117) | 0.555 | (0.0393) | 0.7006 | (0.0954) | 0.7589 | (0.1026) |
| Presidio | 0.8092 | (0.0980) | 0.7334 | (0.1582) | 0.8356 | (0.0640) | 0.8184 | (0.0896) | 0.8179 | (0.1551) |
| Rains | 0.7688 | (0.0086) | 0.7585 | (0.0154) | 0.7397 | (0.0064) | 0.8243 | (0.0138) | 0.9007 | (0.0122) |
| Randall | 0.7242 | (0.0119) | 0.7478 | (0.0205) | 0.7474 | (0.0087) | 0.9128 | (0.0210) | 0.9693 | (0.0146) |
| Reagan | 0.7448 | (0.0688) | 0.7588 | (0.1258) | 0.6655 | (0.0445) | 0.7944 | (0.1245) | 0.7826 | (0.1279) |
| Real | 0.9021 | (0.0291) | 0.9385 | (0.0392) | 0.8304 | (0.0216) | 0.8927 | (0.0441) | 0.9011 | (0.0459) |
| Red River | 0.8065 | (0.0316) | 0.8176 | (0.0625) | 0.7429 | (0.0238) | 0.8025 | (0.0590) | 0.7912 | (0.0553) |
| Reeves | 0.8089 | (0.0880) | 0.7276 | (0.1692) | 0.7842 | (0.0609) | 0.788 | (0.1513) | 0.8045 | (0.1356) |
| Refugio | 0.8989 | (0.0483) | 0.894 | (0.0545) | 0.8373 | (0.0396) | 0.8407 | (0.0907) | 0.8627 | (0.0854) |
| Roberts | 0.8945 | (0.0041) | 0.9046 | (0.0086) | 0.8978 | (0.0032) | 0.8674 | (0.0076) | 0.8487 | (0.0062) |
| Robertson | 0.8517 | (0.0503) | 0.832 | (0.0872) | 0.7887 | (0.0399) | 0.8776 | (0.0636) | 0.9106 | (0.0508) |
| Rockwall | 0.7722 | (0.0120) | 0.8603 | (0.0226) | 0.8082 | (0.0080) | 0.9599 | (0.0172) | 0.8368 | (0.0181) |
| Runnels | 0.754 | (0.0345) | 0.7884 | (0.0777) | 0.7235 | (0.0228) | 0.8061 | (0.0651) | 0.8251 | (0.0627) |
| Rusk | 0.7779 | (0.0332) | 0.8222 | (0.0649) | 0.7746 | (0.0220) | 0.8836 | (0.0525) | 0.8867 | (0.0504) |
| Sabine | 0.8074 | (0.0162) | 0.8774 | (0.0301) | 0.846 | (0.0106) | 0.9556 | (0.0198) | 0.9407 | (0.0229) |
| San Augustine | 0.8155 | (0.0387) | 0.822 | (0.0753) | 0.9613 | (0.0167) | 0.8547 | (0.0617) | 0.8806 | (0.0592) |
| San Jacinto | 0.758 | (0.0247) | 0.8061 | (0.0455) | 0.7963 | (0.0158) | 0.9075 | (0.0312) | 0.954 | (0.0215) |
| San Patricio | 0.7352 | (0.0746) | 0.763 | (0.1204) | 0.7385 | (0.0443) | 0.8256 | (0.1015) | 0.8689 | (0.0887) |


| County | 1990 |  | 1992 |  | 1994 |  | 1996 |  | 1998 |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| San Saba | 0.7636 | (0.0242) | 0.7626 | (0.0662) | 0.6858 | (0.0289) | 0.8182 | (0.0569) | 0.8331 | (0.0509) |
| Schleicher | 0.8956 | (0.0450) | 0.9115 | (0.0500) | 0.8447 | (0.0329) | 0.9536 | (0.0267) | 0.9237 | (0.0423) |
| Scurry | 0.682 | (0.0433) | 0.7311 | (0.0862) | 0.7432 | (0.0267) | 0.8456 | (0.0645) | 0.9009 | (0.0540) |
| Shackelford | 0.9035 | (0.0101) | 0.8576 | (0.0224) | 0.9033 | (0.0099) | 0.9576 | (0.0192) | 0.881 | (0.0196) |
| Shelby | 0.8177 | (0.0271) | 0.8725 | (0.0532) | 0.7882 | (0.0234) | 0.9359 | (0.0348) | 0.9219 | (0.0419) |
| Sherman | 0.9138 | (0.0212) | 0.9288 | (0.0357) | 0.8397 | (0.0192) | 0.8591 | (0.0411) | 0.837 | (0.0479) |
| Smith | 0.6773 | (0.0465) | 0.741 | (0.0795) | 0.6746 | (0.0305) | 0.808 | (0.0763) | 0.8079 | (0.0553) |
| Somervell | 0.9577 | (0.0144) | 0.8115 | (0.0335) | 0.7731 | (0.0130) | 0.891 | (0.0335) | 0.821 | 0.0306) |
| Starr | 0.7479 | (0.0980) | 0.7349 | (0.1525) | 0.7581 | (0.0735) | 0.8147 | (0.1263) | 0.8072 | (0.1409) |
| Stephens | 0.8261 | (0.0128) | 0.8257 | (0.0261) | 0.7963 | (0.0105) | 0.8227 | (0.0344) | 0.8201 | (0.0292) |
| Sterling | 0.9242 | (0.0277) | 0.9251 | (0.0440) | 0.9048 | (0.0231) | 0.8934 | (0.0510) | 0.8734 | (0.0530) |
| Stonewall | 0.9015 | (0.0187) | 0.8683 | (0.0455) | 0.9338 | (0.0138) | 0.924 | (0.0359) | 0.8481 | (0.0411) |
| Sutton | 0.8589 | (0.0502) | 0.8519 | (0.0693) | 0.8153 | (0.0425) | 0.8651 | (0.0753) | 0.8635 | (0.0708) |
| Swisher | 0.7861 | (0.0487) | 0.7577 | (0.0956) | 0.7187 | (0.0419) | 0.8294 | (0.0934) | 0.8409 | (0.0849) |
| Tarrant | 0.6303 | (0.0372) | 0.725 | (0.0706) | 0.7038 | (0.0250) | 0.8583 | (0.0592) | 0.9075 | (0.0448) |
| Taylor | 0.6134 | (0.0358) | 0.6526 | (0.0600) | 0.6528 | (0.0251) | 0.8044 | (0.0597) | 0.8805 | (0.0503) |
| Terrell | 0.8791 | (0.0596) | 0.9067 | (0.0514) | 0.9409 | (0.0304) | 0.8605 | (0.0763) | 0.8713 | (0.0852) |
| Terry | 0.7959 | (0.0669) | 0.7961 | (0.0941) | 0.7261 | (0.0452) | 0.825 | (0.1079) | 0.8557 | (0.0869) |
| Throckmorton | 0.9179 | (0.0086) | 0.9635 | (0.0170) | 0.895 | (0.0069) | 0.9042 | (0.0196) | 0.8699 | (0.0162) |
| Titus | 0.7296 | (0.0283) | 0.7505 | (0.0717) | 0.7217 | (0.0246) | 0.8026 | (0.0584) | 0.8339 | (0.0624) |
| Tom Green | 0.6087 | (0.0497) | 0.6855 | (0.0964) | 0.6652 | (0.0366) | 0.8115 | (0.0788) | 0.8607 | (0.0700) |
| Travis | 0.7221 | (0.0479) | 0.8373 | (0.0813) | 0.8032 | (0.0349) | 0.9598 | (0.0245) | 0.8965 | (0.0578) |
| Trinity | 0.8165 | (0.0180) | 0.7999 | (0.0417) | 0.7774 | (0.0130) | 0.848 | (0.0428) | 0.8621 | (0.0334) |
| Tyler | 0.8486 | (0.0152) | 0.8203 | (0.0419) | 0.7481 | (0.0164) | 0.8872 | (0.0363) | 0.908 | (0.0339) |
| Upshur | 0.7368 | (0.0207) | 0.7549 | (0.0376) | 0.7461 | (0.0146) | 0.8425 | (0.0286) | 0.8633 | (0.0296) |
| Upton | 0.8619 | (0.0461) | 0.8675 | (0.0665) | 0.7965 | (0.0305) | 0.8272 | (0.0923) | 0.8251 | (0.0971) |


| County | 1990 |  | 1992 |  | 1994 |  | 1996 |  | 1998 |  |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Uvalde | 0.7967 | $(0.0832)$ | 0.8139 | $(0.0784)$ | 0.8557 | $(0.0507)$ | 0.9352 | $(0.0326)$ | 0.8326 | $(0.1116)$ |
| Val Verde | 0.6597 | $(0.0967)$ | 0.7412 | $(0.1842)$ | 0.7105 | $(0.0618)$ | 0.8004 | $(0.1210)$ | 0.8407 | $(0.1143)$ |
| Van Zandt | 0.7469 | $(0.0108)$ | 0.8066 | $(0.0180)$ | 0.7852 | $(0.0078)$ | 0.9078 | $(0.0174)$ | 0.9636 | $(0.0137)$ |
| Victoria | 0.6889 | $(0.0702)$ | 0.7591 | $(0.1221)$ | 0.7404 | $(0.0388)$ | 0.8915 | $(0.0574)$ | 0.9408 | $(0.0323)$ |
| Walker | 0.6164 | $(0.0681)$ | 0.7523 | $(0.1003)$ | 0.6911 | $(0.0350)$ | 0.8849 | $(0.0634)$ | 0.9296 | $(0.0372)$ |
| Waller | 0.7464 | $(0.0766)$ | 0.8719 | $(0.0672)$ | 0.7631 | $(0.0441)$ | 0.9022 | $(0.0500)$ | 0.9246 | $(0.0385)$ |
| Ward | 0.7497 | $(0.0548)$ | 0.766 | $(0.1154)$ | 0.6867 | $(0.0408)$ | 0.802 | $(0.1044)$ | 0.8263 | $(0.0988)$ |
| Washington | 0.7012 | $(0.0385)$ | 0.7743 | $(0.0710)$ | 0.7664 | $(0.0249)$ | 0.834 | $(0.0669)$ | 0.8562 | $(0.0540)$ |
| Webb | 0.7564 | $(0.0937)$ | 0.7351 | $(0.1593)$ | 0.7763 | $(0.0669)$ | 0.786 | $(0.1530)$ | 0.8378 | $(0.1253)$ |
| Wharton | 0.6618 | $(0.0652)$ | 0.7227 | $(0.1333)$ | 0.6566 | $(0.0498)$ | 0.7685 | $(0.1243)$ | 0.7857 | $(0.1234)$ |
| Wheeler | 0.9221 | $(0.0116)$ | 0.9171 | $(0.0237)$ | 0.8493 | $(0.0102)$ | 0.916 | $(0.0248)$ | 0.8658 | $(0.0200)$ |
| Wichita | 0.6276 | $(0.0332)$ | 0.6616 | $(0.0493)$ | 0.6727 | $(0.0238)$ | 0.7965 | $(0.0560)$ | 0.8441 | $(0.0520)$ |
| Wilbarger | 0.6397 | $(0.0392)$ | 0.6719 | $(0.0742)$ | 0.6659 | $(0.0234)$ | 0.7396 | $(0.0728)$ | 0.7243 | $(0.0540)$ |
| Willacy | 0.7958 | $(0.0952)$ | 0.705 | $(0.1608)$ | 0.8213 | $(0.0594)$ | 0.7757 | $(0.1409)$ | 0.7984 | $(0.1700)$ |
| Williamson | 0.6299 | $(0.0276)$ | 0.687 | $(0.0600)$ | 0.7003 | $(0.0244)$ | 0.8911 | $(0.0452)$ | 0.9628 | $(0.0226)$ |
| Wilson | 0.8518 | $(0.0467)$ | 0.861 | $(0.0759)$ | 0.8502 | $(0.0270)$ | 0.9357 | $(0.0403)$ | 0.9451 | $(0.0301)$ |
| Winkler | 0.7447 | $(0.0552)$ | 0.7456 | $(0.0954)$ | 0.7377 | $(0.0434)$ | 0.8305 | $(0.0842)$ | 0.8481 | $(0.0862)$ |
| Wise | 0.6844 | $(0.0122)$ | 0.7208 | $(0.0227)$ | 0.7549 | $(0.0079)$ | 0.8808 | $(0.0273)$ | 0.9498 | $(0.0231)$ |
| Wood | 0.6684 | $(0.0147)$ | 0.7023 | $(0.0276)$ | 0.6564 | $(0.0125)$ | 0.7216 | $(0.0230)$ | 0.7417 | $(0.0194)$ |
| Yoakum | 0.6607 | $(0.0551)$ | 0.6836 | $(0.1199)$ | 0.681 | $(0.0386)$ | 0.781 | $(0.1009)$ | 0.7828 | $(0.1022)$ |
| Young | 0.7411 | $(0.0118)$ | 0.776 | $(0.0198)$ | 0.7365 | $(0.0086)$ | 0.8589 | $(0.0200)$ | 0.8931 | $(0.0209)$ |
| Zapata | 0.7826 | $(0.1010)$ | 0.727 | $(0.1539)$ | 0.8894 | $(0.0683)$ | 0.7888 | $(0.1344)$ | 0.8224 | $(0.1414)$ |
| Zavala | 0.7604 | $(0.1081)$ | 0.7196 | $(0.1711)$ | 0.7797 | $(0.0745)$ | 0.7997 | $(0.1557)$ | 0.8304 | $(0.1584)$ |

Note: The stardard error for each estimate is shown in parentheses.
Table A10 Appendix: Latino and White Voter Turnout in Texas, 1990-1998

|  | Latinos |  |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| County | 1990 |  | 1992 |  | 1994 |  | 1996 |  | 1998 |  |
| Anderson | 0.4232 | (0.0940) | 0.5691 | (0.0858) | 0.4425 | (0.0823) | 0.487 | (0.1046) | 0.2515 | (0.1210) |
| Andrews | 0.4687 | (0.0850) | 0.6422 | (0.0561) | 0.4617 | (0.0648) | 0.5444 | (0.0714) | 0.2597 | (0.0764) |
| Angelina | 0.417 | (0.0971) | 0.647 | (0.0753) | 0.6248 | (0.0838) | 0.4967 | (0.0970) | 0.2389 | (0.1074) |
| Aransas | 0.5107 | (0.0682) | 0.7069 | (0.0801) | 0.549 | (0.0826) | 0.5943 | (0.0854) | 0.3824 | (0.1136) |
| Archer | 0.4985 | (0.0988) | 0.678 | (0.0913) | 0.4532 | (0.0844) | 0.519 | (0.1030) | 0.3255 | (0.1099) |
| Armstrong | 0.448 | (0.0901) | 0.693 | (0.0966) | 0.5736 | (0.0933) | 0.5986 | (0.1077) | 0.5123 | (0.1244) |
| Atacosa | 0.3934 | (0.0438) | 0.5433 | (0.0426) | 0.3949 | (0.0430) | 0.4038 | (0.0359) | 0.4197 | (0.0460) |
| Austin | 0.4857 | (0.0845) | 0.6509 | (0.0845) | 0.4825 | (0.0838) | 0.525 | (0.0841) | 0.4008 | (0.1119) |
| Bailey | 0.4322 | (0.0623) | 0.6388 | (0.0563) | 0.4407 | (0.0474) | 0.5086 | (0.0528) | 0.4751 | (0.0636) |
| Bandera | 0.5161 | (0.0945) | 0.711 | (0.0797) | 0.4792 | (0.0827) | 0.5764 | (0.0984) | 0.3269 | (0.1011) |
| Bastrop | 0.459 | (0.0902) | 0.6136 | (0.0868) | 0.46 | (0.0674) | 0.5091 | (0.0942) | 0.3211 | (0.1005) |
| Baylor | 0.4002 | (0.0965) | 0.6101 | (0.0958) | 0.4863 | (0.0865) | 0.5901 | (0.0835) | 0.3103 | (0.1125) |
| Bee | 0.4501 | (0.0404) | 0.5322 | (0.0354) | 0.431 | (0.0387) | 0.3732 | (0.0437) | 0.4105 | (0.0523) |
| Bell | 0.4246 | (0.0971) | 0.6706 | (0.0841) | 0.3527 | (0.0815) | 0.4156 | (0.0960) | 0.1653 | (0.0839) |
| Bexar | 0.3865 | (0.0527) | 0.6647 | (0.0371) | 0.3619 | (0.0404) | 0.4308 | (0.0410) | 0.1985 | (0.0534) |
| Blanco | 0.57 | (0.0871) | 0.739 | (0.0752) | 0.5082 | (0.0842) | 0.5539 | (0.1026) | 0.4006 | (0.1140) |
| Borden | 0.6786 | (0.0917) | 0.6985 | (0.0808) | 0.5018 | (0.0831) | 0.6603 | (0.1001) | 0.5009 | (0.1075) |
| Bosque | 0.5226 | (0.0944) | 0.6625 | (0.0931) | 0.4575 | (0.0881) | 0.54 | (0.0879) | 0.379 | (0.1134) |
| Bowie | 0.3848 | (0.0882) | 0.634 | (0.0966) | 0.3909 | (0.0849) | 0.4881 | (0.1111) | 0.2348 | (0.1184) |
| Brazoria | 0.4577 | (0.0845) | 0.6707 | (0.0837) | 0.4446 | (0.0659) | 0.4881 | (0.0838) | 0.2457 | (0.0811) |
| Brazos | 0.4848 | (0.0892) | 0.7522 | (0.0778) | 0.462 | (0.0731) | 0.4707 | (0.0966) | 0.2405 | (0.0888) |
| Brewster | 0.3519 | (0.0555) | 0.5629 | (0.0513) | 0.3715 | (0.0472) | 0.5835 | (0.0491) | 0.3403 | (0.0641) |
| Briscoe | 0.6074 | (0.0761) | 0.7013 | (0.0715) | 0.4979 | (0.0833) | 0.7047 | (0.0822) | 0.3991 | (0.0918) |


| County | 1990 |  | 1992 |  | 1994 |  | 1996 |  | 1998 |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Brooks | 0.4784 | (0.0080) | 0.8806 | (0.0067) | 0.5025 | (0.0062) | 0.7346 | (0.0076) | 0.3009 | (0.0079) |
| Brown | 0.4551 | (0.1040) | 0.6212 | (0.0905) | 0.4243 | (0.0821) | 0.4787 | (0.0814) | 0.3007 | (0.0953) |
| Burleson | 0.4836 | (0.0906) | 0.5968 | (0.0764) | 0.4379 | (0.0861) | 0.4947 | (0.0945) | 0.3645 | (0.1102) |
| Burnet | 0.5271 | (0.0919) | 0.6981 | (0.0909) | 0.5279 | (0.0856) | 0.5925 | (0.0979) | 0.36 | (0.1032) |
| Caldwell | 0.4433 | (0.0628) | 0.5996 | (0.0555) | 0.3926 | (0.0505) | 0.4264 | (0.0570) | 0.574 | (0.0651) |
| Calhoun | 0.4687 | (0.0615) | 0.5781 | (0.0555) | 0.4059 | (0.0569) | 0.4527 | (0.0575) | 0.2842 | (0.0712) |
| Callahan | 0.4815 | (0.0865) | 0.6568 | (0.0988) | 0.4194 | (0.0829) | 0.51 | (0.0918) | 0.3014 | (0.1098) |
| Cameron | 0.3612 | (0.0150) | 0.5665 | (0.0122) | 0.3631 | (0.0106) | 0.425 | (0.0124) | 0.2134 | (0.0142) |
| Camp | 0.4368 | (0.0945) | 0.5827 | (0.0873) | 0.4445 | (0.0787) | 0.5373 | (0.1069) | 0.396 | (0.1110) |
| Carson | 0.5116 | (0.1066) | 0.6835 | (0.0953) | 0.5091 | (0.0931) | 0.5586 | (0.0871) | 0.535 | (0.1179) |
| Cass | 0.3869 | (0.1025) | 0.579 | (0.1019) | 0.3736 | (0.1032) | 0.4996 | (0.1013) | 0.2384 | (0.1263) |
| Castro | 0.4127 | (0.0582) | 0.5856 | (0.0412) | 0.5568 | (0.0476) | 0.4792 | (0.0550) | 0.3747 | (0.0453) |
| Chambers | 0.4183 | (0.0870) | 0.6331 | (0.0950) | 0.3836 | (0.0776) | 0.4689 | (0.0988) | 0.3235 | (0.1110) |
| Cherokee | 0.4055 | (0.1006) | 0.5529 | (0.0986) | 0.4019 | (0.0840) | 0.4641 | (0.1003) | 0.2781 | (0.0976) |
| Childress | 0.4357 | (0.0932) | 0.624 | (0.0826) | 0.4017 | (0.0781) | 0.4151 | (0.0773) | 0.2611 | (0.0987) |
| Clay | 0.4465 | (0.0888) | 0.6964 | (0.1051) | 0.4302 | (0.0999) | 0.5213 | (0.0991) | 0.2999 | (0.1071) |
| Cochran | 0.3787 | (0.0577) | 0.6264 | (0.0442) | 0.4004 | (0.0478) | 0.5154 | (0.0533) | 0.4351 | (0.0584) |
| Coke | 0.4775 | (0.1072) | 0.6715 | (0.1060) | 0.5479 | (0.0883) | 0.6596 | (0.1012) | 0.4966 | (0.1086) |
| Coleman | 0.4082 | (0.0973) | 0.6004 | (0.0899) | 0.44 | (0.0820) | 0.4703 | (0.0944) | 0.3142 | (0.0958) |
| Collin | 0.5077 | (0.1048) | 0.7648 | (0.0897) | 0.4406 | (0.1019) | 0.4948 | (0.0844) | 0.2655 | (0.1256) |
| Collingsworth | 0.4187 | (0.0868) | 0.6565 | (0.0820) | 0.5248 | (0.0688) | 0.5551 | (0.0903) | 0.3556 | (0.0914) |
| Colorado | 0.4179 | (0.0834) | 0.6211 | (0.0806) | 0.4957 | (0.0745) | 0.5018 | (0.0798) | 0.42 | (0.0934) |
| Comal | 0.4634 | (0.0788) | 0.5049 | (0.0726) | 0.4499 | (0.0655) | 0.5239 | (0.0806) | 0.2648 | (0.0977) |
| Comanche | 0.4348 | (0.0947) | 0.6426 | (0.0830) | 0.4485 | (0.0759) | 0.5321 | (0.0972) | 0.3752 | (0.0863) |
| Concho | 0.6582 | (0.0656) | 0.8884 | (0.0502) | 0.6223 | (0.0577) | 0.6917 | (0.0556) | 0.6054 | (0.0615) |
| Cooke | 0.4568 | (0.1073) | 0.6592 | (0.1084) | 0.4738 | (0.0865) | 0.5182 | (0.0955) | 0.3002 | (0.1075) |


| County | 1990 |  | 1992 |  | 1994 |  | 1996 |  | 1998 |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Coryell | 0.4032 | (0.0914) | 0.6327 | (0.0839) | 0.3303 | (0.0898) | 0.4006 | (0.1158) | 0.1566 | (0.1071) |
| Cottle | 0.4482 | (0.0874) | 0.5653 | (0.0936) | 0.2707 | (0.0817) | 0.5188 | (0.0836) | 0.3928 | (0.1027) |
| Crane | 0.5961 | (0.0754) | 0.6863 | (0.0564) | 0.5847 | (0.0612) | 0.6198 | (0.0565) | 0.3502 | (0.0742) |
| Crockett | 0.2203 | (0.0525) | 0.7262 | (0.0413) | 0.4775 | (0.0383) | 0.6212 | (0.0461) | 0.5005 | (0.0497) |
| Crosby | 0.4146 | (0.0539) | 0.5666 | (0.0550) | 0.3799 | (0.0430) | 0.5319 | (0.0497) | 0.3047 | (0.0486) |
| Culberson | 0.3691 | (0.0241) | 0.4255 | (0.0232) | 0.2298 | (0.0248) | 0.6578 | (0.0214) | 0.1898 | (0.0281) |
| Dallam | 0.4889 | (0.0825) | 0.6457 | (0.0608) | 0.4073 | (0.0616) | 0.5622 | (0.0705) | 0.2167 | (0.0828) |
| Dallas | 0.4603 | (0.0887) | 0.6658 | (0.0702) | 0.4232 | (0.0789) | 0.4599 | (0.0812) | 0.1885 | (0.0967) |
| Dawson | 0.3901 | (0.0604) | 0.5969 | (0.0421) | 0.4468 | (0.0511) | 0.4476 | (0.0424) | 0.2576 | (0.0592) |
| Deaf Smith | 0.431 | (0.0467) | 0.6144 | (0.0405) | 0.3984 | (0.0395) | 0.4827 | (0.0455) | 0.2773 | (0.0499) |
| Delta | 0.4109 | (0.1087) | 0.598 | (0.0952) | 0.3984 | (0.0761) | 0.497 | (0.1054) | 0.286 | (0.1058) |
| Denton | 0.4474 | (0.0944) | 0.7016 | (0.0798) | 0.4224 | (0.0846) | 0.4681 | (0.0986) | 0.1858 | (0.1130) |
| DeWitt | 0.3915 | (0.0825) | 0.5757 | (0.0712) | 0.3924 | (0.0672) | 0.4694 | (0.0745) | 0.2571 | (0.0861) |
| Dickens | 0.442 | (0.0816) | 0.6311 | (0.0790) | 0.5235 | (0.0893) | 0.5496 | (0.0838) | 0.3534 | (0.0955) |
| Dimmit | 0.6929 | (0.0152) | 0.8951 | (0.0111) | 0.4779 | (0.0104) | 0.5267 | (0.0140) | 0.2603 | (0.0127) |
| Donley | 0.4851 | (0.0876) | 0.6594 | (0.0830) | 0.4938 | (0.0782) | 0.5439 | (0.1142) | 0.4369 | (0.1130) |
| Duval | 0.6013 | (0.0105) | 0.73 | (0.0079) | 0.4778 | (0.0070) | 0.587 | (0.0106) | 0.4546 | (0.0114) |
| Eastland | 0.4479 | (0.0939) | 0.6296 | (0.0879) | 0.4946 | (0.0782) | 0.5455 | (0.0993) | 0.362 | (0.1000) |
| Ector | 0.4812 | (0.0707) | 0.6662 | (0.0628) | 0.4118 | (0.0658) | 0.4737 | (0.0541) | 0.221 | (0.0748) |
| Edwards | 0.5957 | (0.0514) | 0.6081 | (0.0391) | 0.5524 | (0.0396) | 0.6644 | (0.0525) | 0.5411 | (0.0469) |
| El Paso | 0.3512 | (0.0303) | 0.608 | (0.0211) | 0.3512 | (0.0207) | 0.418 | (0.0213) | 0.236 | (0.0278) |
| Ellis | 0.4563 | (0.0974) | 0.6656 | (0.0852) | 0.4282 | (0.0706) | 0.4483 | (0.0872) | 0.2484 | (0.1113) |
| Erath | 0.5156 | (0.0767) | 0.7139 | (0.0887) | 0.4488 | (0.0838) | 0.5157 | (0.0884) | 0.3052 | (0.0879) |
| Falls | 0.4026 | (0.0932) | 0.5114 | (0.0876) | 0.3361 | (0.0782) | 0.5179 | (0.0987) | 0.2679 | (0.1153) |
| Fannin | 0.4237 | (0.0898) | 0.7152 | (0.0943) | 0.387 | (0.0813) | 0.4857 | (0.1019) | 0.2935 | (0.1193) |
| Fayette | 0.5639 | (0.0978) | 0.6863 | (0.0672) | 0.4891 | (0.0782) | 0.5823 | (0.0917) | 0.4176 | (0.1235) |


| County | 1990 |  | 1992 |  | 1994 |  | 1996 |  | 1998 |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Fisher | 0.4695 | (0.1019) | 0.6383 | (0.0759) | 0.4624 | (0.0646) | 0.5779 | (0.0773) | 0.4353 | (0.0929) |
| Floyd | 0.4529 | (0.0606) | 0.6023 | (0.0477) | 0.5825 | (0.0503) | 0.5003 | (0.0529) | 0.2012 | (0.0485) |
| Foard | 0.4587 | (0.0928) | 0.5779 | (0.0789) | 0.3979 | (0.0865) | 0.4124 | (0.0946) | 0.2619 | (0.1100) |
| Fort Bend | 0.4737 | (0.0766) | 0.8247 | (0.0692) | 0.458 | (0.0621) | 0.5791 | (0.0805) | 0.243 | (0.1067) |
| Franklin | 0.4497 | (0.1034) | 0.6676 | (0.0932) | 0.4843 | (0.0944) | 0.5562 | (0.1003) | 0.3713 | (0.1055) |
| Freestone | 0.4492 | (0.1087) | 0.5984 | (0.0868) | 0.4392 | (0.0787) | 0.5483 | (0.0964) | 0.3653 | (0.1178) |
| Frio | 0.3004 | (0.0248) | 0.4759 | (0.0225) | 0.3339 | (0.0207) | 0.3961 | (0.0247) | 0.1893 | (0.0270) |
| Gaines | 0.4491 | (0.0720) | 0.6426 | (0.0641) | 0.4259 | (0.0633) | 0.4552 | (0.0618) | 0.3192 | (0.0773) |
| Galveston | 0.4026 | (0.0889) | 0.3506 | (0.0959) | 0.3923 | (0.0774) | 0.4392 | (0.0954) | 0.2773 | (0.1034) |
| Garza | 0.3952 | (0.0714) | 0.5886 | (0.0796) | 0.4474 | (0.0646) | 0.5655 | (0.0733) | 0.2891 | (0.0744) |
| Gillespie | 0.4994 | (0.0874) | 0.7349 | (0.0819) | 0.5269 | (0.0725) | 0.6282 | (0.0796) | 0.4078 | (0.0815) |
| Glasscock | 0.7296 | (0.0686) | 0.7547 | (0.0701) | 0.636 | (0.0631) | 0.6192 | (0.0792) | 0.6493 | (0.0811) |
| Goliad | 0.4907 | (0.0579) | 0.6992 | (0.0551) | 0.4791 | (0.0504) | 0.5755 | (0.0536) | 0.4979 | (0.0683) |
| Gonzales | 0.3431 | (0.0739) | 0.4657 | (0.0595) | 0.423 | (0.0588) | 0.4125 | (0.0627) | 0.3204 | (0.0715) |
| Gray | 0.5202 | (0.0921) | 0.6904 | (0.0836) | 0.5082 | (0.0802) | 0.538 | (0.1023) | 0.3174 | (0.1029) |
| Grayson | 0.4276 | (0.1101) | 0.6507 | (0.0936) | 0.4157 | (0.0878) | 0.4599 | (0.1074) | 0.263 | (0.1127) |
| Gregg | 0.4594 | (0.0960) | 0.6296 | (0.0930) | 0.3834 | (0.0910) | 0.4385 | (0.1321) | 0.2245 | (0.1115) |
| Grimes | 0.3875 | (0.0883) | 0.6284 | (0.0848) | 0.3953 | (0.0759) | 0.4939 | (0.0835) | 0.265 | (0.1132) |
| Guadalupe | 0.4499 | (0.0771) | 0.6505 | (0.0609) | 0.4097 | (0.0592) | 0.491 | (0.0682) | 0.219 | (0.0764) |
| Hale | 0.3991 | (0.0573) | 0.612 | (0.0509) | 0.4542 | (0.0477) | 0.4858 | (0.0556) | 0.3035 | (0.0591) |
| Hall | 0.404 | (0.0914) | 0.5096 | (0.0760) | 0.2641 | (0.0730) | 0.5221 | (0.0832) | 0.2563 | (0.0898) |
| Hamilton | 0.5658 | (0.0949) | 0.6514 | (0.0929) | 0.4885 | (0.0873) | 0.5601 | (0.1141) | 0.415 | (0.1148) |
| Hansford | 0.5451 | (0.0873) | 0.7262 | (0.0770) | 0.5328 | (0.0657) | 0.588 | (0.0797) | 0.4508 | (0.0830) |
| Hardeman | 0.4031 | (0.0847) | 0.5826 | (0.0915) | 0.3952 | (0.0959) | 0.4422 | (0.0957) | 0.3128 | (0.1038) |
| Hardin | 0.3393 | (0.0910) | 0.5608 | (0.1077) | 0.3211 | (0.0906) | 0.5934 | (0.1059) | 0.33 | (0.1143) |
| Harris | 0.3975 | (0.0864) | 0.6273 | (0.0883) | 0.3835 | (0.0700) | 0.4654 | (0.0819) | 0.2119 | (0.1009) |


| County | 1990 |  | 1992 |  | 1994 |  | 1996 |  | 1998 |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Harrison | 0.416 | (0.1041) | 0.6325 | (0.0938) | 0.3818 | (0.0895) | 0.4906 | (0.0999) | 0.2364 | (0.1120) |
| Hartley | 0.5356 | (0.1058) | 0.6957 | (0.0841) | 0.4939 | (0.0844) | 0.6623 | (0.0989) | 0.3769 | (0.1025) |
| Haskell | 0.4801 | (0.0791) | 0.5956 | (0.0773) | 0.4565 | (0.0665) | 0.5241 | (0.0811) | 0.4168 | (0.1001) |
| Hays | 0.4859 | (0.0851) | 0.6904 | (0.0731) | 0.4814 | (0.0781) | 0.4911 | (0.0827) | 0.2667 | (0.0867) |
| Hemphill | 0.5951 | (0.1002) | 0.7407 | (0.0935) | 0.5912 | (0.0897) | 0.5965 | (0.0891) | 0.3367 | (0.1076) |
| Henderson | 0.4605 | (0.1010) | 0.6451 | (0.0912) | 0.4364 | (0.0852) | 0.4915 | (0.1006) | 0.2613 | (0.1120) |
| Hidalgo | 0.3489 | (0.0115) | 0.5585 | (0.0083) | 0.3571 | (0.0096) | 0.4086 | (0.0095) | 0.1946 | (0.0088) |
| Hill | 0.4959 | (0.0932) | 0.6527 | (0.0978) | 0.4381 | (0.0853) | 0.482 | (0.1058) | 0.2543 | (0.1000) |
| Hockley | 0.3656 | (0.0703) | 0.6276 | (0.0528) | 0.3665 | (0.0657) | 0.479 | (0.0677) | 0.2726 | (0.0805) |
| Hood | 0.5012 | (0.0983) | 0.7325 | (0.0779) | 0.5806 | (0.1005) | 0.6721 | (0.0958) | 0.4496 | (0.1170) |
| Hopkins | 0.4879 | (0.0985) | 0.701 | (0.1104) | 0.4331 | (0.0892) | 0.5116 | (0.1058) | 0.3178 | (0.1189) |
| Houston | 0.4335 | (0.1079) | 0.5697 | (0.0855) | 0.3873 | (0.0836) | 0.4587 | (0.1085) | 0.2956 | (0.1055) |
| Howard | 0.4686 | (0.0735) | 0.6434 | (0.0766) | 0.4687 | (0.0699) | 0.5043 | (0.0684) | 0.3247 | (0.0920) |
| Hudspeth | 0.4252 | (0.0284) | 0.5976 | (0.0270) | 0.4926 | (0.0263) | 0.6248 | (0.0219) | 0.3396 | (0.0305) |
| Hunt | 0.4445 | (0.0944) | 0.6637 | (0.0962) | 0.4284 | (0.0845) | 0.4664 | (0.0903) | 0.2449 | (0.0987) |
| Hutchinson | 0.4989 | (0.0824) | 0.685 | (0.0926) | 0.453 | (0.0762) | 0.5133 | (0.0926) | 0.2431 | (0.1052) |
| Irion | 0.5204 | (0.0694) | 0.7371 | (0.0767) | 0.4015 | (0.0579) | 0.6217 | (0.0853) | 0.4534 | (0.0853) |
| Jack | 0.4098 | (0.0873) | 0.6601 | (0.0971) | 0.4561 | (0.0777) | 0.462 | (0.1279) | 0.2824 | (0.1054) |
| Jackson | 0.4714 | (0.0771) | 0.63 | (0.0704) | 0.4217 | (0.0773) | 0.4931 | (0.0780) | 0.2688 | (0.0942) |
| Jasper | 0.3685 | (0.1081) | 0.5047 | (0.1190) | 0.3537 | (0.0959) | 0.4711 | (0.0965) | 0.2808 | (0.1290) |
| Jeff Davis | 0.5304 | (0.0679) | 0.6741 | (0.0544) | 0.4909 | (0.0447) | 0.7941 | (0.0580) | 0.4274 | (0.0615) |
| Jefferson | 0.4169 | (0.0946) | 0.6028 | (0.0912) | 0.3546 | (0.0958) | 0.4688 | (0.1126) | 0.263 | (0.1188) |
| Jim Hogg | 0.6045 | (0.0068) | 0.7822 | (0.0063) | 0.5526 | (0.0055) | 0.614 | (0.0066) | 0.4648 | (0.0072) |
| Jim Wells | 0.346 | (0.0280) | 0.5522 | (0.0191) | 0.3331 | (0.0189) | 0.3812 | (0.0206) | 0.2164 | (0.0240) |
| Johnson | 0.428 | (0.1055) | 0.6629 | (0.0917) | 0.3925 | (0.0781) | 0.4476 | (0.0976) | 0.245 | (0.1135) |
| Jones | 0.4247 | (0.0778) | 0.6677 | (0.0931) | 0.4411 | (0.0652) | 0.4751 | (0.0874) | 0.3528 | (0.0885) |


| County | 1990 |  | 1992 |  | 1994 |  | 1996 |  | 1998 |  |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Karnes | 0.4081 | $(0.0487)$ | 0.6007 | $(0.0388)$ | 0.5692 | $(0.0458)$ | 0.4883 | $(0.0522)$ | 0.3159 | $(0.0584)$ |
| Kaufman | 0.4277 | $(0.0826)$ | 0.6466 | $(0.0853)$ | 0.4025 | $(0.0904)$ | 0.4264 | $(0.0965)$ | 0.2469 | $(0.1219)$ |
| Kendall | 0.532 | $(0.0891)$ | 0.7228 | $(0.0731)$ | 0.5011 | $(0.0789)$ | 0.6415 | $(0.0909)$ | 0.4213 | $(0.0918)$ |
| Kenedy | 0.5799 | $(0.0174)$ | 0.6188 | $(0.0129)$ | 0.4153 | $(0.0142)$ | 0.9822 | $(0.0116)$ | 0.4653 | $(0.0177)$ |
| Kent | 0.7841 | $(0.1039)$ | 0.8367 | $(0.0694)$ | 0.5938 | $(0.0845)$ | 0.7446 | $(0.0849)$ | 0.5908 | $(0.0990)$ |
| Kerr | 0.4402 | $(0.0888)$ | 0.6968 | $(0.0839)$ | 0.4984 | $(0.0737)$ | 0.5577 | $(0.0924)$ | 0.3627 | $(0.0915)$ |
| Kimble | 0.5814 | $(0.1023)$ | 0.6218 | $(0.0761)$ | 0.598 | $(0.0740)$ | 0.5158 | $(0.0827)$ | 0.3324 | $(0.0898)$ |
| King | 0.741 | $(0.1072)$ | 0.8085 | $(0.0801)$ | 0.5691 | $(0.0792)$ | 0.7776 | $(0.0967)$ | 0.699 | $(0.1069)$ |
| Kinney | 0.618 | $(0.0564)$ | 0.7809 | $(0.0433)$ | 0.3189 | $(0.0405)$ | 0.6591 | $(0.0475)$ | 0.4189 | $(0.0457)$ |
| Kleberg | 0.4104 | $(0.0328)$ | 0.6768 | $(0.0282)$ | 0.6611 | $(0.0352)$ | 0.4479 | $(0.0302)$ | 0.2687 | $(0.0322)$ |
| Knox | 0.44 | $(0.0761)$ | 0.5981 | $(0.0758)$ | 0.4288 | $(0.0684)$ | 0.4554 | $(0.0846)$ | 0.4529 | $(0.0914)$ |
| La Salle | 0.5349 | $(0.0219)$ | 0.7978 | $(0.0151)$ | 0.4964 | $(0.0191)$ | 0.6328 | $(0.0209)$ | 0.2584 | $(0.0208)$ |
| Lamar | 0.3942 | $(0.1105)$ | 0.6062 | $(0.0802)$ | 0.3859 | $(0.0958)$ | 0.4259 | $(0.1195)$ | 0.2705 | $(0.0999)$ |
| Lamb | 0.2896 | $(0.0735)$ | 0.5862 | $(0.0584)$ | 0.399 | $(0.0469)$ | 0.488 | $(0.0658)$ | 0.3492 | $(0.0739)$ |
| Lampasas | 0.4534 | $(0.0781)$ | 0.6301 | $(0.0902)$ | 0.4797 | $(0.0784)$ | 0.5757 | $(0.0910)$ | 0.3908 | $(0.1056)$ |
| Lavaca | 0.4243 | $(0.1047)$ | 0.6329 | $(0.0823)$ | 0.4169 | $(0.0836)$ | 0.5261 | $(0.0966)$ | 0.3533 | $(0.1039)$ |
| Lee | 0.5268 | $(0.0826)$ | 0.6855 | $(0.0873)$ | 0.511 | $(0.0761)$ | 0.5466 | $(0.0858)$ | 0.3696 | $(0.0947)$ |
| Leon | 0.4182 | $(0.0886)$ | 0.5718 | $(0.0971)$ | 0.4094 | $(0.0866)$ | 0.503 | $(0.1010)$ | 0.346 | $(0.1199)$ |
| Liberty | 0.3888 | $(0.1026)$ | 0.5894 | $(0.0901)$ | 0.3436 | $(0.0833)$ | 0.3778 | $(0.1015)$ | 0.2085 | $(0.1040)$ |
| Limestone | 0.425 | $(0.0893)$ | 0.5636 | $(0.0947)$ | 0.4595 | $(0.0949)$ | 0.4787 | $(0.1030)$ | 0.247 | $(0.1231)$ |
| Lipscomb | 0.517 | $(0.0918)$ | 0.7116 | $(0.0953)$ | 0.6248 | $(0.0764)$ | 0.6293 | $(0.0909)$ | 0.4522 | $(0.0986)$ |
| Live Oak | 0.3389 | $(0.0701)$ | 0.5496 | $(0.0611)$ | 0.4019 | $(0.0611)$ | 0.4701 | $(0.0566)$ | 0.4588 | $(0.0698)$ |
| Llano | 0.5654 | $(0.0924)$ | 0.7476 | $(0.0918)$ | 0.5934 | $(0.1143)$ | 0.7895 | $(0.1020)$ | 0.5675 | $(0.1168)$ |
| Loving | 0.9403 | $(0.0288)$ | 1 | $(0.0000)$ | 1 | $(0.0000)$ | 1 | $(0.0000)$ | 1 | $(0.0000)$ |
| Lubbock | 0.4502 | $(0.0733)$ | 0.7038 | $(0.0655)$ | 0.431 | $(0.0716)$ | 0.4783 | $(0.0867)$ | 0.2609 | $(0.0850)$ |
| Lynn | 0.3796 | $(0.0546)$ | 0.5313 | $(0.0568)$ | 0.4252 | $(0.0548)$ | 0.5043 | $(0.0480)$ | 0.3129 | $(0.0631)$ |


| County | 1990 |  | 1992 |  | 1994 |  | 1996 |  | 1998 |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Madison | 0.4633 | (0.0991) | 0.5982 | (0.0906) | 0.4181 | (0.0756) | 0.4687 | (0.0919) | 0.358 | (0.1001) |
| Marion | 0.4495 | (0.0935) | 0.5674 | (0.0955) | 0.3545 | (0.0816) | 0.496 | (0.0962) | 0.2876 | (0.1246) |
| Martin | 0.4377 | (0.0618) | 0.6873 | (0.0501) | 0.3975 | (0.0546) | 0.5556 | (0.0510) | 0.3065 | (0.0661) |
| Mason | 0.5107 | (0.0738) | 0.6937 | (0.0744) | 0.5944 | (0.0843) | 0.7466 | (0.0919) | 0.5196 | (0.1032) |
| Matagorda | 0.4616 | (0.0776) | 0.9043 | (0.0582) | 0.4103 | (0.0636) | 0.5033 | (0.0709) | 0.3239 | (0.0821) |
| Maverick | 0.4143 | (0.0048) | 0.5414 | (0.0044) | 0.3844 | (0.0036) | 0.4563 | (0.0045) | 0.31 | (0.0046) |
| McCulloch | 0.4909 | (0.0749) | 0.6746 | (0.0803) | 0.4822 | (0.0666) | 0.5156 | (0.0831) | 0.3078 | (0.0920) |
| McLennan | 0.4538 | (0.0894) | 0.6023 | (0.0872) | 0.4066 | (0.0826) | 0.4587 | (0.1067) | 0.2234 | (0.0969) |
| McMullen | 0.5212 | (0.0544) | 0.7683 | (0.0539) | 0.662 | (0.0593) | 0.7939 | (0.0498) | 0.5297 | (0.0556) |
| Medina | 0.4411 | (0.0483) | 0.6502 | (0.0563) | 0.4835 | (0.0460) | 0.5149 | (0.0545) | 0.2993 | (0.0565) |
| Menard | 0.5431 | (0.0629) | 0.818 | (0.0689) | 0.5493 | (0.0674) | 0.6928 | (0.0680) | 0.5361 | (0.0690) |
| Midland | 0.5705 | (0.0953) | 0.7577 | (0.0676) | 0.5022 | (0.0673) | 0.5222 | (0.0769) | 0.2925 | (0.0837) |
| Milam | 0.4887 | (0.0897) | 0.5417 | (0.0929) | 0.4344 | (0.0884) | 0.5165 | (0.0872) | 0.3102 | (0.0905) |
| Mills | 0.5449 | (0.0939) | 0.6982 | (0.0878) | 0.5308 | (0.0888) | 0.6652 | (0.0904) | 0.4867 | (0.1205) |
| Mitchell | 0.4567 | (0.0742) | 0.5994 | (0.0625) | 0.3547 | (0.0599) | 0.4277 | (0.0693) | 0.267 | (0.0939) |
| Montague | 0.4337 | (0.1006) | 0.6472 | (0.0966) | 0.382 | (0.0803) | 0.4992 | (0.0942) | 0.2994 | (0.0934) |
| Montgomery | 0.4488 | (0.1084) | 0.6872 | (0.0893) | 0.4069 | (0.0878) | 0.4989 | (0.1035) | 0.2248 | (0.1059) |
| Moore | 0.5278 | (0.0704) | 0.6703 | (0.0571) | 0.4652 | (0.0537) | 0.504 | (0.0638) | 0.282 | (0.0635) |
| Morris | 0.4073 | (0.0977) | 0.5972 | (0.0981) | 0.357 | (0.0920) | 0.5371 | (0.0990) | 0.3187 | (0.1128) |
| Motley | 0.4784 | (0.0884) | 0.6151 | (0.0792) | 0.4081 | (0.0778) | 0.5381 | (0.0857) | 0.4184 | (0.1132) |
| Nacogdoches | 0.4181 | (0.0919) | 0.5974 | (0.0807) | 0.3925 | (0.0880) | 0.4828 | (0.0973) | 0.2383 | (0.1046) |
| Navarro | 0.4313 | (0.1082) | 0.6253 | (0.0890) | 0.43 | (0.0904) | 0.4992 | (0.0994) | 0.3112 | (0.1127) |
| Newton | 0.3369 | (0.1022) | 0.5346 | (0.0971) | 0.3205 | (0.1103) | 0.4061 | (0.1188) | 0.2439 | (0.1009) |
| Nolan | 0.4547 | (0.0828) | 0.6688 | (0.0745) | 0.4059 | (0.0771) | 0.4746 | (0.0697) | 0.2679 | (0.0863) |
| Nueces | 0.4005 | (0.0431) | 0.658 | (0.0382) | 0.3889 | (0.0419) | 0.4679 | (0.0434) | 0.2555 | (0.0457) |
| Ochiltree | 0.5148 | (0.0783) | 0.7213 | (0.0727) | 0.5462 | (0.0732) | 0.5872 | (0.0871) | 0.2928 | (0.1022) |


| County | 1990 |  | 1992 |  | 1994 |  | 1996 |  | 1998 |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Oldham | 0.5525 | (0.0841) | 0.7088 | (0.0932) | 0.4671 | (0.0770) | 0.6963 | (0.0994) | 0.3789 | (0.1019) |
| Orange | 0.408 | (0.0904) | 0.6592 | (0.0890) | 0.3744 | (0.0760) | 0.4834 | (0.1062) | 0.2541 | (0.1100) |
| Palo Pinto | 0.4501 | (0.0948) | 0.6284 | (0.0952) | 0.4074 | (0.0855) | 0.4812 | (0.0878) | 0.2265 | (0.0878) |
| Panola | 0.4093 | (0.1007) | 0.6207 | (0.0933) | 0.4294 | (0.0832) | 0.5561 | (0.1041) | 0.3247 | (0.1190) |
| Parker | 0.4846 | (0.1028) | 0.7146 | (0.0949) | 0.4492 | (0.0840) | 0.5111 | (0.0973) | 0.2898 | (0.1264) |
| Parmer | 0.4731 | (0.0680) | 0.7565 | (0.0456) | 0.5962 | (0.0525) | 0.6183 | (0.0445) | 0.379 | (0.0608) |
| Pecos | 0.6054 | (0.0425) | 0.5524 | (0.0373) | 0.4589 | (0.0341) | 0.4307 | (0.0408) | 0.3365 | (0.0458) |
| Polk | 0.3999 | (0.0869) | 0.5823 | (0.0848) | 0.3616 | (0.0820) | 0.4534 | (0.1024) | 0.283 | (0.1141) |
| Potter | 0.5175 | (0.0816) | 0.711 | (0.0731) | 0.4361 | (0.0706) | 0.4525 | (0.0836) | 0.2167 | (0.0825) |
| Presidio | 0.5463 | (0.0169) | 0.5999 | (0.0108) | 0.3379 | (0.0125) | 0.4761 | (0.0125) | 0.4191 | (0.0151) |
| Rains | 0.4473 | (0.0946) | 0.6697 | (0.1001) | 0.5232 | 0.4768 | 0.5188 | (0.1075) | 0.2867 | (0.1001) |
| Randall | 0.5405 | (0.0936) | 0.7406 | (0.0943) | 0.473 | (0.0781) | 0.5366 | (0.0941) | 0.2825 | (0.1082) |
| Reagan | 0.5223 | (0.0574) | 0.6203 | (0.0446) | 0.4902 | (0.0487) | 0.558 | (0.0536) | 0.2305 | (0.0577) |
| Real | 0.6535 | (0.0842) | 1 | (0.0000) | 0.7154 | (0.0686) | 0.8831 | (0.0657) | 0.767 | (0.0929) |
| Red River | 0.4034 | (0.1012) | 0.5641 | (0.0986) | 0.3624 | (0.0909) | 0.4567 | (0.1070) | 0.2828 | (0.1188) |
| Reeves | 0.4114 | (0.0219) | 0.5852 | (0.0186) | 0.4407 | (0.0168) | 0.4363 | (0.0176) | 0.3182 | (0.0237) |
| Refugio | 0.5035 | (0.0557) | 0.828 | (0.0474) | 0.3668 | (0.0510) | 0.3745 | (0.0528) | 0.4674 | (0.0699) |
| Roberts | 0.6445 | (0.1058) | 0.8366 | (0.0996) | 0.7077 | (0.1168) | 0.7925 | (0.1169) | 0.5358 | (0.1184) |
| Robertson | 0.4292 | (0.0865) | 0.5083 | (0.1059) | 0.3981 | (0.0840) | 0.4488 | (0.0881) | 0.2758 | (0.0990) |
| Rockwall | 0.4781 | (0.0906) | 0.7447 | (0.0893) | 0.5056 | (0.0795) | 0.5138 | (0.0985) | 0.3368 | (0.1035) |
| Runnels | 0.4549 | (0.0799) | 0.6081 | (0.0778) | 0.4607 | (0.0696) | 0.4887 | (0.0754) | 0.3262 | (0.0847) |
| Rusk | 0.4002 | (0.0980) | 0.5728 | (0.1005) | 0.3642 | (0.0991) | 0.4969 | (0.1065) | 0.227 | (0.1198) |
| Sabine | 0.4475 | (0.0949) | 0.6467 | (0.1008) | 0.3531 | (0.0826) | 0.4251 | (0.1129) | 0.3317 | (0.1132) |
| San Augustine | 0.516 | (0.0926) | 0.6764 | (0.0973) | 0.3669 | (0.0873) | 0.6154 | (0.1143) | 0.2851 | (0.1119) |
| San Jacinto | 0.3721 | (0.1022) | 0.5984 | (0.0871) | 0.423 | (0.0699) | 0.462 | (0.1150) | 0.2761 | (0.1324) |
| San Patricio | 0.3409 | (0.0433) | 0.5526 | (0.0409) | 0.3783 | (0.0397) | 0.4084 | (0.0501) | 0.1844 | (0.0547) |


| County | 1990 |  | 1992 |  | 1994 |  | 1996 |  | 1998 |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| San Saba | 0.4333 | (0.0775) | 0.5699 | (0.0809) | 0.4303 | (0.0734) | 0.5395 | (0.0780) | 0.3151 | (0.0989) |
| Schleicher | 0.4731 | (0.0663) | 0.6697 | (0.0594) | 0.575 | (0.0545) | 0.6084 | (0.0574) | 0.4397 | (0.0601) |
| Scurry | 0.4991 | (0.0721) | 0.6202 | (0.0763) | 0.4696 | (0.0805) | 0.481 | (0.0771) | 0.2716 | (0.0914) |
| Shackelford | 0.4323 | (0.0977) | 0.6696 | (0.0793) | 0.4443 | (0.0755) | 0.5897 | (0.0688) | 0.3841 | (0.0996) |
| Shelby | 0.3708 | (0.0974) | 0.5511 | (0.0933) | 0.3888 | (0.0898) | 0.4546 | (0.0869) | 0.275 | (0.1250) |
| Sherman | 0.5269 | (0.0818) | 0.7449 | (0.0693) | 0.6046 | (0.0721) | 0.629 | (0.0808) | 0.4474 | (0.0905) |
| Smith | 0.4575 | (0.0937) | 0.6544 | (0.0971) | 0.4583 | (0.0905) | 0.5172 | (0.0872) | 0.2819 | (0.0981) |
| Somervell | 0.4747 | (0.0895) | 0.8476 | (0.0818) | 0.6757 | (0.0880) | 0.668 | (0.0898) | 0.5791 | (0.0988) |
| Starr | 0.3432 | (0.0022) | 0.7207 | (0.0014) | 0.3067 | (0.0016) | 0.4534 | (0.0018) | 0.4151 | (0.0017) |
| Stephens | 0.4523 | (0.0978) | 0.6252 | (0.0783) | 0.4957 | (0.0834) | 0.5022 | (0.0965) | 0.2641 | (0.1035) |
| Sterling | 0.5372 | (0.0789) | 0.7022 | (0.0588) | 0.7381 | (0.0768) | 0.7756 | (0.0738) | 0.731 | (0.1005) |
| Stonewall | 0.5311 | (0.1124) | 0.8329 | (0.0802) | 0.5204 | (0.0808) | 0.6308 | (0.1044) | 0.4314 | (0.1045) |
| Sutton | 0.4089 | (0.0592) | 0.6322 | (0.0464) | 0.3528 | (0.0488) | 0.4771 | (0.0466) | 0.2538 | (0.0597) |
| Swisher | 0.4586 | (0.0709) | 0.4146 | (0.0708) | 0.4456 | (0.0574) | 0.4731 | (0.0639) | 0.321 | (0.0719) |
| Tarrant | 0.4592 | (0.1018) | 0.7097 | (0.0734) | 0.4455 | (0.0801) | 0.4624 | (0.0880) | 0.2216 | (0.0847) |
| Taylor | 0.4551 | (0.0987) | 0.7077 | (0.0842) | 0.4468 | (0.0756) | 0.4829 | (0.0869) | 0.2673 | (0.0896) |
| Terrell | 0.5581 | (0.0491) | 0.6649 | (0.0330) | 0.3776 | (0.0443) | 0.5786 | (0.0452) | 0.3067 | (0.0440) |
| Terry | 0.4233 | (0.0571) | 0.5619 | (0.0519) | 0.3803 | (0.0467) | 0.411 | (0.0471) | 0.2486 | (0.0622) |
| Throckmorton | 0.4508 | (0.0888) | 0.6784 | (0.0726) | 0.4842 | (0.0778) | 0.5045 | (0.1011) | 0.4086 | (0.1226) |
| Titus | 0.3913 | (0.0972) | 0.6241 | (0.0878) | 0.4139 | (0.0839) | 0.4952 | (0.0891) | 0.3423 | (0.1124) |
| Tom Green | 0.46 | (0.0827) | 0.6969 | (0.0616) | 0.4367 | (0.0719) | 0.4962 | (0.0793) | 0.2785 | (0.0738) |
| Travis | 0.5584 | (0.0908) | 0.7248 | (0.0799) | 0.4809 | (0.0717) | 0.4508 | (0.0842) | 0.298 | (0.0917) |
| Trinity | 0.4407 | (0.1019) | 0.7538 | (0.0877) | 0.5353 | (0.0841) | 0.6125 | (0.1023) | 0.4226 | (0.1175) |
| Tyler | 0.3765 | (0.0947) | 0.5821 | (0.0914) | 0.3676 | (0.0951) | 0.4575 | (0.1099) | 0.2734 | (0.1088) |
| Upshur | 0.4224 | (0.0870) | 0.6091 | (0.1055) | 0.4248 | (0.0804) | 0.4753 | (0.0913) | 0.2814 | (0.1012) |
| Upton | 0.5261 | (0.0569) | 0.6652 | (0.0542) | 0.4713 | (0.0579) | 0.4912 | (0.0588) | 0.2253 | (0.0736) |


| County | 1990 |  | 1992 |  | 1994 |  | 1996 |  | 1998 |  |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Uvalde | 0.4089 | $(0.0376)$ | 0.5785 | $(0.0293)$ | 0.436 | $(0.0308)$ | 0.4303 | $(0.0291)$ | 0.367 | $(0.0341)$ |
| Val Verde | 0.4575 | $(0.0272)$ | 0.6853 | $(0.0184)$ | 0.3956 | $(0.0221)$ | 0.5091 | $(0.0230)$ | 0.2941 | $(0.0225)$ |
| Van Zandt | 0.4358 | $(0.0972)$ | 0.6203 | $(0.1039)$ | 0.4274 | $(0.0851)$ | 0.4841 | $(0.1112)$ | 0.2852 | $(0.1169)$ |
| Victoria | 0.4586 | $(0.0684)$ | 0.631 | $(0.0605)$ | 0.3628 | $(0.0571)$ | 0.4327 | $(0.0614)$ | 0.2879 | $(0.0742)$ |
| Walker | 0.456 | $(0.0923)$ | 0.6479 | $(0.0908)$ | 0.4389 | $(0.0745)$ | 0.4822 | $(0.1031)$ | 0.2538 | $(0.1077)$ |
| Waller | 0.4178 | $(0.0853)$ | 0.4982 | $(0.1090)$ | 0.3441 | $(0.0880)$ | 0.4231 | $(0.0895)$ | 0.2874 | $(0.0943)$ |
| Ward | 0.5586 | $(0.0653)$ | 0.6645 | $(0.0586)$ | 0.4603 | $(0.0533)$ | 0.5182 | $(0.0588)$ | 0.3564 | $(0.0702)$ |
| Washington | 0.5276 | $(0.0899)$ | 0.6209 | $(0.0877)$ | 0.4793 | $(0.0839)$ | 0.5304 | $(0.0807)$ | 0.3448 | $(0.1034)$ |
| Webb | 0.3004 | $(0.0052)$ | 0.4656 | $(0.0033)$ | 0.2957 | $(0.0034)$ | 0.3539 | $(0.0033)$ | 0.1944 | $(0.0041)$ |
| Wharton | 0.4163 | $(0.0817)$ | 0.5918 | $(0.0634)$ | 0.4364 | $(0.0670)$ | 0.5364 | $(0.0675)$ | 0.3415 | $(0.0874)$ |
| Wheeler | 0.4746 | $(0.0992)$ | 0.6452 | $(0.0999)$ | 0.4899 | $(0.0815)$ | 0.5243 | $(0.0901)$ | 0.3881 | $(0.1144)$ |
| Wichita | 0.4376 | $(0.0800)$ | 0.6909 | $(0.0868)$ | 0.4121 | $(0.0816)$ | 0.4889 | $(0.0988)$ | 0.2652 | $(0.1033)$ |
| Wilbarger | 0.4014 | $(0.0827)$ | 0.617 | $(0.0999)$ | 0.3967 | $(0.0796)$ | 0.4282 | $(0.0884)$ | 0.2786 | $(0.0892)$ |
| Willacy | 0.436 | $(0.0130)$ | 0.5825 | $(0.0094)$ | 0.3613 | $(0.0096)$ | 0.5206 | $(0.0085)$ | 0.1963 | $(0.0120)$ |
| Williamson | 0.5413 | $(0.0879)$ | 0.7635 | $(0.0856)$ | 0.477 | $(0.0688)$ | 0.5042 | $(0.0977)$ | 0.3066 | $(0.0931)$ |
| Wilson | 0.4644 | $(0.0655)$ | 0.6417 | $(0.0591)$ | 0.4738 | $(0.0552)$ | 0.4636 | $(0.0738)$ | 0.3781 | $(0.0613)$ |
| Winkler | 0.4697 | $(0.0717)$ | 0.6203 | $(0.0624)$ | 0.4595 | $(0.0535)$ | 0.414 | $(0.0568)$ | 0.2433 | $(0.0701)$ |
| Wise | 0.4484 | $(0.0899)$ | 0.6591 | $(0.0844)$ | 0.4106 | $(0.0814)$ | 0.464 | $(0.0883)$ | 0.2602 | $(0.1153)$ |
| Wood | 0.4732 | $(0.0968)$ | 0.6692 | $(0.0940)$ | 0.5036 | $(0.0867)$ | 0.5697 | $(0.0830)$ | 0.3982 | $(0.1369)$ |
| Yoakum | 0.4993 | $(0.0580)$ | 0.685 | $(0.0622)$ | 0.4895 | $(0.0556)$ | 0.5415 | $(0.0511)$ | 0.3657 | $(0.0635)$ |
| Young | 0.4958 | $(0.0986)$ | 0.6656 | $(0.0883)$ | 0.4864 | $(0.0766)$ | 0.4896 | $(0.1123)$ | 0.3219 | $(0.1071)$ |
| Zapata | 0.3822 | $(0.0165)$ | 0.7716 | $(0.0123)$ | 0.4973 | $(0.0107)$ | 0.496 | $(0.0119)$ | 0.2871 | $(0.0117)$ |
| Zavala | 0.4465 | $(0.0077)$ | 0.7182 | $(0.0057)$ | 0.4483 | $(0.0067)$ | 0.5303 | $(0.0073)$ | 0.5167 | $(0.0085)$ |

Note: The stardard error for each estimate is shown in parentheses.

|  | Whites |  |  |  |  |  |  |  |  |  |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| County | 1990 |  | 1992 |  | 1994 |  | 1996 |  | 1998 |  |
| Anderson | 0.5578 | $(0.0403)$ | 0.755 | $(0.0286)$ | 0.6305 | $(0.0385)$ | 0.6305 | $(0.0385)$ | 0.4805 | $(0.0346)$ |
| Andrews | 0.5783 | $(0.0508)$ | 0.7818 | $(0.0369)$ | 0.6285 | $(0.0391)$ | 0.6285 | $(0.0391)$ | 0.4758 | $(0.0415)$ |
| Angelina | 0.5176 | $(0.0322)$ | 0.7828 | $(0.0289)$ | 0.7838 | $(0.0347)$ | 0.7838 | $(0.0347)$ | 0.4429 | $(0.0290)$ |
| Aransas | 0.6217 | $(0.0292)$ | 0.814 | $(0.0281)$ | 0.7054 | $(0.0238)$ | 0.7054 | $(0.0238)$ | 0.5213 | $(0.0301)$ |
| Archer | 0.6233 | $(0.0030)$ | 0.7855 | $(0.0038)$ | 0.5873 | $(0.0029)$ | 0.5873 | $(0.0029)$ | 0.4529 | $(0.0034)$ |
| Armstrong | 0.5645 | $(0.0045)$ | 0.8091 | $(0.0042)$ | 0.7071 | $(0.0042)$ | 0.7071 | $(0.0042)$ | 0.6445 | $(0.0048)$ |
| Atacosa | 0.5402 | $(0.0619)$ | 0.7555 | $(0.0497)$ | 0.5829 | $(0.0555)$ | 0.5829 | $(0.0555)$ | 0.5751 | $(0.0581)$ |
| Austin | 0.6183 | $(0.0281)$ | 0.7886 | $(0.0237)$ | 0.6509 | $(0.0264)$ | 0.6509 | $(0.0264)$ | 0.5346 | $(0.0250)$ |
| Bailey | 0.5616 | $(0.0584)$ | 0.779 | $(0.0367)$ | 0.6101 | $(0.0434)$ | 0.6101 | $(0.0434)$ | 0.5941 | $(0.0428)$ |
| Bandera | 0.6053 | $(0.0155)$ | 0.8111 | $(0.0150)$ | 0.6223 | $(0.0127)$ | 0.6223 | $(0.0127)$ | 0.4655 | $(0.0117)$ |
| Bastrop | 0.5745 | $(0.0351)$ | 0.7712 | $(0.0316)$ | 0.6203 | $(0.0304)$ | 0.6203 | $(0.0304)$ | 0.4977 | $(0.0321)$ |
| Baylor | 0.4941 | $(0.0141)$ | 0.7362 | $(0.0151)$ | 0.6414 | $(0.0145)$ | 0.6414 | $(0.0145)$ | 0.4546 | $(0.0170)$ |
| Bee | 0.5747 | $(0.0592)$ | 0.7472 | $(0.0426)$ | 0.6195 | $(0.0540)$ | 0.6195 | $(0.0540)$ | 0.5739 | $(0.0542)$ |
| Bell | 0.5643 | $(0.0432)$ | 0.8062 | $(0.0355)$ | 0.5557 | $(0.0384)$ | 0.5557 | $(0.0384)$ | 0.3804 | $(0.0283)$ |
| Bexar | 0.5607 | $(0.0621)$ | 0.8057 | $(0.0390)$ | 0.588 | $(0.0509)$ | 0.588 | $(0.0509)$ | 0.4746 | $(0.0509)$ |
| Blanco | 0.6929 | $(0.0189)$ | 0.842 | $(0.0164)$ | 0.6609 | $(0.0163)$ | 0.6609 | $(0.0163)$ | 0.5393 | $(0.0177)$ |
| Borden | 0.8305 | $(0.0237)$ | 0.7977 | $(0.0169)$ | 0.6502 | $(0.0168)$ | 0.6502 | $(0.0168)$ | 0.6186 | $(0.0241)$ |
| Bosque | 0.6319 | $(0.0150)$ | 0.7793 | $(0.0118)$ | 0.609 | $(0.0128)$ | 0.609 | $(0.0128)$ | 0.501 | $(0.0160)$ |
| Bowie | 0.4837 | $(0.0326)$ | 0.7618 | $(0.0281)$ | 0.5524 | $(0.0289)$ | 0.5524 | $(0.0289)$ | 0.4228 | $(0.0230)$ |
| Brazoria | 0.5737 | $(0.0385)$ | 0.8008 | $(0.0305)$ | 0.6034 | $(0.0323)$ | 0.6034 | $(0.0323)$ | 0.4455 | $(0.0311)$ |
| Brazos | 0.6256 | $(0.0336)$ | 0.8556 | $(0.0311)$ | 0.6259 | $(0.0294)$ | 0.6259 | $(0.0294)$ | 0.4544 | $(0.0298)$ |
| Brewster | 0.4965 | $(0.0546)$ | 0.7515 | $(0.0427)$ | 0.546 | $(0.0444)$ | 0.546 | $(0.0444)$ | 0.5207 | $(0.0431)$ |
| Briscoe | 0.7286 | $(0.0278)$ | 0.8218 | $(0.0266)$ | 0.648 | $(0.0270)$ | 0.648 | $(0.0270)$ | 0.5467 | $(0.0297)$ |


| County | 1990 |  | 1992 |  | 1994 |  | 1996 |  | 1998 |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Brooks | 0.5978 | (0.0896) | 0.8491 | (0.0579) | 0.6484 | (0.0643) | 0.6484 | (0.0643) | 0.5289 | (0.0636) |
| Brown | 0.5667 | (0.0199) | 0.751 | (0.0168) | 0.5749 | (0.0179) | 0.5749 | (0.0179) | 0.4605 | (0.0188) |
| Burleson | 0.62 | (0.0399) | 0.7757 | (0.0314) | 0.619 | (0.0313) | 0.619 | (0.0313) | 0.5293 | (0.0318) |
| Burnet | 0.644 | (0.0145) | 0.8142 | (0.0169) | 0.6593 | (0.0129) | 0.6593 | (0.0129) | 0.5114 | (0.0153) |
| Caldwell | 0.5821 | (0.0613) | 0.7751 | (0.0506) | 0.5923 | (0.0510) | 0.5923 | (0.0510) | 0.6596 | (0.0565) |
| Calhoun | 0.6069 | (0.0467) | 0.7581 | (0.0400) | 0.5829 | (0.0454) | 0.5829 | (0.0454) | 0.4892 | (0.0447) |
| Callahan | 0.5893 | (0.0060) | 0.7693 | (0.0063) | 0.5423 | (0.0055) | 0.5423 | (0.0055) | 0.4175 | (0.0050) |
| Cameron | 0.5575 | (0.0803) | 0.7799 | (0.0517) | 0.5965 | (0.0686) | 0.5965 | (0.0686) | 0.493 | (0.0627) |
| Camp | 0.562 | (0.0349) | 0.7562 | (0.0293) | 0.6366 | (0.0340) | 0.6366 | (0.0340) | 0.5608 | (0.0324) |
| Carson | 0.6379 | (0.0087) | 0.7854 | (0.0068) | 0.6417 | (0.0071) | 0.6417 | (0.0071) | 0.6572 | (0.0096) |
| Cass | 0.472 | (0.0306) | 0.7288 | (0.0209) | 0.5412 | (0.0254) | 0.5412 | (0.0254) | 0.426 | (0.0209) |
| Castro | 0.558 | (0.0627) | 0.7732 | (0.0429) | 0.6787 | (0.0467) | 0.6787 | (0.0467) | 0.545 | (0.0490) |
| Chambers | 0.5148 | (0.0249) | 0.7667 | (0.0210) | 0.5379 | (0.0207) | 0.5379 | (0.0207) | 0.4751 | (0.0212) |
| Cherokee | 0.5092 | (0.0326) | 0.7275 | (0.0279) | 0.5681 | (0.0270) | 0.5681 | (0.0270) | 0.4629 | (0.0271) |
| Childress | 0.5632 | (0.0239) | 0.763 | (0.0263) | 0.5658 | (0.0257) | 0.5658 | (0.0257) | 0.453 | (0.0320) |
| Clay | 0.5272 | (0.0044) | 0.8067 | (0.0041) | 0.5617 | (0.0043) | 0.5617 | (0.0043) | 0.4302 | (0.0035) |
| Cochran | 0.5395 | (0.0573) | 0.7834 | (0.0469) | 0.5895 | (0.0516) | 0.5895 | (0.0516) | 0.5863 | (0.0574) |
| Coke | 0.582 | (0.0160) | 0.7817 | (0.0167) | 0.6829 | (0.0151) | 0.6829 | (0.0151) | 0.6084 | (0.0198) |
| Coleman | 0.5067 | (0.0195) | 0.7293 | (0.0198) | 0.5791 | (0.0183) | 0.5791 | (0.0183) | 0.466 | (0.0174) |
| Collin | 0.6129 | (0.0165) | 0.863 | (0.0174) | 0.592 | (0.0148) | 0.592 | (0.0148) | 0.3933 | (0.0128) |
| Collingsworth | 0.5353 | (0.0305) | 0.7888 | (0.0237) | 0.674 | (0.0282) | 0.674 | (0.0282) | 0.5142 | (0.0337) |
| Colorado | 0.5377 | (0.0400) | 0.7754 | (0.0316) | 0.6542 | (0.0369) | 0.6542 | (0.0369) | 0.5783 | (0.0342) |
| Comal | 0.5811 | (0.0263) | 0.6843 | (0.0289) | 0.6045 | (0.0267) | 0.6045 | (0.0267) | 0.4376 | (0.0204) |
| Comanche | 0.5305 | (0.0160) | 0.7674 | (0.0188) | 0.5866 | (0.0202) | 0.5866 | (0.0202) | 0.5241 | (0.0243) |
| Concho | 0.7403 | (0.0474) | 0.8969 | (0.0363) | 0.7307 | (0.0430) | 0.7307 | (0.0430) | 0.6683 | (0.0458) |
| Cooke | 0.5417 | (0.0116) | 0.7786 | (0.0113) | 0.6188 | (0.0100) | 0.6188 | (0.0100) | 0.4541 | (0.0113) |


| County | 1990 |  | 1992 |  | 1994 |  | 1996 |  | 1998 |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Coryell | 0.5285 | (0.0354) | 0.7869 | (0.0341) | 0.5248 | (0.0356) | 0.5248 | (0.0356) | 0.3494 | (0.0219) |
| Cottle | 0.5737 | (0.0320) | 0.729 | (0.0286) | 0.4531 | (0.0262) | 0.4531 | (0.0262) | 0.5489 | (0.0336) |
| Crane | 0.6975 | (0.0527) | 0.8003 | (0.0391) | 0.7212 | (0.0362) | 0.7212 | (0.0362) | 0.5203 | (0.0408) |
| Crockett | 0.4225 | (0.0610) | 0.8149 | (0.0383) | 0.6295 | (0.0544) | 0.6295 | (0.0544) | 0.6184 | (0.0535) |
| Crosby | 0.5455 | (0.0571) | 0.7535 | (0.0425) | 0.5731 | (0.0452) | 0.5731 | (0.0452) | 0.5152 | (0.0492) |
| Culberson | 0.5556 | (0.0689) | 0.7341 | (0.0545) | 0.5233 | (0.0756) | 0.5233 | (0.0756) | 0.4714 | (0.0633) |
| Dallam | 0.6047 | (0.0249) | 0.7788 | (0.0257) | 0.5496 | (0.0259) | 0.5496 | (0.0259) | 0.398 | (0.0180) |
| Dallas | 0.5911 | (0.0554) | 0.815 | (0.0378) | 0.6273 | (0.0448) | 0.6273 | (0.0448) | 0.4353 | (0.0418) |
| Dawson | 0.5343 | (0.0659) | 0.7664 | (0.0423) | 0.6148 | (0.0605) | 0.6148 | (0.0605) | 0.4946 | (0.0452) |
| Deaf Smith | 0.5614 | (0.0634) | 0.777 | (0.0484) | 0.5901 | (0.0562) | 0.5901 | (0.0562) | 0.501 | (0.0444) |
| Delta | 0.4967 | (0.0132) | 0.735 | (0.0138) | 0.5391 | (0.0108) | 0.5391 | (0.0108) | 0.4401 | (0.0126) |
| Denton | 0.5536 | (0.0186) | 0.8122 | (0.0170) | 0.572 | (0.0162) | 0.572 | (0.0162) | 0.32 | (0.0099) |
| DeWitt | 0.5138 | (0.0421) | 0.753 | (0.0379) | 0.5822 | (0.0428) | 0.5822 | (0.0428) | 0.4856 | (0.0390) |
| Dickens | 0.5526 | (0.0294) | 0.7679 | (0.0254) | 0.6772 | (0.0249) | 0.6772 | (0.0249) | 0.5085 | (0.0315) |
| Dimmit | 0.6769 | (0.0964) | 0.8546 | (0.0614) | 0.6274 | (0.0729) | 0.6274 | (0.0729) | 0.5153 | (0.0644) |
| Donley | 0.5876 | (0.0082) | 0.7839 | (0.0091) | 0.6406 | (0.0089) | 0.6406 | (0.0089) | 0.5958 | (0.0115) |
| Duval | 0.6319 | (0.0860) | 0.823 | (0.0558) | 0.6233 | (0.0771) | 0.6233 | (0.0771) | 0.5807 | (0.0778) |
| Eastland | 0.5527 | (0.0119) | 0.7504 | (0.0107) | 0.6297 | (0.0118) | 0.6297 | (0.0118) | 0.5002 | (0.0116) |
| Ector | 0.6028 | (0.0482) | 0.796 | (0.0361) | 0.6023 | (0.0399) | 0.6023 | (0.0399) | 0.4558 | (0.0425) |
| Edwards | 0.6741 | (0.0632) | 0.7822 | (0.0402) | 0.6771 | (0.0502) | 0.6771 | (0.0502) | 0.6285 | (0.0522) |
| El Paso | 0.5476 | (0.0824) | 0.7823 | (0.0523) | 0.5822 | (0.0663) | 0.5822 | (0.0663) | 0.4908 | (0.0566) |
| Ellis | 0.5638 | (0.0328) | 0.7993 | (0.0228) | 0.5864 | (0.0266) | 0.5864 | (0.0266) | 0.4088 | (0.0258) |
| Erath | 0.5998 | (0.0125) | 0.8218 | (0.0128) | 0.5866 | (0.0135) | 0.5866 | (0.0135) | 0.443 | (0.0143) |
| Falls | 0.5525 | (0.0472) | 0.7297 | (0.0384) | 0.5564 | (0.0446) | 0.5564 | (0.0446) | 0.4883 | (0.0484) |
| Fannin | 0.4983 | (0.0118) | 0.8361 | (0.0115) | 0.532 | (0.0101) | 0.532 | (0.0101) | 0.4176 | (0.0100) |
| Fayette | 0.6953 | (0.0209) | 0.8055 | (0.0210) | 0.6457 | (0.0192) | 0.6457 | (0.0192) | 0.5658 | (0.0222) |


| County | 1990 |  | 1992 |  | 1994 |  | 1996 |  | 1998 |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Fisher | 0.599 | (0.0351) | 0.7714 | (0.0290) | 0.6328 | (0.0278) | 0.6328 | (0.0278) | 0.5624 | (0.0354) |
| Floyd | 0.5706 | (0.0525) | 0.7674 | (0.0428) | 0.7072 | (0.0485) | 0.7072 | (0.0485) | 0.4447 | (0.0451) |
| Foard | 0.5487 | (0.0222) | 0.7201 | (0.0236) | 0.5342 | (0.0222) | 0.5342 | (0.0222) | 0.428 | (0.0197) |
| Fort Bend | 0.629 | (0.0538) | 0.8798 | (0.0381) | 0.666 | (0.0413) | 0.666 | (0.0413) | 0.4929 | (0.0390) |
| Franklin | 0.5322 | (0.0121) | 0.7732 | (0.0115) | 0.6379 | (0.0121) | 0.6379 | (0.0121) | 0.5201 | (0.0115) |
| Freestone | 0.5655 | (0.0284) | 0.7637 | (0.0275) | 0.6226 | (0.0292) | 0.6226 | (0.0292) | 0.5366 | (0.0266) |
| Frio | 0.5397 | (0.0766) | 0.7432 | (0.0477) | 0.5742 | (0.0571) | 0.5742 | (0.0571) | 0.4764 | (0.0594) |
| Gaines | 0.5754 | (0.0530) | 0.7825 | (0.0351) | 0.5937 | (0.0387) | 0.5937 | (0.0387) | 0.5046 | (0.0391) |
| Galveston | 0.5421 | (0.0397) | 0.623 | (0.0391) | 0.5826 | (0.0375) | 0.5826 | (0.0375) | 0.4866 | (0.0345) |
| Garza | 0.5384 | (0.0484) | 0.7597 | (0.0333) | 0.6136 | (0.0409) | 0.6136 | (0.0409) | 0.4838 | (0.0398) |
| Gillespie | 0.6189 | (0.0211) | 0.8212 | (0.0178) | 0.6758 | (0.0185) | 0.6758 | (0.0185) | 0.5448 | (0.0221) |
| Glasscock | 0.8281 | (0.0427) | 0.8407 | (0.0284) | 0.7533 | (0.0351) | 0.7533 | (0.0351) | 0.7144 | (0.0350) |
| Goliad | 0.6272 | (0.0527) | 0.8148 | (0.0510) | 0.6309 | (0.0472) | 0.6309 | (0.0472) | 0.6096 | (0.0526) |
| Gonzales | 0.5053 | (0.0581) | 0.7143 | (0.0468) | 0.594 | (0.0473) | 0.594 | (0.0473) | 0.5316 | (0.0520) |
| Gray | 0.6408 | (0.0163) | 0.8149 | (0.0164) | 0.6572 | (0.0137) | 0.6572 | (0.0137) | 0.4576 | (0.0172) |
| Grayson | 0.5108 | (0.0134) | 0.776 | (0.0136) | 0.5476 | (0.0137) | 0.5476 | (0.0137) | 0.3894 | (0.0108) |
| Gregg | 0.56 | (0.0342) | 0.7746 | (0.0251) | 0.5678 | (0.0276) | 0.5678 | (0.0276) | 0.3996 | (0.0207) |
| Grimes | 0.5316 | (0.0490) | 0.787 | (0.0366) | 0.5931 | (0.0342) | 0.5931 | (0.0342) | 0.4931 | (0.0422) |
| Guadalupe | 0.5647 | (0.0422) | 0.7871 | (0.0351) | 0.5941 | (0.0384) | 0.5941 | (0.0384) | 0.4443 | (0.0318) |
| Hale | 0.5536 | (0.0617) | 0.78 | (0.0517) | 0.6137 | (0.0541) | 0.6137 | (0.0541) | 0.5117 | (0.0509) |
| Hall | 0.5135 | (0.0394) | 0.6944 | (0.0344) | 0.4394 | (0.0258) | 0.4394 | (0.0258) | 0.4662 | (0.0267) |
| Hamilton | 0.6876 | (0.0071) | 0.7561 | (0.0061) | 0.6313 | (0.0064) | 0.6313 | (0.0064) | 0.5487 | (0.0076) |
| Hansford | 0.6612 | (0.0258) | 0.8298 | (0.0212) | 0.6741 | (0.0272) | 0.6741 | (0.0272) | 0.5725 | (0.0303) |
| Hardeman | 0.4932 | (0.0213) | 0.7369 | (0.0223) | 0.5515 | (0.0197) | 0.5515 | (0.0197) | 0.4768 | (0.0248) |
| Hardin | 0.3993 | (0.0143) | 0.6733 | (0.0147) | 0.4481 | (0.0129) | 0.4481 | (0.0129) | 0.4625 | (0.0135) |
| Harris | 0.5525 | (0.0637) | 0.7926 | (0.0490) | 0.5968 | (0.0485) | 0.5968 | (0.0485) | 0.4589 | (0.0465) |


| County | 1990 |  | 1992 |  | 1994 |  | 1996 |  | 1998 |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Harrison | 0.5115 | (0.0404) | 0.7763 | (0.0286) | 0.5738 | (0.0356) | 0.5738 | (0.0356) | 0.4576 | (0.0357) |
| Hartley | 0.6878 | (0.0080) | 0.7998 | (0.0085) | 0.6367 | (0.0070) | 0.6367 | (0.0070) | 0.5312 | (0.0253) |
| Haskell | 0.6022 | (0.0317) | 0.7501 | (0.0252) | 0.6048 | (0.0228) | 0.6048 | (0.0228) | 0.5637 | (0.0302) |
| Hays | 0.6038 | (0.0407) | 0.8049 | (0.0312) | 0.6333 | (0.0319) | 0.6333 | (0.0319) | 0.4611 | (0.0344) |
| Hemphill | 0.737 | (0.0139) | 0.8352 | (0.0133) | 0.7233 | (0.0147) | 0.7233 | (0.0147) | 0.4787 | (0.0146) |
| Henderson | 0.5822 | (0.0159) | 0.7643 | (0.0152) | 0.5975 | (0.0146) | 0.5975 | (0.0146) | 0.4035 | (0.0117) |
| Hidalgo | 0.5543 | (0.0666) | 0.7709 | (0.0456) | 0.5913 | (0.0661) | 0.5913 | (0.0661) | 0.5063 | (0.0699) |
| Hill | 0.6056 | (0.0254) | 0.7755 | (0.0172) | 0.5811 | (0.0232) | 0.5811 | (0.0232) | 0.4395 | (0.0205) |
| Hockley | 0.5031 | (0.0531) | 0.7744 | (0.0309) | 0.5539 | (0.0388) | 0.5539 | (0.0388) | 0.4816 | (0.0415) |
| Hood | 0.6308 | (0.0063) | 0.8361 | (0.0072) | 0.725 | (0.0068) | 0.725 | (0.0068) | 0.5676 | (0.0078) |
| Hopkins | 0.6076 | (0.0169) | 0.8053 | (0.0187) | 0.5798 | (0.0164) | 0.5798 | (0.0164) | 0.4678 | (0.0166) |
| Houston | 0.5665 | (0.0487) | 0.7553 | (0.0358) | 0.5841 | (0.0364) | 0.5841 | (0.0364) | 0.5091 | (0.0377) |
| Howard | 0.5823 | (0.0406) | 0.775 | (0.0348) | 0.6152 | (0.0344) | 0.6152 | (0.0344) | 0.504 | (0.0382) |
| Hudspeth | 0.5746 | (0.0704) | 0.7833 | (0.0488) | 0.6446 | (0.0739) | 0.6446 | (0.0739) | 0.5273 | (0.0657) |
| Hunt | 0.5456 | (0.0214) | 0.7958 | (0.0189) | 0.5801 | (0.0156) | 0.5801 | (0.0156) | 0.3952 | (0.0154) |
| Hutchinson | 0.6086 | (0.0167) | 0.7989 | (0.0185) | 0.6017 | (0.0177) | 0.6017 | (0.0177) | 0.3802 | (0.0126) |
| Irion | 0.6298 | (0.0295) | 0.8325 | (0.0267) | 0.5596 | (0.0272) | 0.5596 | (0.0272) | 0.5684 | (0.0277) |
| Jack | 0.5108 | (0.0051) | 0.772 | (0.0051) | 0.5777 | (0.0047) | 0.5777 | (0.0047) | 0.4004 | (0.0046) |
| Jackson | 0.5986 | (0.0374) | 0.7807 | (0.0328) | 0.5856 | (0.0320) | 0.5856 | (0.0320) | 0.4716 | (0.0319) |
| Jasper | 0.4329 | (0.0294) | 0.6608 | (0.0233) | 0.5146 | (0.0260) | 0.5146 | (0.0260) | 0.4428 | (0.0193) |
| Jeff Davis | 0.6425 | (0.0599) | 0.8055 | (0.0360) | 0.6358 | (0.0444) | 0.6358 | (0.0444) | 0.5689 | (0.0430) |
| Jefferson | 0.5566 | (0.0504) | 0.7869 | (0.0423) | 0.5615 | (0.0424) | 0.5615 | (0.0424) | 0.4982 | (0.0441) |
| Jim Hogg | 0.6414 | (0.0822) | 0.8267 | (0.0518) | 0.6661 | (0.0645) | 0.6661 | (0.0645) | 0.5943 | (0.0653) |
| Jim Wells | 0.5522 | (0.0810) | 0.7736 | (0.0452) | 0.5828 | (0.0730) | 0.5828 | (0.0730) | 0.4856 | (0.0565) |
| Johnson | 0.5357 | (0.0138) | 0.7743 | (0.0152) | 0.537 | (0.0133) | 0.537 | (0.0133) | 0.3841 | (0.0113) |
| Jones | 0.5346 | (0.0297) | 0.7883 | (0.0259) | 0.6138 | (0.0277) | 0.6138 | (0.0277) | 0.5227 | (0.0317) |


| County | 1990 |  | 1992 |  | 1994 |  | 1996 |  | 1998 |  |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Karnes | 0.5533 | $(0.0691)$ | 0.7823 | $(0.0436)$ | 0.6867 | $(0.0475)$ | 0.6867 | $(0.0475)$ | 0.5205 | $(0.0479)$ |
| Kaufman | 0.5429 | $(0.0295)$ | 0.7874 | $(0.0237)$ | 0.5536 | $(0.0243)$ | 0.5536 | $(0.0243)$ | 0.4136 | $(0.0200)$ |
| Kendall | 0.656 | $(0.0188)$ | 0.8303 | $(0.0187)$ | 0.6548 | $(0.0170)$ | 0.6548 | $(0.0170)$ | 0.5711 | $(0.0214)$ |
| Kenedy | 0.6272 | $(0.0784)$ | 0.7798 | $(0.0549)$ | 0.6041 | $(0.0646)$ | 0.6041 | $(0.0646)$ | 0.5971 | $(0.0698)$ |
| Kent | 0.9658 | $(0.0175)$ | 0.9249 | $(0.0130)$ | 0.7323 | $(0.0153)$ | 0.7323 | $(0.0153)$ | 0.6957 | $(0.0187)$ |
| Kerr | 0.5601 | $(0.0243)$ | 0.8058 | $(0.0217)$ | 0.647 | $(0.0259)$ | 0.647 | $(0.0259)$ | 0.5049 | $(0.0251)$ |
| Kimble | 0.7235 | $(0.0235)$ | 0.7673 | $(0.0246)$ | 0.7398 | $(0.0221)$ | 0.7398 | $(0.0221)$ | 0.4962 | $(0.0257)$ |
| King | 0.896 | $(0.0245)$ | 0.8913 | $(0.0173)$ | 0.7192 | $(0.0183)$ | 0.7192 | $(0.0183)$ | 0.7769 | $(0.0220)$ |
| Kinney | 0.6841 | $(0.0692)$ | 0.8446 | $(0.0411)$ | 0.5356 | $(0.0624)$ | 0.5356 | $(0.0624)$ | 0.5812 | $(0.0529)$ |
| Kleberg | 0.5831 | $(0.0776)$ | 0.8058 | $(0.0474)$ | 0.7237 | $(0.0576)$ | 0.7237 | $(0.0576)$ | 0.5155 | $(0.0601)$ |
| Knox | 0.5617 | $(0.0429)$ | 0.7575 | $(0.0368)$ | 0.5884 | $(0.0347)$ | 0.5884 | $(0.0347)$ | 0.5918 | $(0.0359)$ |
| La Salle | 0.6165 | $(0.0748)$ | 0.8421 | $(0.0491)$ | 0.652 | $(0.0734)$ | 0.652 | $(0.0734)$ | 0.5044 | $(0.0580)$ |
| Lamar | 0.4911 | $(0.0198)$ | 0.7323 | $(0.0185)$ | 0.5262 | $(0.0210)$ | 0.5262 | $(0.0210)$ | 0.408 | $(0.0182)$ |
| Lamb | 0.4495 | $(0.0512)$ | 0.759 | $(0.0374)$ | 0.5766 | $(0.0422)$ | 0.5766 | $(0.0422)$ | 0.5427 | $(0.0490)$ |
| Lampasas | 0.5766 | $(0.0186)$ | 0.7619 | $(0.0197)$ | 0.6226 | $(0.0191)$ | 0.6226 | $(0.0191)$ | 0.5118 | $(0.0215)$ |
| Lavaca | 0.5235 | $(0.0195)$ | 0.762 | $(0.0164)$ | 0.5698 | $(0.0176)$ | 0.5698 | $(0.0176)$ | 0.4959 | $(0.0220)$ |
| Lee | 0.6656 | $(0.0339)$ | 0.8043 | $(0.0260)$ | 0.6693 | $(0.0304)$ | 0.6693 | $(0.0304)$ | 0.5388 | $(0.0300)$ |
| Leon | 0.4968 | $(0.0212)$ | 0.7024 | $(0.0219)$ | 0.584 | $(0.0184)$ | 0.584 | $(0.0184)$ | 0.5011 | $(0.0181)$ |
| Liberty | 0.4784 | $(0.0288)$ | 0.7387 | $(0.0221)$ | 0.5037 | $(0.0273)$ | 0.5037 | $(0.0273)$ | 0.4053 | $(0.0251)$ |
| Limestone | 0.5426 | $(0.0371)$ | 0.736 | $(0.0302)$ | 0.6191 | $(0.0340)$ | 0.6191 | $(0.0340)$ | 0.457 | $(0.0272)$ |
| Lipscomb | 0.6272 | $(0.0166)$ | 0.8267 | $(0.0151)$ | 0.7617 | $(0.0154)$ | 0.7617 | $(0.0154)$ | 0.5617 | $(0.0206)$ |
| Live Oak | 0.4734 | $(0.0546)$ | 0.7382 | $(0.0409)$ | 0.5674 | $(0.0394)$ | 0.5674 | $(0.0394)$ | 0.5935 | $(0.0416)$ |
| Llano | 0.6831 | $(0.0049)$ | 0.8587 | $(0.0060)$ | 0.7567 | $(0.0056)$ | 0.7567 | $(0.0056)$ | 0.7098 | $(0.0070)$ |
| Loving | 0.9953 | $(0.0038)$ | 1 | $(0.0000)$ | 1 | $(0.0000)$ | 1 | $(0.0000)$ | 1 | $(0.0000)$ |
| Lubbock | 0.5732 | $(0.0420)$ | 0.8233 | $(0.0352)$ | 0.5956 | $(0.0345)$ | 0.5956 | $(0.0345)$ | 0.4574 | $(0.0351)$ |
| Lynn | 0.5314 | $(0.0627)$ | 0.7445 | $(0.0429)$ | 0.5944 | $(0.0543)$ | 0.5944 | $(0.0543)$ | 0.5161 | $(0.0514)$ |


| County | 1990 |  | 1992 |  | 1994 |  | 1996 |  | 1998 |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Madison | 0.6002 | (0.0410) | 0.7701 | (0.0346) | 0.6091 | (0.0368) | 0.6091 | (0.0368) | 0.5635 | (0.0375) |
| Marion | 0.5853 | (0.0474) | 0.7427 | (0.0345) | 0.543 | (0.0346) | 0.543 | (0.0346) | 0.4954 | (0.0341) |
| Martin | 0.5625 | (0.0450) | 0.8048 | (0.0437) | 0.5827 | (0.0438) | 0.5827 | (0.0438) | 0.5046 | (0.0405) |
| Mason | 0.6113 | (0.0241) | 0.8028 | (0.0241) | 0.7256 | (0.0201) | 0.7256 | (0.0201) | 0.6197 | (0.0281) |
| Matagorda | 0.588 | (0.0527) | 0.9249 | (0.0292) | 0.6168 | (0.0447) | 0.6168 | (0.0447) | 0.525 | (0.0495) |
| Maverick | 0.5939 | (0.0793) | 0.7753 | (0.0571) | 0.605 | (0.0736) | 0.605 | (0.0736) | 0.5467 | (0.0706) |
| McCulloch | 0.625 | (0.0357) | 0.7938 | (0.0294) | 0.6274 | (0.0342) | 0.6274 | (0.0342) | 0.4909 | (0.0405) |
| McLennan | 0.5892 | 0.4108 | 0.7608 | (0.0294) | 0.577 | (0.0279) | 0.577 | (0.0279) | 0.4319 | (0.0317) |
| McMullen | 0.6211 | (0.0564) | 0.8458 | (0.0433) | 0.7582 | (0.0459) | 0.7582 | (0.0459) | 0.6251 | (0.0445) |
| Medina | 0.5635 | (0.0612) | 0.796 | (0.0441) | 0.6439 | (0.0484) | 0.0484 | (0.0484) | 0.4974 | (0.0448) |
| Menard | 0.6735 | (0.0414) | 0.8733 | (0.0338) | 0.6896 | (0.0375) | 0.0375 | (0.0375) | 0.6256 | (0.0411) |
| Midland | 0.6821 | (0.0405) | 0.8556 | (0.0349) | 0.6531 | (0.0337) | 0.0337 | (0.0337) | 0.4764 | (0.0376) |
| Milam | 0.6259 | (0.0381) | 0.711 | (0.0322) | 0.6055 | (0.0333) | 0.6055 | (0.0333) | 0.4866 | (0.0332) |
| Mills | 0.6578 | (0.0134) | 0.8047 | (0.0138) | 0.6675 | (0.0132) | 0.6675 | (0.0132) | 0.617 | (0.0156) |
| Mitchell | 0.5839 | (0.0413) | 0.7651 | (0.0377) | 0.5453 | (0.0440) | 0.5453 | (0.0440) | 0.484 | (0.0468) |
| Montague | 0.5142 | (0.0042) | 0.7546 | (0.0046) | 0.5235 | (0.0042) | 0.5235 | (0.0042) | 0.4179 | (0.0039) |
| Montgomery | 0.5419 | (0.0139) | 0.8098 | (0.0154) | 0.5446 | (0.0145) | 0.5446 | (0.0145) | 0.3699 | (0.0092) |
| Moore | 0.635 | (0.0418) | 0.7998 | (0.0371) | 0.6275 | (0.0433) | 0.6275 | (0.0433) | 0.4823 | (0.0365) |
| Morris | 0.532 | (0.0326) | 0.7504 | (0.0290) | 0.5299 | (0.0341) | 0.5299 | (0.0341) | 0.4921 | (0.0324) |
| Motley | 0.5896 | (0.0172) | 0.7466 | (0.0166) | 0.5515 | (0.0157) | 0.5515 | (0.0157) | 0.5536 | (0.0199) |
| Nacogdoches | 0.5167 | (0.0271) | 0.7601 | (0.0269) | 0.5563 | (0.0265) | 0.5563 | (0.0265) | 0.4234 | (0.0227) |
| Navarro | 0.5675 | (0.0319) | 0.7692 | (0.0274) | 0.6098 | (0.0295) | 0.6098 | (0.0295) | 0.4789 | (0.0281) |
| Newton | 0.4056 | (0.0331) | 0.695 | (0.0253) | 0.4838 | (0.0276) | 0.4838 | (0.0276) | 0.3921 | (0.0227) |
| Nolan | 0.5801 | (0.0432) | 0.7895 | (0.0284) | 0.5572 | (0.0388) | 0.5572 | (0.0388) | 0.4701 | (0.0354) |
| Nueces | 0.5568 | (0.0679) | 0.803 | (0.0489) | 0.5914 | (0.0565) | 0.5914 | (0.0565) | 0.4904 | (0.0534) |
| Ochiltree | 0.626 | (0.0229) | 0.8188 | (0.0239) | 0.6933 | (0.0239) | 0.6933 | (0.0239) | 0.4612 | (0.0186) |


| County | 1990 |  | 1992 |  | 1994 |  | 1996 |  | 1998 |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Oldham | 0.6831 | (0.0134) | 0.8143 | (0.0149) | 0.6036 | (0.0137) | 0.6036 | (0.0137) | 0.509 | (0.0155) |
| Orange | 0.498 | (0.0149) | 0.7679 | (0.0135) | 0.5157 | (0.0145) | 0.5157 | (0.0145) | 0.4092 | (0.0113) |
| Palo Pinto | 0.5699 | (0.0156) | 0.7434 | (0.0158) | 0.5366 | (0.0141) | 0.5366 | (0.0141) | 0.3772 | (0.0147) |
| Panola | 0.5282 | (0.0280) | 0.7698 | (0.0251) | 0.6023 | (0.0239) | 0.6023 | (0.0239) | 0.4715 | (0.0285) |
| Parker | 0.5875 | (0.0076) | 0.8245 | (0.0074) | 0.5837 | (0.0065) | 0.5837 | (0.0065) | 0.4034 | (0.0061) |
| Parmer | 0.6099 | (0.0596) | 0.8369 | (0.0443) | 0.7055 | (0.0472) | 0.7055 | (0.0472) | 0.5502 | (0.0462) |
| Pecos | 0.6769 | (0.0856) | 0.7576 | (0.0498) | 0.6218 | (0.0601) | 0.6218 | (0.0601) | 0.5415 | (0.0563) |
| Polk | 0.4969 | (0.0247) | 0.7358 | (0.0196) | 0.5153 | (0.0165) | 0.5153 | (0.0165) | 0.438 | (0.0229) |
| Potter | 0.6511 | (0.0413) | 0.8173 | (0.0370) | 0.6056 | (0.0420) | 0.6056 | (0.0420) | 0.4236 | (0.0331) |
| Presidio | 0.6406 | (0.0777) | 0.7788 | (0.0522) | 0.5798 | (0.0678) | 0.5798 | (0.0678) | 0.5724 | (0.0694) |
| Rains | 0.5605 | (0.0081) | 0.7782 | (0.0076) | 0.6764 | (0.0073) | 0.6764 | (0.0073) | 0.4265 | (0.0078) |
| Randall | 0.656 | (0.0094) | 0.8318 | (0.0099) | 0.6313 | (0.0109) | 0.6313 | (0.0109) | 0.4097 | (0.0127) |
| Reagan | 0.6237 | (0.0607) | 0.7766 | (0.0411) | 0.6509 | (0.0446) | 0.6509 | (0.0446) | 0.4687 | (0.0484) |
| Real | 0.7794 | (0.0300) | 1 | (0.0000) | 0.8355 | (0.0304) | 0.8355 | (0.0304) | 0.8143 | (0.0356) |
| Red River | 0.4925 | (0.0281) | 0.7256 | (0.0291) | 0.5381 | (0.0241) | 0.5381 | (0.0241) | 0.4675 | (0.0259) |
| Reeves | 0.5817 | (0.0829) | 0.778 | (0.0475) | 0.6214 | (0.0707) | 0.6214 | (0.0707) | 0.5276 | (0.0735) |
| Refugio | 0.6179 | (0.0518) | 0.8606 | (0.0471) | 0.5657 | (0.0490) | 0.5657 | (0.0490) | 0.6034 | (0.0557) |
| Roberts | 0.8207 | (0.0050) | 0.9624 | (0.0056) | 0.8627 | (0.0050) | 0.8627 | (0.0050) | 0.641 | (0.0050) |
| Robertson | 0.5525 | (0.0516) | 0.7313 | (0.0393) | 0.5934 | (0.0411) | 0.5934 | (0.0411) | 0.5057 | (0.0411) |
| Rockwall | 0.5915 | (0.0111) | 0.8363 | (0.0099) | 0.645 | (0.0098) | 0.645 | (0.0098) | 0.4608 | (0.0110) |
| Runnels | 0.5572 | (0.0375) | 0.7551 | (0.0319) | 0.604 | (0.0315) | 0.604 | (0.0315) | 0.4965 | (0.0306) |
| Rusk | 0.4965 | (0.0333) | 0.7296 | (0.0259) | 0.5262 | (0.0258) | 0.5262 | (0.0258) | 0.4084 | (0.0272) |
| Sabine | 0.533 | (0.0166) | 0.755 | (0.0167) | 0.5063 | (0.0129) | 0.5063 | (0.0129) | 0.4559 | (0.0139) |
| San Augustine | 0.6766 | (0.0455) | 0.8185 | (0.0283) | 0.5628 | (0.0345) | 0.5628 | (0.0345) | 0.4938 | (0.0334) |
| San Jacinto | 0.4723 | (0.0232) | 0.7444 | (0.0234) | 0.5757 | (0.0166) | 0.5757 | (0.0166) | 0.4225 | (0.0174) |
| San Patricio | 0.5 | (0.0607) | 0.7627 | (0.0498) | 0.565 | (0.0544) | 0.565 | (0.0544) | 0.4557 | (0.0507) |


| County | 1990 |  | 1992 |  | 1994 |  | 1996 |  | 1998 |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| San Saba | 0.5452 | (0.0239) | 0.7284 | (0.0262) | 0.5885 | (0.0294) | 0.5885 | (0.0294) | 0.4724 | (0.0219) |
| Schleicher | 0.5881 | (0.0510) | 0.7978 | (0.0401) | 0.7002 | (0.0468) | 0.7002 | (0.0468) | 0.58 | (0.0341) |
| Scurry | 0.6251 | (0.0327) | 0.7616 | (0.0287) | 0.6156 | (0.0340) | 0.6156 | (0.0340) | 0.4731 | (0.0360) |
| Shackelford | 0.5506 | (0.0103) | 0.7823 | (0.0104) | 0.584 | (0.0108) | 0.584 | (0.0108) | 0.5251 | (0.0128) |
| Shelby | 0.4621 | (0.0300) | 0.7106 | (0.0305) | 0.5604 | (0.0281) | 0.5604 | (0.0281) | 0.4592 | (0.0299) |
| Sherman | 0.62 | (0.0224) | 0.8409 | (0.0221) | 0.7464 | (0.0248) | 0.7464 | (0.0248) | 0.582 | (0.0241) |
| Smith | 0.5941 | (0.0326) | 0.7929 | (0.0325) | 0.6348 | (0.0293) | 0.6348 | (0.0293) | 0.4742 | (0.0298) |
| Somervell | 0.5998 | (0.0177) | 0.9335 | (0.0180) | 0.8148 | (0.0191) | 0.8148 | (0.0191) | 0.6818 | (0.0225) |
| Starr | 0.5657 | (0.0833) | 0.8054 | (0.0532) | 0.586 | (0.0757) | 0.586 | (0.0757) | 0.5733 | (0.0832) |
| Stephens | 0.5476 | (0.0127) | 0.7376 | (0.0159) | 0.6434 | (0.0130) | 0.6434 | (0.0130) | 0.4195 | (0.0153) |
| Sterling | 0.651 | (0.0343) | 0.8073 | (0.0314) | 0.8444 | (0.0316) | 0.8444 | (0.0316) | 0.7661 | (0.0341) |
| Stonewall | 0.6693 | (0.0203) | 0.9235 | (0.0173) | 0.6795 | (0.0192) | 0.6795 | (0.0192) | 0.5688 | (0.0229) |
| Sutton | 0.5464 | (0.0483) | 0.7842 | (0.0427) | 0.5527 | (0.0418) | 0.5527 | (0.0418) | 0.4829 | (0.0436) |
| Swisher | 0.5942 | (0.0450) | 0.6755 | (0.0385) | 0.6221 | (0.0409) | 0.6221 | (0.0409) | 0.5114 | (0.0412) |
| Tarrant | 0.5807 | (0.0331) | 0.8361 | (0.0271) | 0.6167 | (0.0262) | 0.6167 | (0.0262) | 0.4097 | (0.0261) |
| Taylor | 0.5822 | (0.0270) | 0.8222 | (0.0262) | 0.5962 | (0.0251) | 0.5962 | (0.0251) | 0.45 | (0.0240) |
| Terrell | 0.6522 | (0.0745) | 0.8001 | (0.0431) | 0.5746 | (0.0592) | 0.5746 | (0.0592) | 0.5111 | (0.0495) |
| Terry | 0.5526 | (0.0552) | 0.7455 | (0.0410) | 0.5658 | (0.0530) | 0.5658 | (0.0530) | 0.4715 | (0.0444) |
| Throckmorton | 0.5568 | (0.0097) | 0.7803 | (0.0093) | 0.6284 | (0.0077) | 0.6284 | (0.0077) | 0.5297 | (0.0109) |
| Titus | 0.5118 | (0.0296) | 0.7728 | (0.0272) | 0.5775 | (0.0267) | 0.5775 | (0.0267) | 0.5029 | (0.0260) |
| Tom Green | 0.5776 | (0.0384) | 0.8123 | (0.0386) | 0.6035 | (0.0340) | 0.6035 | (0.0340) | 0.4814 | (0.0320) |
| Travis | 0.7024 | (0.0445) | 0.8271 | (0.0368) | 0.6521 | (0.0411) | 0.6521 | (0.0411) | 0.5063 | (0.0350) |
| Trinity | 0.5498 | (0.0203) | 0.8745 | (0.0184) | 0.7122 | (0.0183) | 0.7122 | (0.0183) | 0.6016 | (0.0198) |
| Tyler | 0.4687 | (0.0181) | 0.7272 | (0.0195) | 0.53 | (0.0190) | 0.53 | (0.0190) | 0.4397 | (0.0196) |
| Upshur | 0.5179 | (0.0183) | 0.7403 | (0.0153) | 0.5934 | (0.0165) | 0.5934 | (0.0165) | 0.4352 | (0.0133) |
| Upton | 0.6385 | (0.0486) | 0.7931 | (0.0404) | 0.6377 | (0.0407) | 0.6377 | (0.0407) | 0.4412 | (0.0393) |


| County | 1990 |  | 1992 |  | 1994 |  | 1996 |  | 1998 |  |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Uvalde | 0.5782 | $(0.0715)$ | 0.7681 | $(0.0466)$ | 0.6125 | $(0.0635)$ | 0.6125 | $(0.0635)$ | 0.5531 | $(0.0551)$ |
| Val Verde | 0.5865 | $(0.0758)$ | 0.8047 | $(0.0505)$ | 0.6017 | $(0.0659)$ | 0.6017 | $(0.0659)$ | 0.5188 | $(0.0613)$ |
| Van Zandt | 0.5154 | $(0.0105)$ | 0.7322 | $(0.0106)$ | 0.564 | $(0.0091)$ | 0.564 | $(0.0091)$ | 0.437 | $(0.0070)$ |
| Victoria | 0.5949 | $(0.0477)$ | 0.7835 | $(0.0362)$ | 0.5631 | $(0.0476)$ | 0.5631 | $(0.0476)$ | 0.5045 | $(0.0475)$ |
| Walker | 0.6196 | $(0.0373)$ | 0.7955 | $(0.0311)$ | 0.634 | $(0.0332)$ | 0.634 | $(0.0332)$ | 0.4679 | $(0.0379)$ |
| Waller | 0.5833 | $(0.0592)$ | 0.7472 | $(0.0437)$ | 0.5701 | $(0.0485)$ | 0.5701 | $(0.0485)$ | 0.5219 | $(0.0480)$ |
| Ward | 0.6513 | $(0.0547)$ | 0.7864 | $(0.0401)$ | 0.6232 | $(0.0458)$ | 0.6232 | $(0.0458)$ | 0.5313 | $(0.0470)$ |
| Washington | 0.6721 | $(0.0329)$ | 0.7878 | $(0.0282)$ | 0.6575 | $(0.0284)$ | 0.6575 | $(0.0284)$ | 0.5179 | $(0.0313)$ |
| Webb | 0.556 | $(0.0929)$ | 0.7473 | $(0.0525)$ | 0.5841 | $(0.0655)$ | 0.5841 | $(0.0655)$ | 0.4914 | $(0.0608)$ |
| Wharton | 0.5509 | $(0.0504)$ | 0.7702 | $(0.0378)$ | 0.612 | $(0.0501)$ | 0.612 | $(0.0501)$ | 0.5307 | $(0.0429)$ |
| Wheeler | 0.5703 | $(0.0132)$ | 0.7588 | $(0.0117)$ | 0.6198 | $(0.0107)$ | 0.6198 | $(0.0107)$ | 0.5246 | $(0.0134)$ |
| Wichita | 0.5692 | $(0.0241)$ | 0.8165 | $(0.0247)$ | 0.5636 | $(0.0229)$ | 0.5636 | $(0.0229)$ | 0.4243 | $(0.0243)$ |
| Wilbarger | 0.5088 | $(0.0367)$ | 0.76 | $(0.0256)$ | 0.5596 | $(0.0222)$ | 0.5596 | $(0.0222)$ | 0.4464 | $(0.0280)$ |
| Willacy | 0.5876 | $(0.0844)$ | 0.7878 | $(0.0545)$ | 0.5915 | $(0.0779)$ | 0.5915 | $(0.0779)$ | 0.4855 | $(0.0664)$ |
| Williamson | 0.6843 | $(0.0223)$ | 0.8788 | $(0.0271)$ | 0.6536 | $(0.0227)$ | 0.6536 | $(0.0227)$ | 0.4661 | $(0.0264)$ |
| Wilson | 0.5805 | $(0.0470)$ | 0.7783 | $(0.0330)$ | 0.6255 | $(0.0310)$ | 0.6255 | $(0.0310)$ | 0.5347 | $(0.0339)$ |
| Winkler | 0.5872 | $(0.0500)$ | 0.7814 | $(0.0369)$ | 0.6212 | $(0.0416)$ | 0.6212 | $(0.0416)$ | 0.4657 | $(0.0457)$ |
| Wise | 0.5753 | $(0.0120)$ | 0.7828 | $(0.0114)$ | 0.5426 | $(0.0105)$ | 0.5426 | $(0.0105)$ | 0.3951 | $(0.0110)$ |
| Wood | 0.5787 | $(0.0136)$ | 0.7789 | $(0.0133)$ | 0.6517 | $(0.0126)$ | 0.6517 | $(0.0126)$ | 0.5246 | $(0.0172)$ |
| Yoakum | 0.6042 | $(0.0464)$ | 0.8063 | $(0.0396)$ | 0.648 | $(0.0439)$ | 0.648 | $(0.0439)$ | 0.5508 | $(0.0505)$ |
| Young | 0.6047 | $(0.0096)$ | 0.7634 | $(0.0114)$ | 0.6289 | $(0.0098)$ | 0.6289 | $(0.0098)$ | 0.4496 | $(0.0098)$ |
| Zapata | 0.5607 | $(0.0810)$ | 0.8326 | $(0.0536)$ | 0.6485 | $(0.0639)$ | 0.6485 | $(0.0639)$ | 0.5162 | $(0.0661)$ |
| Zavala | 0.5948 | $(0.0790)$ | 0.8114 | $(0.0539)$ | 0.6311 | $(0.0623)$ | 0.6311 | $(0.0623)$ | 0.6253 | $(0.0756)$ |

Note: The stardard error for each estimate is shown in parentheses.


[^0]:    ${ }^{1}$ According to an article that appeared in the Los Angeles Times, presidential candidates George W. Bush and AI Gore "hardly uttered a word about Latino issues in their debates, and key legislative priorities for Latino immigrants were killed by Democrats and Republicans alike from Sacramento to Capitol Hill" (October 29, 2000, p. M-1).

[^1]:    ${ }^{4}$ All of the population estimates are from the Demographic Research Unit of the California Department of Finance's data set entitled Race/Ethnic Population with Age and Sex Detail, 1970-2040, which is available at the department's Web site, www.dof.ca.gov. The Department of Finance used the 1990 U.S. Census data, as well as data collected annually at the county level, to produce estimates of the population of each racial and ethnic group in each year. For a detailed explanation of how the estimates were calculated, see the department's Web site.

[^2]:    ${ }^{5}$ In the 1992 presidential election, for example, 70 percent of whites, 64 percent of blacks, and 35 percent of Latinos turned out to vote. Forty-eight percent of those aged 18 through 20 turned out, 55 percent of those aged 21 through 24 turned out, and 75 percent of those aged 45 through 64 turned out. While 70 percent of the employed voted, only 54 percent of the unemployed did so. Only 44 percent of those with eight or fewer years of education voted, while 85 percent of those with at least four years of college did so. These turnout percentages are typical for national elections. Harold D. Stanley and Richard G. Niemi, Vital Statistics on American Politics (5 $5^{\text {th }}$ ed.; Washington, D.C.: Congressional Quarterly Books, 1995), pp. 79 - 80.

[^3]:    ${ }^{6}$ George Skelton, in his Political Journal column entitled "A Wake-Up Call for GOP About a Wide-Awake Giant," which appeared in the Los Angeles Times on Monday, December 15, 1997, at page A-3, quoted a former advisor to Governor Pete Wilson as having summed it up this way, "We walked over the giant on our way to reelection in 1994, but in the process we woke it up."

[^4]:    ${ }^{7}$ Population Estimates Program, Population Division, U.S. Census Bureau, States ranked by Hispanic Population in 1998.

[^5]:    ${ }^{8} 1990$ U.S. Census Data, Database C90STF1A.
    ${ }^{9} 1990$ U.S. Census Data, Database C90STF1A.

[^6]:    ${ }^{10}$ As of 1990, California's Latino population $(7,687,938)$ was made up of 6,118,996 Mexicans, 126,417 Puerto Ricans, 71,977 Cubans, and 1,370,548 Other Hispanic (1990 U.S. Census Data, Database C90STF1A).

[^7]:    ${ }^{11}$ Out of desperation, several researchers have attempted to make comparisons across the 1970, 1980, and 1990 censuses, but these efforts have resulted in more frustrations than valid conclusions (Arvizu and Garcia, 1996).
    ${ }^{12}$ The Hispanic population typically has a low response level. To compensate for this low response level, the Bureau of the Census developed a method of high density tests to be conducted in 1991 to guarantee that the data collected in the 1990 census reflected the true population with a given degree of certainty.
    ${ }^{13}$ This may be changing with the implementation of the U.S. Census Bureau's new American Community Survey plan. This new survey will begin in 2003 in every county in the United States. It will provide demographic, housing, social, and economic characteristics every year for all of the states, as well as for all cities and counties.

[^8]:    ${ }^{14}$ Hispanic voting behavior was not reported in 1972, and registration rates were not reported in 1964.
    ${ }^{15}$ The data set contains 1,546 Mexicans, 589 Puerto Ricans, 682 Cubans, and 456 non-Hispanic whites.

[^9]:    ${ }^{16}$ Private research groups and think tanks have tried to develop formulas and methods to calculate this population. For example, the Center for the Continuing Study of the California Economy has studied the Latino population and made valid estimates of the size and projected the growth rate of this population. Typically, these estimates are developed for business uses; therefore, the Latino population has been viewed as a whole. This aggregation makes the data unusable for analysis of a specific subset of the population.

[^10]:    ${ }^{17}$ For ease of argument, this table and its notation follow from Gary King's Table 2.3 in Chapter 2 of his book (1997).

[^11]:    ${ }^{18}$ Because the accounting identity $T_{i}=\beta_{i}^{b} X_{i}+\beta_{i}^{w}\left(1-X_{i}\right)$ is written in terms of proportions, it can be rewritten in terms of probabilities as $P(V)=P(V \cap B)+P(V$ $\cap \mathrm{W}$ ), where $\mathrm{P}(\mathrm{V})$ = the probability of voting or turning out, $\mathrm{P}(\mathrm{V} \cap \mathrm{B})=$ the joint probability of both voting and being black, and $P(V \cap W)=$ the joint probability of both voting and being white. Then, using the following general fact about probabilities that $P(A \cap B)=P(A \mid B) P(B)$, the accounting identity can be rewritten as $P(V)=P(V \mid B) P(B)+P(V \mid W) P(W)$, where $\beta_{i}^{b}=P(V \mid B), P(B)=X_{i}$, $P(V \mid W)=\beta_{i}^{w}$, and $P(W)=\left(1-X_{i}\right)$. Therefore, the results reported in this research are conditional probabilities, not joint probabilities. Simply put, the Latino turnout proportions that I report are the proportion of Latinos who turnout, given the proportion of Latinos who are registered in a county. Because my area of investigation was Latino political behavior, this conditional probability seemed appropriate. Specifically, I wanted to examine the political behavior of a subpopulation of each county in California, report its political participation rates, and determine the factors influencing these rates. However, a researcher under different circumstances may want to report the joint probability, which is the proportion of registered voters who are Latino and who turned out to vote. To obtain this proportion, the researcher would need simply to multiply the results produced by ei for $\beta_{i}^{b}$ by $X_{i}$.

[^12]:    19 See Appendix B of King (1997) for further derivation and discussion of the bounds.

[^13]:    ${ }^{20}$ Some researchers have questioned the validity of King's three assumptions (for example, see Tam, 1997).

[^14]:    ${ }^{21}$ See King, 1997, Chapter 9 for further discussion of these assumptions.

[^15]:    ${ }^{22}$ See King, 1997, Chapter 9 for further discussion of these assumptions.

[^16]:    ${ }^{23}$ For a detailed derivation of this distribution, see Appendix C of King (1997).

[^17]:    ${ }^{24}$ King assumes for the prior distribution of $\phi$ that the variance parameters each have a half-normal prior with variance 0.5 , and the covariance parameter is normal with mean zero and standard deviation of 0.5.

[^18]:    ${ }^{25}$ The 1980 U.S. Census did not relate citizenship status to age. In addition, the general age category was specified as 15-19, making it impossible for the researcher to estimate the number of individuals in a county who are citizens and over eighteen (see U.S. Census 1980, Tables 171-173, General Social and Economic Characteristics of California's Counties).
    ${ }^{26}$ The 1990 U.S. Census Bureau data can be accessed at the bureau's Web site, www.census.gov, by using the state and county quickfacts lookup, selecting the state and the county of interest, and then table file 3 A .

[^19]:    population 18 years of age and over was $5,723,000$ and the total Hispanic population 18 years of age and over who are not U.S. citizens was $2,980,000$. These figures suggest that only 48 percent of the total Hispanic population 18 years of age and over in California was eligible to vote in 1996. The total white population 18 years of age and over was $18,490,000$, and the total white population 18 years of age and over who were not U.S. citizens was $3,509,000$. These figures suggest that 81 percent of the white population 18 years age and over was eligible to vote in 1996. Further, the Current Population Report (P20523) entitled Voting and Registration in the Election of November 1998 of the Current Population Survey found that the total California Hispanic population 18 years of age and over was $6,264,000$. The total Hispanic population 18 and over who were also U.S. citizens was $3,154,000$. Therefore, in 1998,50 percent of California's Hispanic population was eligible to vote. The white population 18 years of age and over was reported as $19,121,000$ with $15,582,000$ U.S. citizens. Therefore, in 1998, 81 percent of California's white population was eligible to vote. These reports are subject to overreporting and do not take into account the possibility of felony convictions. In addition, another recent report finds that there is a large disparity in naturalization rates among California counties (Hans P. Johnson, Belinda I. Reyes, Laura Mameesh, and Elisa Barbour, Taking the Oath: An Analysis of Naturalization in California and the United States, Report, Public Policy Institute of California, September 1999), which suggests that using state-level figures may not be the solution.

[^20]:    ${ }^{32}$ In 1998, each county produced over one billion dollars in agricultural commodities (California Department of Food and Agriculture, 1998). Fresno, Kern, Merced, San Joaquin, Stanislaus, and Tulare Counties are in the Central Valley region. Imperial, Riverside, and San Diego are in Southern California region. Monterey County is in the Central Coast region.
    ${ }^{33}$ For example, because of the promise of better factory jobs and the United States entry into World War I, between 1910 and 1930, approximately one-tenth of the Mexican population emigrated to the United States; and by 1930, the Mexican immigrant population of California had reached 180,000 (McCarthy and Valdez, 1986, p. 6). During World War II, the United States and California relied extensively on Mexican labor through the Bracero Program. Again in 1986, then Senator Pete Wilson of California argued successfully for a guest worker program to be included in the Immigration Reform and Control Act to guarantee a cheap labor pool for California's farmers. As recently as April 18, 2001, the Orange County Register reported that legislators in the United States and Mexico were "weighing proposals to create a new guest-worker program to feed Mexican laborers into American industries facing worker shortages" (News, page 15).

[^21]:    ${ }^{34}$ Los Angeles, Orange, and San Bernardino Counties are in the Southern California region. Santa Barbara, Santa Cruz, and Ventura Counties are in the Central Coast region. Santa Clara County is in the Bay Area region.

[^22]:    ${ }^{35}$ Colusa, Glenn, Kings, Madera, San Benito, and Yolo Counties are rural and have Latino VAPs of at least 20 percent but are not listed in Table 2b.

[^23]:    Note: I automatically excluded the top 10 agricultural, or rural, counties. For the remaining counties with a Latino VAP proportion greater than 0.20 , I used the 1990 Census Data, Database C90STF3A, and calculated the ratio of the proportion living inside and outside urbanized areas. If this ratio was greater than 1 to 10 ( 10 percent), I excluded the county.

[^24]:    ${ }^{37}$ For a more thorough discussion and comparison of the linear probability model and the probit and logit models for analyzing binary choice data, see Greene, 1993, Chapter 21, and Griffiths et al., 1993, Chapter 23.

[^25]:    ${ }^{38}$ I use the ecological inference (ei) calculations of registration and turnout as the dependent variables in these secondary analyses. These ei estimates are point estimates with variances. This variance is not controlled for and might make these secondary analyses less efficient. The extent of this inefficiency is a subject for future research.

[^26]:    ${ }^{41}$ This finding is a strong confirmation of the results described in Wolfinger and Rosenstone (1980).

[^27]:    ${ }^{42}$ "Budget Includes Funds to Curb Hispanic Dropouts," Orange County Register, February 10, 1998, News, p. 10.

[^28]:    ${ }^{43}$ In discussions of political party association, the words affiliation, identification, and registration are used somewhat interchangeable in the literature. For consistency and clarity, I have chosen to use the word registration because it is actual political party registration that my data allow me to measure.

[^29]:    ${ }^{46}$ Cuban Americans are said to favor the Republican Party because of its strong stance against communism and Castro's regime in Cuba while Puerto Ricans and Mexican Americans are said to favor the Democratic Party because of its support for immigrants and the underprivileged.

[^30]:    Note: Because throughout this statistical material I am controlling for population size, all of these proportions have been weighted to reflect the relative numbers of Latinos and whites living in these regions. The standard errors for the
    estimates are given in brackets below the estimates.

[^31]:    Note: Because throughout this statistical material I am controlling for population size, all of these proportions have been weighted to reflect the relative numbers of Latinos and whites living in these regions. The standard errors for the estimates are given in brackets below the estimates.

[^32]:    (Note: I automatically excluded the top 10 agricultural, or rural, counties. For the remaining counties with a Latino VAP proportion greater than 0.20 , I used the 1990 Census Data, Database C90STF3A, and calculated the ratio
    of the proportion living inside and outside urbanized areas. If this ratio was greater than 1 to 10 ( 10 percent), I excluded the county. The standard errors
    for the estimates are given in brackets next to the estimates.)

[^33]:    ${ }^{47}$ I use the ecological inference (ei) of party registration as the dependent variable in these secondary analyses. These ei estimates are point estimates with variances. This variance is not controlled for and might make these secondary analyses less efficient. The extent of this inefficiency is a subject for future research.

[^34]:    ${ }^{50}$ Specifically, I relied on 1990 U.S. Census Data, database C90STF3A. The census provides the language spoken at home for individuals five years of age and older. I divided the number of Spanish or Spanish Creole speakers by the total population for the language variable. I assumed that the proportion remained constant over the five elections. The census provides educational attainment of individuals 18 years of age and older. I divided the number in each age category by the total of all categories. I assumed that the proportion of educational attainment remained constant. To obtain the urban population proportion, I divided the total urban population by the total county population. I assumed this proportion remained constant over the five elections. I relied on U.S. Census data regarding small area income and poverty estimates based on the Current Population Surveys for county median income figures. The data were available for 1990, 1994, and 1996. I used these figures, assumed a linear relationship, and calculated median income for the 1992 and 1998 elections.

[^35]:    ${ }^{51}$ U.S. Census Bureau, Census 2000 Redistricting Data Summary File, Matrices PL1, PL2, PL3, and PL4.
    ${ }^{52}$ Texas State Data Center population estimates assuming Migration Scenario 90-96. In 1998, Harris County was estimated to have 830,978 Latino residents and a total population of $5,596,542$.
    ${ }^{53}$ There are four counties in Texas with fewer than hundred Latinos. These counties are Armstrong, Delta, Loving, and Roberts (calculations based on Texas State Data Center population estimates assuming Migration Scenario 9096).

[^36]:    ${ }^{54}$ I use the Texas State Data Center population estimates assuming Migration Scenario 90-96.
    ${ }^{55}$ Texas is divided into 254 counties. To better understand the data, I needed a method to group the data for analysis. I divided the counties into the four geographic and political regions described below.

[^37]:    ${ }^{57}$ No deaths were reported for Loving and King Counties in 1995, so I assigned them the state average of 0.01017 .

[^38]:    ${ }^{58}$ For example, in 1990, 15 counties still had registration rates greater than one and seven had registration rates greater than 95 percent.

[^39]:    ${ }^{59}$ For example, in 1990, Loving and Real Counties had turnout in excess of 100 percent.

[^40]:    ${ }^{60}$ For example, according to the Los Angeles Times, to increase Latino voter turnout for the Los Angeles mayoral election, the Southwest Voter Registration Education Fund staged carnivals in working-class neighborhoods to register new Latinos ("Voting Project Uses Carnivals in Drive to Register Latinos," Los Angeles Times, December 18, 2000, p. B-3).
    ${ }^{61}$ For example, presidential candidate AI Gore's campaign was not concerned about losing Latino support when it requested that Representative Loretta Sanchez move her planned fundraiser from the Playboy Mansion to a less controversial venue as a prerequisite for participation in the Democratic convention. When Representative Sanchez finally acceded to the party's request, its leaders failed to offer her a prime-time speaking opportunity. (See "Once Wooed, Now Nearly Forgotten," Los Angeles Times, October 29, 2000, p. $\mathrm{M}-1$.)

[^41]:    . 1973. "Ecological Regression and Analysis of Past Politics." Journal of Interdisciplinary History, 4: 237-62.

    Lane, Robert E. 1959. Political Life. New York: Free Press of Glencoe.
    Lazarsfeld, Paul, Bernard Berelson, and Hazel Gaudet. 1948. The People's Choice. New York: Columbia University Press.

    Ledyard, John. 1984. "The Pure Theory of Two-Candidate Elections." Public Choice, 44:1-60.

[^42]:    ${ }^{62}$ For a more thorough discussion of the steps and diagnostics, see Chapters 9 and 16 of King (1997).

[^43]:    Note: The stardard error for each estimate is shown in parentheses.

