

Geographic Context as a Treatment: An Experiment on the Policy Effects of Immigrant Skin Tone

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Abstract

Innovative natural experiments, observational research and theories of racial threat suggest that skin tone is a determinant of nativist sentiment, yet experiments which include immigrant skin tone as a treatment find little connection between the two. We argue that these contradictory findings can be partially explained by experimental designs which exclude information about immigrant geographic context, an essential component of threat. To address these issues, we design a survey experiment in which geographic context and immigrant skin tone are randomly manipulated. We find that skin tone has potent effects on support for anti-immigration policy when geographic context is included but has no effects when context is excluded. We argue that these results suggest that geographic context should be considered in future experiments which seek to measure the effects of immigrant skin tone on policy outcomes.

Experiments measuring the impacts of immigrant characteristics on nativist sentiment often find that religion and ethnicity provoke anti-immigrant reactions (Sniderman, Hagendoorn & Prior 2004, Brader, Valentino & Suhay 2008) yet skin tone, which signals these differences, has no effect (Harell, Soroka, Iyengar & Valentino 2012, Hopkins 2014). These results are puzzling in light of research highlighting the cultural and economic relevance of skin tone (Hochschild & Weaver 2007) and neurological studies which suggest that skin tone triggers threatened responses more generally (Ronquillo, Denson, Lickel, Lu, Nandy & Maddox (2007). Racial threat theory also suggests that skin tone affects anti-immigration attitudes. In the context of immigration, racial threat suggests that interactions between perceived ethnic or racial differences and perceptions of immigrant group size in one’s immediate surrounding area will trigger a “threatened” response manifesting as stronger preferences for exclusionary policies (Giles & Hertz 1994).

Given these reasons to believe that skin tone will affect exclusionary attitudes towards immigrants, why do experiments consistently find that skin tone has no bearing on them? We argue that the answer to this question may be related to experimental design. As we discuss in detail below, the effects of skin tone may be attenuated in these studies because immigrants tend to be presented in an abstract manner, very different from the typical ways in which immigration is perceived by citizens in day-to-day life, where immigrants and immigration are discussed in relation to national and subnational contexts which tend to trigger threatened responses. To address these issues, we design an experiment in which skin tone and perceived geographic proximity to respondents were manipulated. Consistent with prior stud-

ies, skin tone has no effect on anti-immigration attitudes when geographic context is excluded. When geographic context is included, however, skin tone has potent effects on support for immigration laws which seek to identify and deport undocumented immigrants.

1 Immigrant Skin Tone and Policy Attitudes

Two recent studies have used experiments to measure the impact of immigrant skin tone on nativist sentiment. Harell et al. (2012) explore the effects of skin tone, national origin and economic status on attitudes toward immigrants in the U.S. and Canada and find that only country of origin and economic status affect immigration attitudes. Hopkins (2014) uses video footage to manipulate the skin tone and perceived English language ability of an undocumented Mexican immigrant and finds that only poorer English language ability surprisingly *decreases* the likelihood that respondents will favor anti-immigration policies. Skin tone treatments include a light- or dark-complexioned version of the immigrant presented in each respective medium¹. Immigrants in both studies are portrayed sympathetically and no information is provided about either their current whereabouts nor where they intend to settle in their respective countries.

We believe that the effects of immigrant skin tone on anti-immigration sentiment are likely to be attenuated in both studies. First, respondents are known to answer questions in a more pro-immigrant direction if they are asked about individual immigrants as opposed to groups, a phenomenon known as “person positivity

¹In Harell et al. (2012), the authors also manipulated facial features in addition to skin tone.

bias” Iyengar, Jackman, Messing, Valentino, Aalberg, Duch, Hahn, Soroka, Harell & Kobayashi (2013). Added to this are stimuli intended to elicit empathic responses². Finally, no information is provided about the immigrants in geographic context.

Absence of geographic context is especially relevant to assessing the effects of skin tone on policy attitudes. Racial threat theory indicates that threat is a function of the interaction between perceived geographic proximity and perceived “social distance” between in-groups and out-groups (Stein, Post & Rinden 2000, Branton & Dunaway 2009, Rocha & Espino 2009). While perceived “social distance” is arguably manipulated by visible immigrant characteristics such as skin tone, no study to date has effectively manipulated perceptions of immigrant geographic proximity, an essential component of threat. Here, we manipulate skin tone and perceived geographic proximity of an immigrant to respondents using respondent internet protocol address in an experiment that we describe in further detail below.

2 Experimental Design

		Skin-Tone Treatments	
		<i>Light Skin-Tone</i>	<i>Dark Skin-Tone</i>
Context Treatments	<i>Control</i>	No Location/Light	No Location/Dark
	<i>Threat</i>	R’s City/Light	R’s City/Dark

Table 1: Treatment Groups

Skin tone and geographic proximity to respondents of a fictional undocumented Mexican immigrant named “Miguel” are randomly manipulated in the context of a

²For example, a stimulus in Harell et al. (2012) mentions that the immigrant “helps pay for his parents’ living expenses and for the education of his two younger brothers and one sister.”

fictional news story excerpt. The skin tone treatments were “Light” and “Dark” and geography treatments were “Control” and “Threat,” yielding a total of four as shown in Table 1. Images in all treatments were created using a Gaussian blur to obscure the face of a Hispanic individual and tint was adjusted to make the individual appear darker or lighter (Online Appendix). These photos were then embedded within the news excerpt portion of the stimulus. Threat was induced by manipulating the respondent’s perceived geographic proximity to the fictional immigrant using text within the instructions and excerpt portions of stimulus (Online Appendix).

The undocumented immigrant in this stimulus is economically disadvantaged, has limited English-language ability, is hard-working and grateful to be in the United States. He was portrayed in this manner for two reasons: first, we sought to reduce the likelihood of false positive responses by producing stimuli similar to those utilized in the Harell et al. (2012) and Hopkins (2014) skin tone experiments; second, we sought to prevent respondents from making post-treatment inferences about the immigrant based on skin tone/location dyads not directly related to them. For example, if respondents received either skin tone treatments (*Control/Light* or *Threat/Light*), they might assume, absent further information, that the immigrant is a high-skilled worker or is economically better off than respondents receiving the non-Caucasian, dark skin tone immigrant. Several validation steps were added to the process to ensure data quality (Online Appendix).

The main policy question asked respondents whether they favored or opposed a law similar to Arizona’s S.B. 1070 in their state along with other questions relating to personal opinions about the immigrant (Online Appendix).

3 Findings

A total of 880 respondents were recruited through Amazon Mechanical Turk. The sample was restricted to individuals currently residing in the United States over the age of 18. To ensure quality, only respondents with an HIT approval rate above 95% and greater than 1000 HIT's approved were eligible (Berinsky, Huber & Lenz 2012). After removing respondents that did not meet the validation criteria, 652 respondents remained. The Mechanical Turk Human Intelligence Task (HIT) advertisement was presented as a "3-5 minute survey of your opinion on immigration" and responses were geographically diverse, with at least one respondent from each of the 48 U.S. states represented. Respondents are mostly white, college educated, employed and identified as Democrats or Independents. They have an average age of 34 and range in ages between 19 to 93³.

3.1 Analysis

As discussed above, two factors related to experimental design may be attenuating skin tone treatment effects in previous studies: person positivity bias, which occurs when questions are linked to a specific immigrant and absence of geographic context, which reduces the amount of "threat" perceived by respondents. According to threat theory, threat is induced both by perceived differences and perceived proximity of out-groups. As a result, we would expect to find that immigrant skin tone does not affect support for the anti-immigration policy absent any other information, a

³See Online Appendix for more demographics. Internet protocol reading technology and the survey experiment conducted in this paper was created using the Qualtrics Research Suite.

result consistent with the experimental literature discussed above. When geographic proximity is introduced however, we expect that skin tone differences between respondents and the immigrant portrayed in the stimuli should result in higher levels of support for the anti-immigration policy. To test if the interaction between geographic proximity and immigrant skin tone affected support for the anti-immigration law, we compared reactions to the immigrant’s skin tone within the *Control* and *Threat* treatments using the following OLS model⁴:

$$Law_d = \alpha_d + \beta_{1,d}SkinTone_d + \epsilon_d \quad (1)$$

In Equation 1, $d = \{Control, Threat\}$ and the dependent variable Law_d is dichotomous and coded 1 if the respondent indicated that they supported the anti-immigration law and 0 otherwise. The independent variable, $Skin-Tone$, is also dichotomous and coded 1 if the respondent was exposed to the dark skin tone immigrant and 0 if they were exposed to the light skin tone immigrant.

Figure 1 contains point estimates and confidence intervals of the effects of skin tone on the Control and the Threat treatment. Here we can clearly see that skin tone has no impact on support for the policy in the Control condition, results consistent with the current literature exploring the effects of skin tone while. In the Threat treatment, however, there is roughly a 13.7% increase in support for the law when the darker skin toned image is shown over the lighter skin tone image.

⁴Results from the same model with covariates can be found in the Online Appendix. Online Appendix also includes results from a Bayesian analysis of the data which reach identical substantive conclusions.

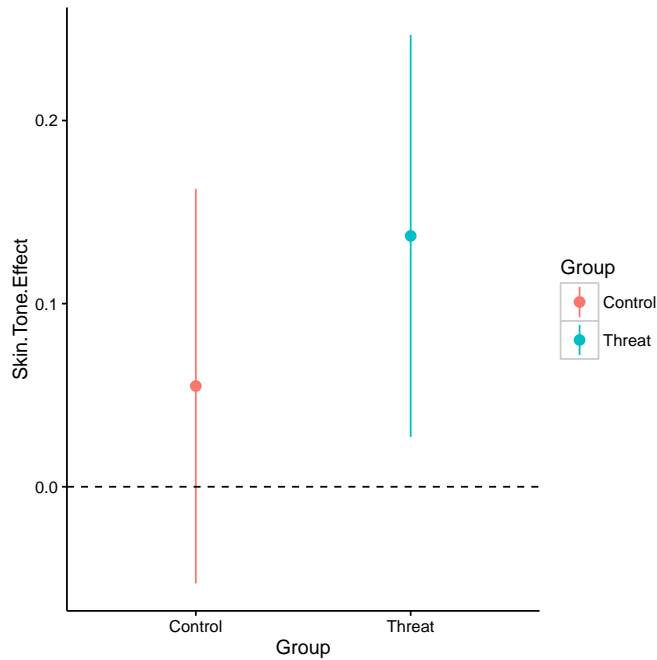


Figure 1: Effect of Skin-Tone On Support for Anti-Immigration Policy in Control and Threat Treatments

Interestingly, skin tone does not appear to affect respondents' opinions about either character traits of the immigrant (Online Appendix). This suggests that either person positivity bias present in the questions were greater than any effects related to skin tone or that perceptions about the immigrant himself were not tied to skin tone. Since the study was designed to include information about the immigrant's income and background in order to avoid character inferences about the immigrant based on skin tone and given the minor differences in effect sizes, we argue that these findings suggest that with enough information skin tone does not necessarily have an impact on assessments about the personal qualities of immigrants.

4 Discussion

In the context of immigration, observational studies and theories of racial threat suggest that skin tone has significant impacts on anti-immigration sentiment and preferences for anti-immigration policies while experiments assessing the effects of skin tone on policy opinion have found no connection between the two. We argue that this can be explained by certain features of survey experiments which had the effect of attenuating the impact of skin tone. Among the most important of these features identified in this study is geographic context which had the dual effects of reducing the realism of the stimulus and decreasing the likelihood that a “threatened” response would be generated.

These findings have important design implications for future survey experiments on immigration, skin tone and other areas in which geographic context is theoretically relevant. By demonstrating that the addition of geographic context can significantly change the results and interpretation of a survey experiment, they demonstrate that geographic context should be considered as a treatment wherever relevant. Finally, this study has implications for the role that media plays in changing opinions about immigration policy. According to these results, where local news coverage of immigrants, especially coverage which presents images and video footage of immigrants with darker skin tones, is more frequent, support for anti-immigration policies should increase relative to areas in which there is less frequent coverage and/or coverage in which immigrants with darker skin tones are not featured.

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