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Predicting First-year Law School Performance: The Influences of Race, Gender, and Undergraduate Major

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We use regression analysis and proprietary data from three top 30 law schools to test the relationships of race, gender, and undergraduate major to first-year law school performance, as measured by law school grade point average at the end of the first year. We conclude that, all else equal: (1) Non-white students perform worse than white students, (2) Women on average do as well as men, though non-white women do worse than both white and non-white men, and (3) For the most part, undergraduate major has no relationship to first-year law school performance.
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Attending law school involves considerable expense of both money and time. The average tuition at the top-30 law schools for the 2014–2015 academic school year is just under $45,000 [*US News* 2014], and the average law school graduate accumulates over $100,000 in debt [Law School Admissions Council 2014]. It is therefore worthwhile for prospective students and their advisors to have some idea of their chances for success. Perhaps more importantly, can we be sure that the playing field is level? In other words, holding other things equal, can minorities and women expect to succeed in law school as well as white males? This matters not only to the individuals directly concerned but also to society as a whole. The legal profession plays a large role shaping and administering our institutions. If minorities and/or women do not have equal access to the profession, then the fundamental fairness of those institutions is in question.

Economists frequently study differences in economic outcomes by race and gender. (See, for example, Arrow [1998] and Blau and Kahn [2000].) As Arrow notes, research in this area "is important not only in itself, but [also] as a test of standard theories" [1998, p. 91]. If racial and gender differences in law school performance exist, we can reasonably expect that such differences will affect human capital accumulation and labor-market outcomes.

Previous research suggests that minorities, on average, perform worse than whites in law school, but the reason is in dispute. One theory, known as the "educational pipeline effect," is that race affects law school performance because minority students, on average, have worse preparation [Klein 1991]. Worse preparation leads to worse performance in law school and consequently to lower pass rates on the bar exam. Klein claims that "virtually all of the disparities in bar exam scores and passing rates among groups can be explained by differences in their law school grades" [Klein 1991, p. 523]. From this perspective, if we could improve minorities' pre-law education, the race effect would disappear.

Closely related to the educational pipeline effect is the "mismatch hypothesis." The hypothesis, championed by Sander [2004; 2005a; b], is that affirmative action allows minority students to attend schools for which they are not sufficiently prepared. The insufficient preparation leads to poor performance. In this view, without affirmative action, minorities with worse preparation would attend lower-ranked schools where they would do better. The hypothesis is hotly contested. Ayres and Brooks [2005], Ho [2005], Chambers et al. [2005], and Barnes [2007] find no evidence of it. Rothstein and Yoon [2008] find no evidence for it at the top law schools but find weak evidence for it at second- and third-tier schools.

Another possible explanation looks at how minorities are treated in law school. Hunt [1996] and Clydesdale [2004] claim that minorities face a hostile environment and face pressure to conform to a privileged white-male ethos. The hostile environment means, among other things, that minorities do not network with white students and so do not benefit from learning from peers, as white students do. This is consistent with Wightman [2000], who finds that non-white students do not do as well as their Law School Admission Test (LSAT) scores and undergraduate grade point averages (UGPAs) would predict. In other words, other things equal, non-white students do not do as well in law school as white students.

The hostile environment does not affect women, according to Clydesdale [2004], because, unlike minorities, it is not part of their experience outside of law school. In his words,

> Results suggest that (1) women, minorities, and other atypical law students confront stigmatization throughout legal education; (2) for women (entering law school in 1991), this stigmatization is new, rejected, and consequently unassociated with law school outcomes; (3) for minorities, this stigmatization is continuous with prior socialization, making resistance difficult and consequent impact sizable. [Clydesdale 2004, p. 711].

Clydesdale reports that the effect of gender on performance is small or non-existent. Clydesdale finds that "In striking contrast to the race results, gender has no significant relationship to first-year GPAs. Men and women law students have equivalent first-year law school GPAs — in spite of women's lower LSAT scores" [2004, p. 737]. Norton et al. [2013] report that once one controls for LSAT score and undergraduate GPA, women do the same as men in their first year of law school. Wightman [1996] does find a statistically significant difference in the performance of men and women on the bar exam. Men in her study do better than women, but the effect is so small that she concludes it "is not large enough to be considered of practical significance" [Wightman 1996, p. 26].

Prospective students might also want to know if their choice of undergraduate major will affect their performance in law school. The American Bar Association claims that no particular undergraduate major is better than any other at preparing students for law school [American Bar Association 2014, para 2]. Instead, it recommends that students take "a broad range of difficult courses from demanding instructors" [*ibid*.]. That official pronouncement, however, has not stopped researchers from investigating the possibility that some majors are better than others for prospective law students.

Some suggest that economics is a particularly good major for pre-law students. Nieswiadomy [1998; 2006; 2010; 2014] claims that economics majors score very well on the LSAT and are ranked at or near the top of all majors. But he makes no allowance for any student characteristics; he simply lists average LSAT score by undergraduate major. Craft and Baker [2003] argue that, all else equal, lawyers with an undergraduate degree in economics earn more money than other lawyers. They also contend that economics is the only major with that effect.

Siegfried [1980] finds that economics majors do not perform any better in his law school economics course than other majors. Ippolito [2001] finds that there is "some advantage" [p. 537] in his law school economics course for those who have had undergraduate economics, but the effect disappears when he controls for students' backgrounds in mathematics.

The objective of this paper is to see if race, gender, or undergraduate major are associated with performance in the first year of law school. We use regression analysis and proprietary data on 1,744 students from three top-30 law schools. Our contributions are the use of regression analysis to provide a more comprehensive study beyond simple descriptive statistics and the unique data. Our data provide a rich level of detail at the individual level, are more recent than data used in previous studies, and contain a wide variety of categories for undergraduate major.

Most of the research on the effects of race and gender on law school performance and bar passage rates depends on a single data set: the Law School Admissions Council's National Longitudinal Bar Passage Study [Klein 1991; Hunt 1996; Wightman 2000; Clydesdale 2004; Sander 2004; 2005a, b; Ayres and Brooks 2005; Chambers et al. 2005; Ho 2005; Barnes 2007; Rothstein and Yoon 2008]. The study tracked the bar passage rates of students who entered law school in 1991 though the February 1996 bar exam [Wightman 1999]. Our data set is both newer and different. Our results can be interpreted as a robustness test of the previous studies.

We conclude that, all else equal, non-white students perform worse than white students, and women, on average, do as well as men, though non-white women do worse than both white and non-white men. Our results are consistent with the advice given by the American Bar Association in that we do not find much evidence that undergraduate major is correlated with first-year law school performance.

Because we use data from top-30 law schools, one should be careful generalizing the results to lower-ranked law schools. But if minorities struggle to compete at top law programs, the effects may trickle down throughout the entire legal training system. This is particularly true if Sander's mismatch hypothesis is true.

DATA AND MODELS

Three top-30 law schools provided data to us on students who graduated from law school in 2005, 2006, 2007, and 2008. In order to obtain the data we had to agree to two conditions: we could not reveal the names of the schools, and we could not test for differences between schools. To meet the second condition, we merged the data from all three schools into one data set. The schools would not provide us with data on the students' undergraduate institutions because they believed that such information might jeopardize the students' anonymity. The schools did provide us with each student's undergraduate major using categories they created. We have 11 categories for major. We have data on 1,744 students.

Our measure of first-year law school performance is first-year cumulative grade point average (FYA). Because law-school students typically take the same core courses in their first year, the first-year grade point average (GPA) is more likely to be comparable across schools than cumulative GPA.[1] In addition, the first year of law school is when the choice of undergraduate major might make the most difference to student performance. In later years, law students will have more homogeneous backgrounds, as they will have taken the same first-year law courses.

We use ordinary least squares to regress first-year cumulative law school GPA against a variety of explanatory variables. We include variables that others have

found to predict law school performance. One of these is the students' LSAT scores. Wightman [1996; 2000], Ippolito [2001], Clydesdale [2004], and Sander [2004] all find that the LSAT score is a good predictor of law school performance. Based on these studies, we expect the LSAT score will be positively related to FYA.

A second explanatory variable is UGPA. Like the LSAT score, many studies find UGPA to be a good predictor of law school performance [Wightman 1996; 2000; Ippolito 2001; Clydesdale 2004; Sander 2004]. We expect UGPA to be positively related to our dependent variable, first-year law school cumulative grade point average.

To test for the influence of race, we include a dummy variable (NONWHITE) that is one for non-whites and zero for whites. Unfortunately, the law schools in our study would not provide data on individual non-white groups because they were concerned about the anonymity of their students. Clydesdale [2004] reports that Asians do better than other minorities but still perform worse in law school than whites. If Clydesdale is correct, then our inability to distinguish between Asian and non-Asian minorities is unlikely to affect the sign of our estimated coefficient. If Asian students perform as well or better than white students, then our results may underestimate the association of race with FYA.[2]

To test for the influence of gender, we include a dummy variable (FEMALE) that is one for females and zero for males. We also include a dummy variable for non-white females (NONWHITEFEMALE) to see if the performance of this group differs from their peers. This variable can be thought of as measuring the marginal or additional influence of being both non-white and female in comparison to the broader categories of female and non-white.

We also include age measured in years (AGE) and age-squared (AGESQUARED). Clydesdale [2004] finds that age is inversely related to first-year GPA. He hypothesizes that older students have more family obligations and are more likely to be ill. We hypothesize that that age will have a positive but diminishing influence on performance. Maturity should contribute to performance, but as age increases, the negative influences of age noted by Clydesdale become more important.

To this list of explanatory variables we add undergraduate major. Specifically, we add dummy variables for 11 majors: accounting/finance (ACCOUNTING), art/performance (ART), economics (ECON), English/literature (ENGLISH), general studies (GENERAL), history (HISTORY), mathematics/natural sciences (MATHSCIENCE), management/communications (MGMTCOMM), philosophy/religion (PHILRELIG), political science/government (POLISCI), and psychology/sociology (PSYCHSOC). Economics is the omitted category.

Table 1 provides summary statistics for all of our variables for the full sample of students, white students, and non-white students. Maximum and minimum values are provided in Appendix Table A1 for all students, Appendix Table A2 for white and non-white students, and Appendix Table A3 for male and female students. The average first-year law student in our sample has a first-year law school GPA of 3.24. The average LSAT score is 162, which is about the 88th percentile [www.powerscore.com]. LSAT scores in our sample range from 143 to 177 (possible scores range from120 to 180). The average undergraduate GPA is 3.55, which is not surprising for students in top-30 law schools. The average age is 24. Forty-seven percent of the students in the sample are women, and 21 percent are non-white. Twelve percent are non-white females. Political science/government majors account for 20.4 percent of the sample, followed by English/literature (11.2 percent), psychology/sociology (11.2 percent), and history (10.5 percent).

Table 1 Descriptive statistics

Variable	*All students* *Mean* *(Std. dev.)*	*White students* *Mean* *(Std. dev.)*	*Non-white students* *Mean* *(Std. dev.)*
FYA	3.244	3.303	3.014
	(0.323)	(0.296)	(0.320)
LSAT	161.550	162.653	157.266
	(4.988)	(4.097)	(5.775)
UGPA	3.553	3.602	3.365
	(0.319)	(0.296)	(0.337)
Age	24.120	24.053	24.378
	(2.979)	(2.933)	(3.142)
Female	0.467	0.436	0.585
	(0.499)	(0.496)	(0.493)
Nonwhite	0.205	N/A	N/A
	(0.404)		
Nonwhitefemale	0.120	N/A	N/A
	(0.325)		
Accounting	0.071	0.076	0.050
	(0.256)	(0.265)	(0.219)
Art	0.029	0.032	0.014
	(0.167)	(0.177)	(0.118)
Econ	0.086	0.087	0.081
	(0.281)	(0.282)	(0.274)
English	0.112	0.120	0.084
	(0.316)	(0.325)	(0.277)
General	0.100	0.095	0.118
	(0.300)	(0.294)	(0.322)
History	0.105	0.112	0.078
	(0.307)	(0.315)	(0.269)
MathScience	0.091	0.087	0.104
	(0.287)	(0.282)	(0.305)
MgmtComm	0.095	0.094	0.101
	(0.294)	(0.292)	(0.302)
PhilRelig	0.052	0.053	0.048
	(0.222)	(0.225)	(0.213)
PoliSci	0.204	0.201	0.216
	(0.403)	(0.401)	(0.412)
PsychSoc	0.112	0.099	0.162
	(0.315)	(0.298)	(0.369)
N	1,744	1,387	357

We notice that FYA, LSAT, and UGPA are all higher for white students than for non-white students (3.3 compared to 3.0, 163 compared to 157, and 3.6 compared to 3.4, respectively). All three differences are statistically significant at the 1 percent level. A higher percentage of non-white students are females (59 percent) than of white students (44 percent). The breakdown of undergraduate majors seems fairly similar. When comparing women to men, we notice fewer differences. FYA and UGPA are quite similar (3.2 compared to 3.3 and 3.6 compared to 3.5, respectively). Males have slightly higher average LSAT scores (162 compared to 161). There are more men in economics, math/science, and philosophy/religion than women, whereas there are more women in English/literature and psychology/sociology than men.

We use ordinary least squares to estimate the models. All regressions are estimated with Huber–White's standard errors to allow for potential heteroskedasticity. The first model is

presented in equation (1):

$$\begin{aligned}(1)\qquad FYA = {} & CONSTANT + b_1 LSAT + b_2 UGPA + b_3 AGE + b_4 AGESQUARED \\ & + b_5 FEMALE + b_6 NONWHITE + b_7 NONWHITEFEMALE + b_8 ART \\ & + b_9 ACCOUNTING + b_{10} ENGLISH + b_{11} GENERAL + b_{12} HISTORY \\ & + b_{13} MATHSCIENCE + b_{14} MGMTCOMM + b_{15} PHILRELIG \\ & + b_{16} POLISCI + b_{17} PSYCHSOC + \varepsilon.\end{aligned}$$

RESULTS

The regression results for equation (1) are reported in Table 2. The first column contains results for the full sample of all students. The second and third columns contain the results for white students and non-white students, respectively.

As in previous studies, the coefficients of LSAT score and undergraduate GPA are both positive and significant for all students. Every additional point on the LSAT is correlated with a 0.017 point increase in a student's FYA, so the association is not large in magnitude. Every one-point increase in UGPA (measured on a 4.0 scale) is associated with a 0.147 point higher FYA (measured on a 4.0 scale). As with LSAT, the coefficient is positive and statistically significant but not large in magnitude. AGE has a positive and significant relationship, and AGESQUARED has a negative and significant relationship, both as expected. Being older correlates with higher FYAs than being younger, but the benefit diminishes with age. The coefficient of FEMALE is not statistically significant, meaning that we cannot reject the hypothesis that women perform as well as men in the first year of law school.

The coefficient of NONWHITE is negative and significant. All else equal, non-whites have lower FYAs than whites. Our results are consistent with Wightman's [2000] finding that LSAT and undergraduate GPA over-predict law school performance for non-whites. For the students in our sample, non-whites arrive in law school with lower average LSAT scores (157.3 compared to 162.7 for whites) and lower undergraduate GPAs (3.36 compared to 3.60 for whites). Yet *even after controlling for these differences*, the model predicts that the FYAs of non-whites will be almost 0.12 points lower than their white classmates, which is about 3.7 percent lower when evaluated at the mean FYA (0.12/3.24).

The coefficient of NONWHITEFEMALE is negative and statistically significant; non-white females have lower first-year law school averages of 0.072 points, or about 2 percent lower than other students (all males and white females) when evaluated at the mean FYA (0.072/3.24). The coefficient can be interpreted as a marginal relationship over and above being female and being non-white, not a total relationship. So although women have statistically similar FYAs to men, non-white women have lower first-year performance.

We are unable to reject the hypothesis that any of the coefficients of undergraduate majors are statistically different from zero.[3] To further analyze undergraduate majors, we perform an F-test to test for joint significance. We cannot reject the hypothesis that the majors are statistically similar; this result is consistent with the American Bar Association's claim that the choice of undergraduate major does not affect law school performance.

Because the overall sample is 80 percent white, it is not surprising that the results for whites alone (second column) are similar to those reported in the first column for the entire sample. The only notable differences are that the accounting dummy variable is negative

Table 2 Regression results for equation (1)

Variable	*All students Coefficient (Std. error)*	*White students Coefficient (Std. error)*	*Non-white students Coefficient (Std. error)*
LSAT	0.017***	0.016***	0.022***
	(0.002)	(0.002)	(0.003)
UGPA	0.147***	0.181***	0.042
	(0.024)	(0.027)	(0.052)
Age	0.049***	0.045***	0.089*
	(0.015)	(0.016)	(0.052)
Agesquared	–0.001***	–0.001***	–0.002*
	(0.000)	(0.000)	(0.001)
Female	0.008	0.008	–0.063*
	(0.016)	(0.016)	(0.032)
Nonwhite	–0.116***	N/A	N/A
	(0.026)		
Nonwhitefemale	–0.072**	N/A	N/A
	(0.034)		
Accounting	–0.044	–0.068*	0.017
	(0.033)	(0.036)	(0.086)
Art	–0.002	–0.027	0.112
	(0.041)	(0.045)	(0.090)
English	0.014	–0.016	0.142**
	(0.028)	(0.031)	(0.061)
General	–0.016	–0.043	0.073
	(0.029)	(0.033)	(0.061)
History	–0.008	–0.030	0.063
	(0.028)	(0.030)	(0.077)
MathScience	0.014	–0.002	0.033
	(0.030)	(0.032)	(0.072)
MgmtComm	–0.021	–0.037	0.023
	(0.029)	(0.032)	(0.065)
PhilRelig	–0.003	–0.009	–0.012
	(0.033)	(0.037)	(0.077)
PoliSci	–0.019	–0.028	0.011
	(0.027)	(0.030)	(0.062)
PsychSoc	–0.045	–0.071**	0.033
	(0.030)	(0.034)	(0.062)
Constant	–0.646*	–0.427	–1.752**
	(0.362)	(0.417)	(0.864)
N	1,744	1,387	357
R^2	0.2314	0.0975	0.2230
F	29.71	10.94	7.22

***=significant at the 0.01 percent level; **=significant at the 0.05 percent level; *=significant at the 0.10 percent level.

Note: Dependent variable: First-year cumulative grade point average (FYA).

and weakly significant, and the psychology/sociology dummy variable is negative and statistically significant, meaning that white students with either of these two majors have lower first-year GPAs than white economics majors.

For non-white students (third column), the coefficient of gender is negative and marginally significant (it just misses the 5-percent cutoff with a *P*-value of 5.4-percent); non-white women have lower first-year GPAs than their non-white male classmates by about 0.063 points or about 2 percent when evaluated at the mean FYA

(0.063/3.24). We could anticipate this result based on the result from the full sample (first column) that non-white women perform worse in law school than their comparison group, which includes non-white men. There are, however, two differences from the full-sample results reported in the first column of Table 2. First, the coefficient of UGPA is not statistically significant; non-white students' undergraduate academic performance has no statistically significant correlation with their first-year law school performance. Given that law school admissions committees routinely rely heavily on students' undergraduate GPAs, this finding should concern admissions committees. Second, non-white students with an English/literature major have higher FYAs than non-white students with an economics major.

As already noted, for the complete sample, no specific major, including economics, provides an advantage in the first year of law school. For subsets of the data, only three majors show any degree of significance. Yet Nieswiadomy [1998; 2006; 2010; 2014] suggests that the choice of undergraduate major is correlated with success on the LSAT. We can test for the significance of undergraduate major in predicting LSAT scores.[4] And unlike Nieswiadomy, we can control for other characteristics such as UGPA, race, and gender. We use ordinary least squares to estimate the following model:

$$\begin{aligned}(2)\quad \mathrm{LSAT} = {} & \mathrm{CONSTANT} + b_1\mathrm{UGPA} + b_2\mathrm{AGE} + b_3\mathrm{AGESQ} + b_4\mathrm{FEMALE} \\ & + b_5\mathrm{NONWHITE} + b_6\mathrm{NONWHITEFEMALE} + b_7\mathrm{ART} + b_8\mathrm{ACCOUNTING} \\ & + b_9\mathrm{ENGLISH} + b_{10}\mathrm{GENERAL} + b_{11}\mathrm{HISTORY} + b_{12}\mathrm{MATHSCIENCE} \\ & + b_{13}\mathrm{MGMTCOMM} + b_{14}\mathrm{PHILRELIG} + b_{15}\mathrm{POLISCI} \\ & + b_{16}\mathrm{PSYCHSOC} + \varepsilon.\end{aligned}$$

We report our results in Table 3. We find that undergraduate GPA is only a marginally significant predictor of LSAT score (*P*-value of 9.8 percent). The only undergraduate major that has a statistically different LSAT score than economics is math and science, with an average LSAT score of about one point higher. Women and non-whites have lower LSAT scores. Women's LSAT scores are about one point lower than men's LSAT scores. The magnitude of the difference for non-white students is larger. Non-whites have LSAT scores that are about four points lower than whites, and non-white females have LSAT scores about two points lower than the comparison group of white females, white males, and non-white males.

The following example (using 2014 statistics) illustrates how relatively small differences in LSAT scores might affect what school a student can attend: the median LSAT score for the 15th-ranked school (University of Texas at Austin) is 166, the median LSAT score for the 29th-ranked school (University of Georgia) is 163, and the median LSAT score for the 45th-ranked school (Florida State) is 160 [*US News* 2014]. Hence, a relatively small difference in LSAT score of two to three points can make relatively large differences in school rankings, so the importance of the differences in LSAT scores for women and non-whites could be substantial.

As we did for the FYA model estimated in equation (1), we estimate the basic model for subsets of the data. The second column of Table 3 reports the coefficients for the sample of white students, and the third column reports the coefficients for the sample of non-white students.

The LSAT score penalty for females remains in both the white and non-white student samples. Undergraduate GPA is positive and significant only for non-white students.

Table 3 Regression results for equation (2)

Variable	*All students Coefficient (Std. error)*	*White students Coefficient (Std. error)*	*Non-white students Coefficient (Std. error)*
UGPA	0.648*	0.160	2.527***
	(0.391)	(0.418)	(0.900)
Age	0.221	0.070	1.467*
	(0.250)	(0.272)	(0.840)
Agesquared	–0.004	–0.001	–0.027*
	(0.004)	(0.005)	(0.014)
Female	–0.753***	–0.808***	–2.352***
	(0.229)	(0.229)	(0.603)
Nonwhite	–3.896***	N/A	N/A
	(0.482)		
Nonwhitefemale	–2.031***	N/A	N/A
	(0.634)		
Accounting	–0.498	–0.737*	0.787
	(0.422)	(0.432)	(1.258)
Art	–0.104	–0.180	0.928
	(0.682)	(0.702)	(2.507)
English	–0.005	0.082	–0.620
	(0.419)	(0.418)	(1.268)
General	–0.326	–0.004	–1.182
	(0.439)	(0.455)	(1.132)
History	0.377	0.258	1.113
	(0.417)	(0.427)	(1.250)
MathScience	0.925**	0.215	3.407***
	(0.459)	(0.473)	(1.151)
MgmtComm	–0.108	0.033	–0.655
	(0.434)	(0.430)	(1.262)
PhilRelig	0.512	0.451	0.822
	(0.538)	(0.548)	(1.603)
PoliSci	–0.395	–0.541	0.109
	(0.385)	(0.392)	(1.070)
PsychSoc	–0.556	–0.058	–1.631
	(0.417)	(0.412)	(1.067)
Constant	157.886***	161.631***	130.860***
	(4.212)	(4.512)	(13.233)
N	1,744	1,387	357
R^2	0.2209	0.0610	0.1415
F	22.46	1.65	5.05

***=significant at the 0.01-percent level; **=significant at the 0.05-percent level; *=significant at the 0.10-percent level.
Note: Dependent variable: LSAT score (LSAT).

The advantage to majoring in math and science remains for non-whites but is not significant for whites. No other undergraduate majors are statistically significant predictors of LSAT scores.

CONCLUSION

Economists study differences in economic outcomes that may be correlated with race and/or gender. Using data from 1991, Sander [2004] and Klein [1991] argue that once

one accounts for differences in LSAT score and undergraduate GPA, race does not affect performance in law school. Our results dispute that contention. In our sample of three top-30 law schools, non-white students perform worse than whites even after accounting for differences in LSAT scores and undergraduate GPA. We cannot claim to know *why* that is the case. Our results are not only consistent with both the mismatch hypothesis and the idea that minorities face a hostile environment in law school, but also it is possible that the reason is something else altogether. Our results do suggest, however, that law schools should take a closer look at their admissions policies and their environments.

Like most other studies, we find no correlation between gender and performance in law school. The caveat is that non-white females perform worse than both white and non-white males.

We find very little evidence that undergraduate major affects performance in the first year of law school or LSAT scores. The latter finding differs from Nieswiadomy's studies [1998; 2006; 2010; 2014] that report LSAT average scores for certain undergraduate majors. A likely explanation is that Nieswiadomy simply reports the relationship between LSAT scores (which do matter) and major, with no attempt to control for other variables. Another potential explanation is that while undergraduate major is uncorrelated with LSAT scores for most models for matriculating students at top-30 law schools, undergraduate major could be correlated with LSAT scores at lower-ranking law schools. In short, our results are consistent with the American Bar Association's claim that no particular major is better than any other as preparation for law school.

Like other studies, we find that, in general, undergraduate GPA predicts performance in the first year of law school. But again we find an exception: undergraduate GPA loses its predictive power for non-whites. This may be of special interest to law school admissions committee members.

Our study contributes to the broader questions of whether women and minorities can succeed in the very programs that shape legal institutions. Because success in law school likely influences human-capital accumulation and labor-market outcomes, the question of the characteristics that influence success in law school is of interest to law school officials and economists alike.

Our study updates past studies of law-school performance. We are encouraged that women, for the most part, do as well as men. We are troubled that non-white students, especially non-white females, do not do as well as whites. Graduates of top-tier law schools play a significant role in shaping our nation's formal institutions. Racial disparities in success at these schools therefore matter to society as a whole. This is in addition to the associated disparities in human-capital accumulation and labor-market outcomes for the individuals involved. The determinants of success in law school are therefore important not only to law school officials but also to economists and other social scientists.

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APPENDIX

Table A1 Descriptive statistics for all students (with minimums and maximums)

Variable	*Mean (Std. dev.)*	*Minimum*	*Maximum*
FYA	3.244	2.04	4.15
	(0.323)		
LSAT	161.550	143	177
	(4.988)		
UGPA	3.553	1.97	4.2
	(0.319)		
Age	24.120	20	51
	(2.979)		
Female	0.467	0	1
	(0.499)		
Nonwhite	0.205	0	1
	(0.404)		
Nonwhitefemale	0.120	0	1
	(0.325)		
Accounting	0.071	0	1
	(0.256)		
Art	0.029	0	1
	(0.167)		
Econ	0.086	0	1
	(0.281)		
English	0.112	0	1
	(0.316)		
General	0.100	0	1
	(0.300)		
History	0.105	0	1
	(0.307)		
MathScience	0.091	0	1
	(0.287)		
MgmtComm	0.095	0	1
	(0.294)		
PhilRelig	0.052	0	1
	(0.222)		
PoliSci	0.204	0	1
	(0.403)		
PsychSoc	0.112	0	1
	(0.315)		
N	1,744		

Table A2 Descriptive statistics by race (with minimums and maximums)

Variable	*White students*			*Non-white students*		
	Mean (Std. dev.)	*Min*	*Max*	*Mean (Std. dev.)*	*Min*	*Max*
FYA	3.303	2.04	4.15	3.014	2.08	3.84
	(0.296)			(0.320)		
LSAT	162.653	143	177	157.266	144	173
	(4.097)			(5.775)		
UGPA	3.602	1.97	4.20	3.365	2.18	4.00
	(0.296)			(0.337)		
Age	24.053	20	51	24.378	20	40
	(2.933)			(3.142)		
Female	0.436	0	1	0.585	0	1
	(0.496)			(0.493)		
Accounting	0.076	0	1	0.050	0	1
	(0.265)			(0.219)		
Art	0.032	0	1	0.014	0	1
	(0.177)			(0.118)		
Econ	0.087	0	1	0.081	0	1
	(0.282)			(0.274)		
English	0.120	0	1	0.084	0	1
	(0.325)			(0.277)		
General	0.095	0	1	0.118	0	1
	(0.294)			(0.322)		
History	0.112	0	1	0.078	0	1
	(0.315)			(0.269)		
MathScience	0.087	0	1	0.104	0	1
	(0.292)			(0.305)		
MgmtComm	0.094	0	1	0.101	0	1
	(0.282)			(0.302)		
PhilRelig	0.053	0	1	0.048	0	1
	(0.225)			(0.213)		
PoliSci	0.201	0	1	0.216	0	1
	(0.401)			(0.412)		
PsychSoc	0.099	0	1	0.162	0	1
	(0.298)			(0.369)		
N	1,387			357		

Table A3 Descriptive statistics by gender (with minimums and maximums)

Variable	*Female students*			*Male students*		
	Mean (Std. dev.)	*Min*	*Max*	*Mean (Std. dev.)*	*Min*	*Max*
FYA	3.219	2.16	4.15	3.265	2.04	4.03
	(0.341)			(0.304)		
LSAT	160.635	144	177	162.351	143	177
	(5.245)			(4.608)		
UGPA	3.570	2.16	4.12	3.539	1.97	4.2
	(0.312)			(0.326)		
Age	23.883	20	43	24.327	20	51
	(2.692)			(3.196)		
Nonwhite	0.257	0	1	0.159	0	1
	(0.437)			(0.366)		
Accounting	0.050	0	1	0.088	0	1
	(0.219)			(0.284)		
Art	0.033	0	1	0.025	0	1
	(0.179)			(0.155)		
Econ	0.052	0	1	0.117	0	1
	(0.221)			(0.321)		
English	0.152	0	1	0.077	0	1
	(0.360)			(0.267)		
General	0.131	0	1	0.072	0	1
	(0.338)			(0.259)		
History	0.088	0	1	0.119	0	1
	(0.284)			(0.324)		
MathScience	0.074	0	1	0.105	0	1
	(0.261)			(0.307)		
MgmtComm	0.106	0	1	0.086	0	1
	(0.308)			(0.281)		
PhilRelig	0.036	0	1	0.067	0	1
	(0.185)			(0.250)		
PoliSci	0.192	0	1	0.215	0	1
	(0.394)			(0.411)		
PsychSoc	0.145	0	1	0.083	0	1
	(0.352)			(0.276)		
N	814			930		

Notes

1. A typical first-year curriculum includes the subjects of civil procedure, constitutional law, contracts, criminal law, property, torts, and legal writing/analysis. The three schools in our sample follow this standard curriculum and are thus comparable.
2. For comparison, for the years 2002–2005 (three years prior to the graduating dates in our sample), an average of 45,850 students matriculated through all US law schools in each of the four years. An average of 71.20 percent of these students were white, an average of 8.02 percent were Asian/Pacific Islander, and the remaining 20.78 percent were non-white and non-Asian (American Indian/Alaskan Native, Black/African American, Chicano/Mexican American, Hispanic/Latino, Puerto Rican, Other, or gave no ethnic information). Thus, Asian/Pacific Islanders appear to comprise about one-third (28 percent) of non-whites (data available to registered prelaw advisors at http://www.lsac.org/prelaw/data/ethnic-gender-matriculants).
3. We create broader categories to evaluate the robustness of our findings with respect to undergraduate major: humanities, social sciences, math/science, and business. General studies was our omitted category in these supplemental regressions. None of the categories is a statistically significant predictor of FYA. Including economics with business or social sciences has no effect on the results.
4. Our sample includes only three top schools, so our results are merely suggestive.

References

American Bar Association. 2014. Preparing For Law school. http://www.abanet.org/legaled/prelaw/prep.html.

Arrow, K.J. 1998. What Has Economics to Say about Racial Discrimination? *Journal of Economic Perspectives*, 12(2): 91–100.

Ayres, I., and R. Brooks. 2005. Does Affirmative Action Reduce the Number of Black Lawyers? *Stanford Law Review*, 57(6): 1807–1854.

Barnes, K.Y. 2007. Is Affirmative Action Responsible for the Achievement Gap between Black and White Law Students? *Northwestern University Law Review*, 101(4): 1759–1808.

Blau, F.D., and L.M. Kahn. 2000. Gender Differences in Pay. *Journal of Economic Perspectives*, 14(4): 75–99.

Chambers, D.L., T.T. Clydesdale, W.C. Kidder, and R.O. Lempert. 2005. The Real Impact of Eliminating Affirmative Action in American Law Schools: An Empirical Critique of Richard Sander's Study. *Stanford Law Review*, 57(6): 1855–1898.

Clydesdale, T.T. 2004. A Forked River Runs through Law School: Toward Understanding Race, Gender, Age, and Related Gaps in Law School Performance and Bar Passage. *Law and Social Inquiry*, 29(4): 711–59.

Craft, R.K., and J.G. Baker. 2003. Do Economists Make Better Lawyers? Undergraduate Degree Field and Lawyer Earnings. *Journal of Economic Education*, 34(3): 263–281.

Ho, D.E. 2005. Why Affirmative Action Does Not Cause Black Students to Fail the Bar. *Yale Law Journal*, 114 (8): 1997–2004.

Hunt, C.J. II. 1996. Guests in Another's House: An Analysis of Racially Disparate Bar Performance. *Florida State University Law Review*, 23(3): 721–793.

Ippolito, R.A. 2001. The Sorting Function: Evidence from Law School. *Journal of Legal Education*, 51(4): 533–553.

Klein, S.P. 1991. Disparities in Bar Exam Passing Rates among Racial/Ethnic Groups: Their Size, Source, and Implications. *Thurgood Marshall Law Review*, 16(3): 517–529.

Law School Admissions Council 2014. Financing Law School. http://www.lsac.org/jd/financing-law-school/before-law-school.

Nieswiadomy, M. 1998. LSAT Score of Economics Majors. *Journal of Economic Education*, 29(4): 377–379.

———. 2006. LSAT Score of Economics Majors: The 2003–2004 Class Update. *Journal of Economic Education*, 37(2): 244–247.

———. 2010. LSAT Score of Economics Majors: The 2008–2009 Class Update. *Journal of Economic Education*, 41(3): 331–333.

———. 2014. LSAT Score of Economics Majors: The 2012–2013 Class Update. *Journal of Economic Education*, 45(1): 71–74.

Norton, L.L., D.A. Suto, and L.M. Reese. 2013. Analysis of Differential Prediction of Law School Performance by Gender Subgroups Based on 2008–2010 Entering Law School Classes. Law School Admissions Council LSAT Technical Report 13-01. http://www.lsac.org/docs/default-source/research-(lsac-resources)/tr-13-01.pdf.

Rothstein, J., and A. Yoon. 2008. Mismatch in Law School. NBER Working Paper No. 14275. http://www.nber.org/papers/w14275.

Sander, R.H. 2004. A Systematic Analysis of Affirmative Action in American Law Schools. *Stanford Law Review*, 57(2): 367–484.

———. 2005a. Mismeasuring the Mismatch: A Response to Ho. *Yale Law Journal*, 114(8): 2005–2010.

———. 2005b. Reply: A Reply to Critics. *Stanford Law Review*, 57(6): 1963–2016.

Siegfried, J.J. 1980. Factors Affecting Student Performance in Law School Economics Courses. *Journal of Economic Education*, 12(1): 54–60.

US News and World Report 2014. Best Law Schools. http://grad-schools.usnews.rankingsandreviews.com/best-graduate-schools/top-law-schools/law-rankings.

Wightman, L.F. 1996. Women in Legal Education: A Comparison of the Law School Performance and Law School Experiences of Men and Women. Law School Admission Council Research Report Series, Law School Admission Council, Newtown, PA.

———. 1999. User's Guide LSAC National Longitudinal Data File. Law School Admission Council. http://www2.law.ucla.edu/sander/Systemic/data/LSAC/bps_usersguide_layout.pdf.

———. 2000. Beyond FYA: An Analysis of the Utility of LSAT Scores and UGPA for Predicting Academic Success in Law School. Law School Admission Council Research Report Series, Law School Admission Council, Newtown, PA.