Admissions Policies, Cohort Composition, and Academic Success: Evidence from California ONLINE APPENDIX

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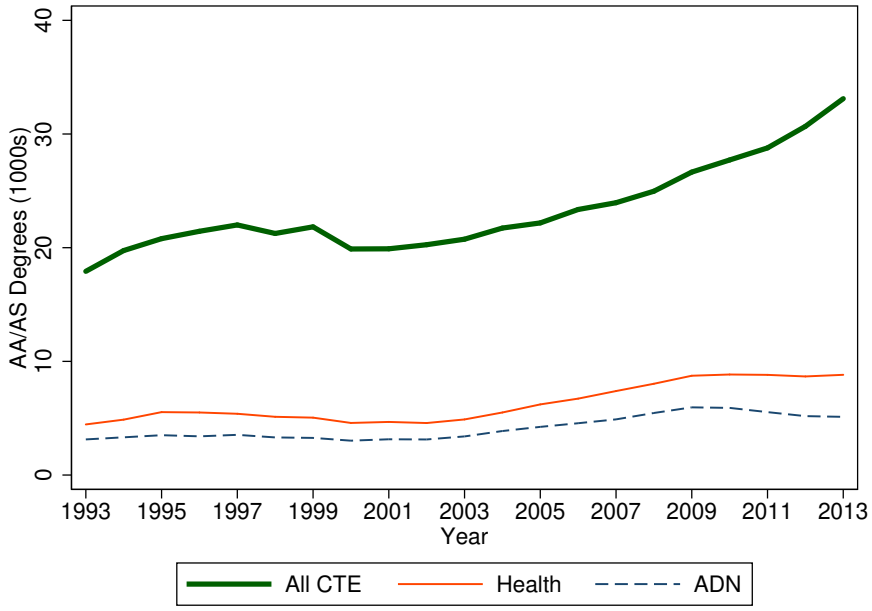
April 26, 2021

*Federal Trade Commission. 600 Pennsylvania Avenue NW, Washington, DC 20580. Email: mgrosz@ftc.gov. I am grateful to Michal Kurlaender, Andrew Foote, Rick Hess, Sophie McGuinness, Matt Naven, James Thomas, Kevin Williams, and seminar participants at University College Dublin, DC Econ of Ed Seminar, and the SGE, AEFP, and APPAM conferences for their helpful comments. The California Community College Chancellor's Office generously provided data access, technical support, and expertise. The research reported here was supported by the Institute of Education Sciences, U.S. Department of Education, through Grant R305H150073 to the Regents of the University of California. The views expressed in this article are those of the author and do not necessarily reflect those of the Federal Trade Commission or its commissioners.

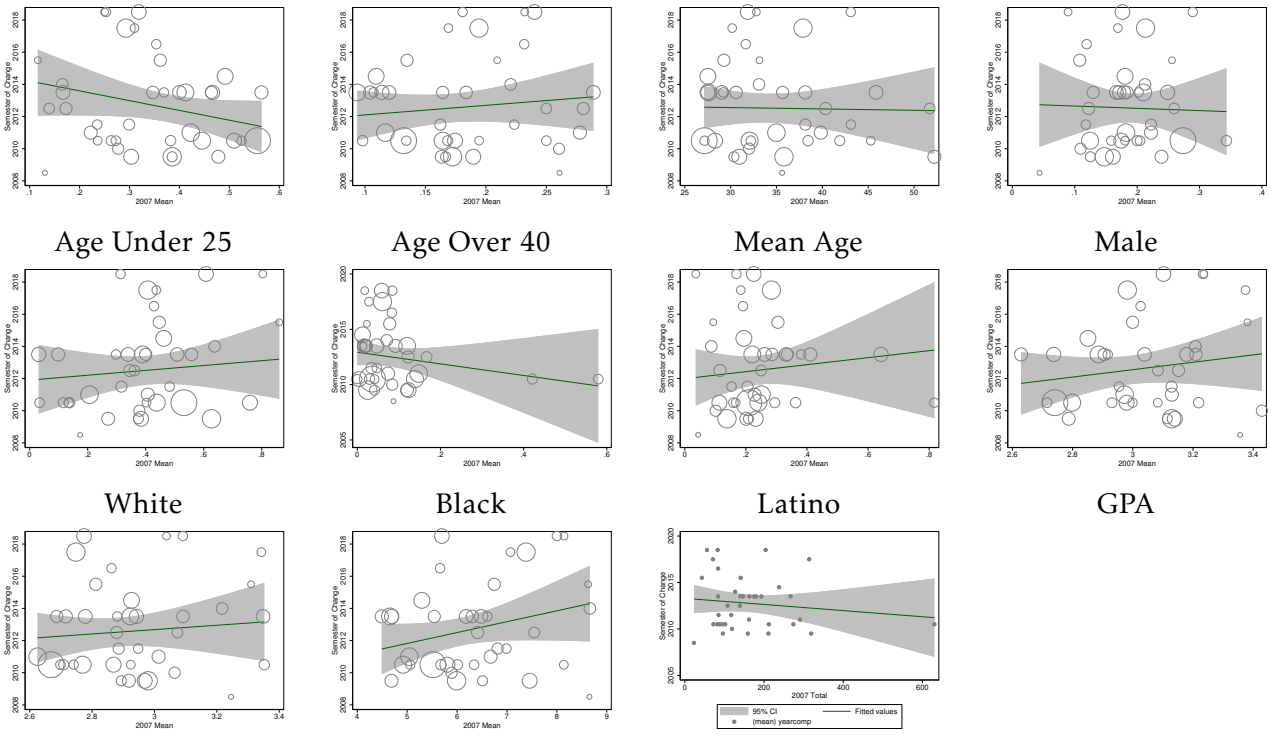
A1 Appendix Tables and Figures

Figure A1: CTE, Health, and ADN Completions Since 1993



Notes. This figure shows the total number of associate degrees in career-technical education (CTE) programs since the 1992-1993 academic year; the number of associate degrees in all health programs; and the number of associate degrees in nursing (ADN).

Figure A2: Endogeneity of Timing



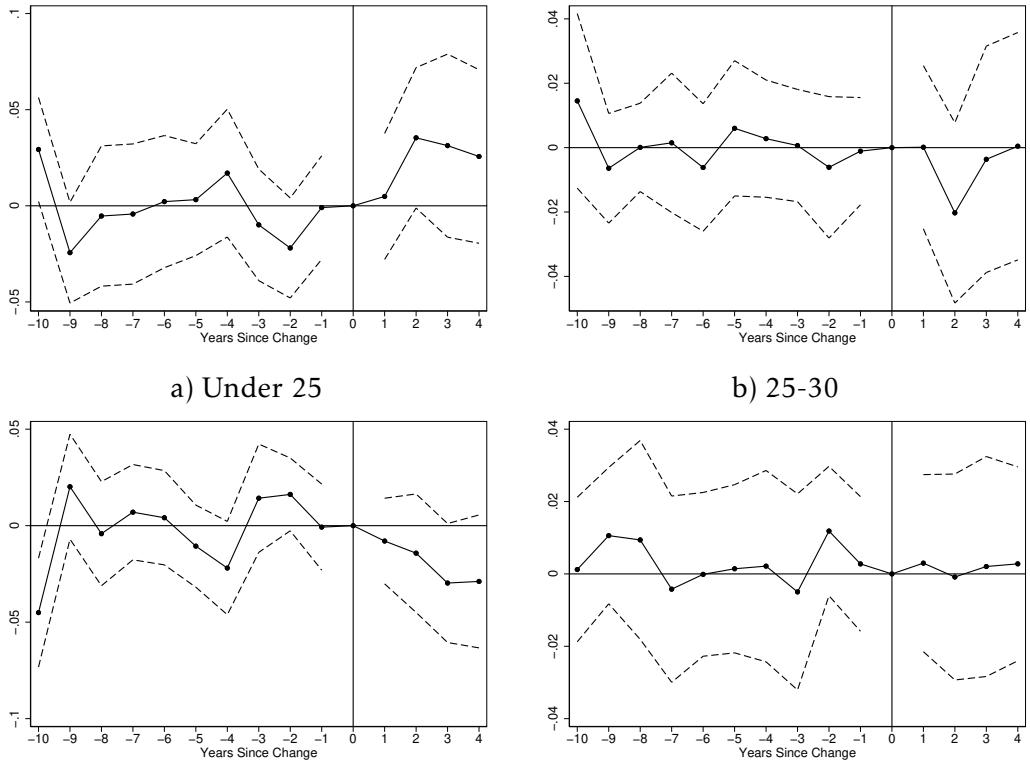
Age Under 25 | Age Over 40 | Mean Age | Male

White | Black | Latino | GPA

Biology GPA | Time to Start | Program Size

Notes. These figures show scatterplots of mean characteristics for each program in 2007 (horizontal axis) and year of implementing evaluative admission (vertical axis). The size of each bubble is proportional to the number of students in the 2007 cohorts. The figures also show a best fit line, weighted by the number of students, and associate 95 percent confidence interval.

Figure A3: Main Results, Age Categories

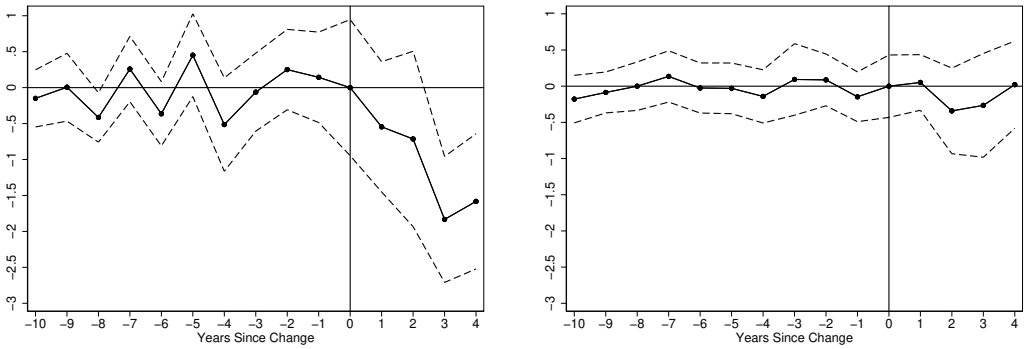


a) Under 25 b) 25-30

c) 30-40 d) 40 and over

Notes. Figures show point estimates and 95 percent confidence intervals of results from regressions of equation 6. Standard errors clustered at the program level.

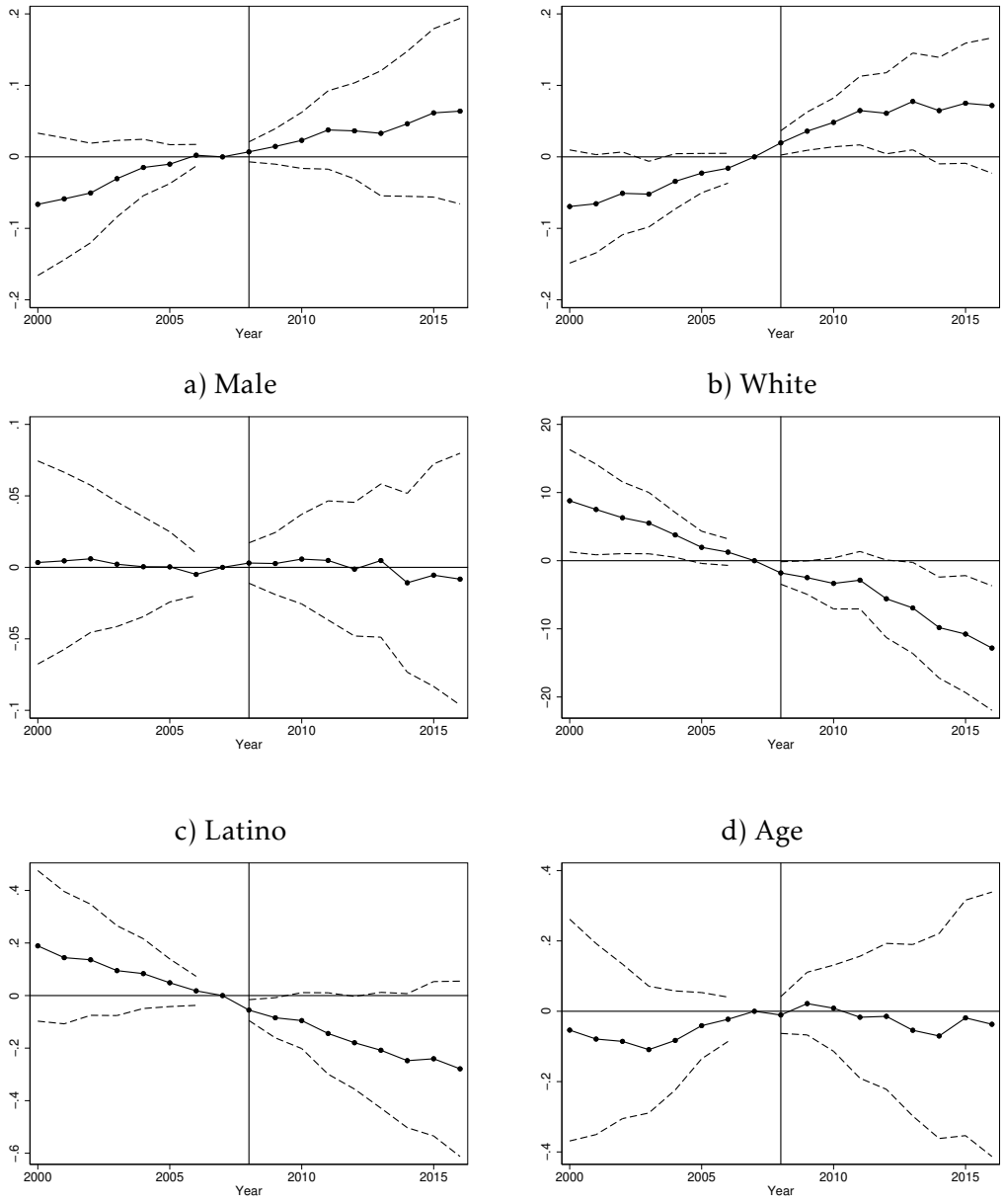
Figure A4: Wait Time, by Previous Admission Type



a) Waitlist b) Lottery and FCFS

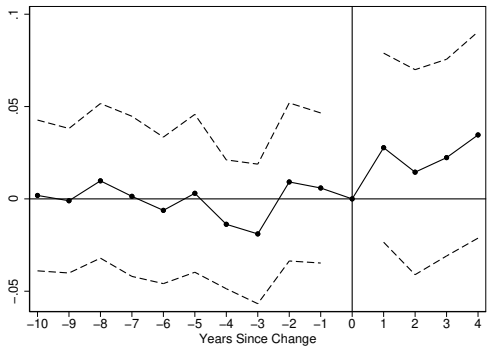
Notes. Figures show point estimates and 95 percent confidence intervals of results from regressions of equation 6. Panel a) consists of programs that had waitlists prior to changing their admissions, while Panel b) consists of programs that had various types of lotteries and first-come-first-served regimes. Standard errors clustered at the program level.

Figure A5: Cohort Characteristics at Colleges with Non-Evaluative Admissions

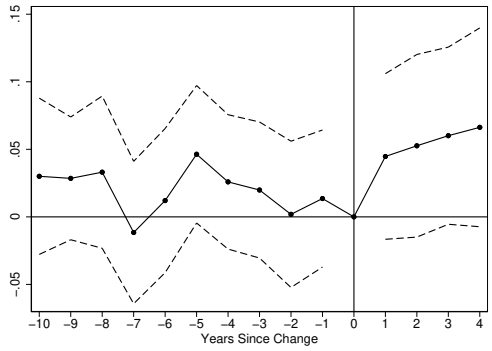


Notes. Figures show point estimates and 95 percent confidence intervals of results from regressions estimating 16 years prior and four year post change of admissions policy. Regressions control for calendar year, program, and program-specific linear time trends. Standard errors clustered at the program level.

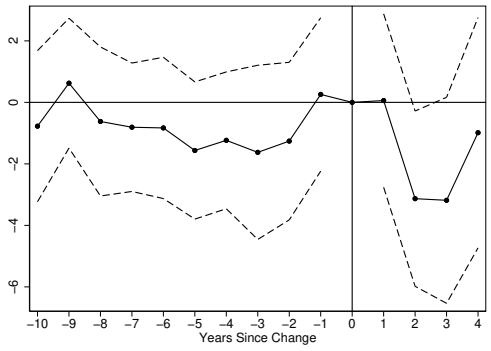
Figure A6: Results Using Two Way Fixed Effects, Academic Background



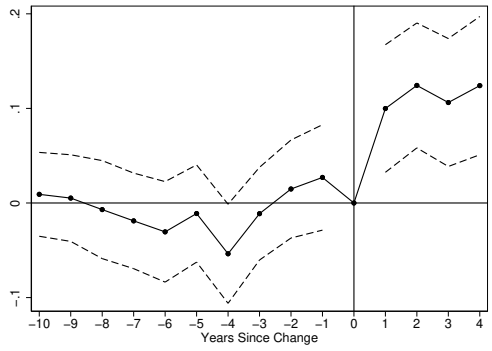
a) GPA



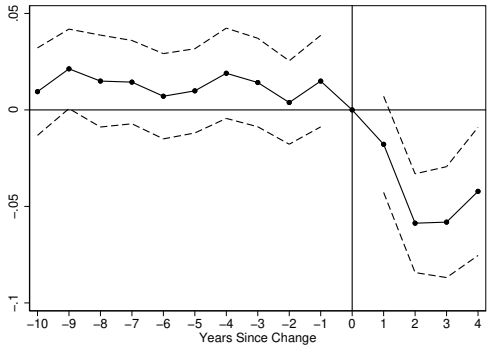
b)Math GPA



c) Units Attempted



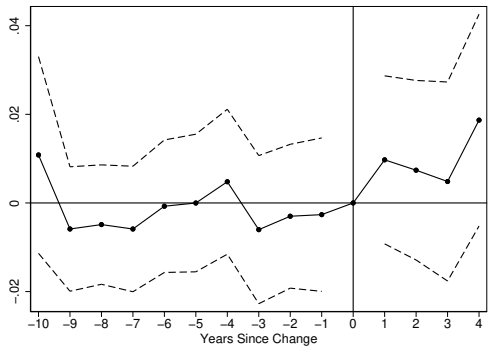
d) Biology GPA



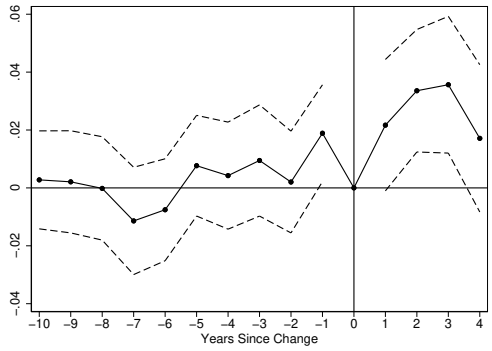
e) Basic Skills Courses

Notes. Figures show point estimates and 95 percent confidence intervals of results from regressions estimating 16 years prior and four year post change of admissions policy. Regressions control for calendar year, program, and program-specific linear time trends. Standard errors clustered at the program level.

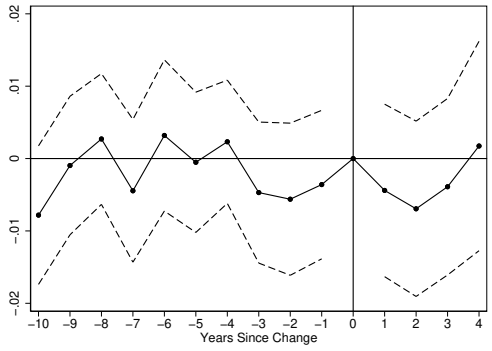
Figure A7: Results Using Two Way Fixed Effects, Demographics



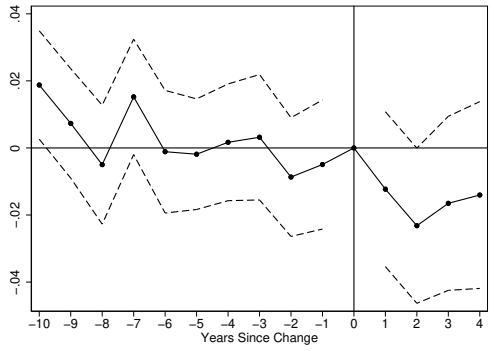
a) Male



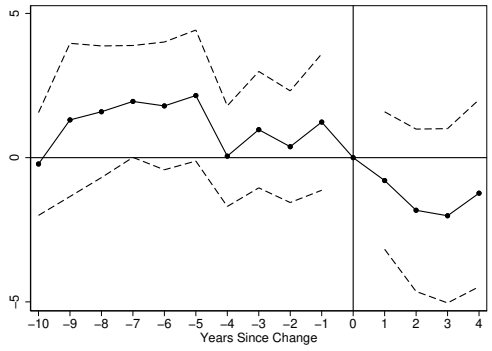
b)White



c) Black



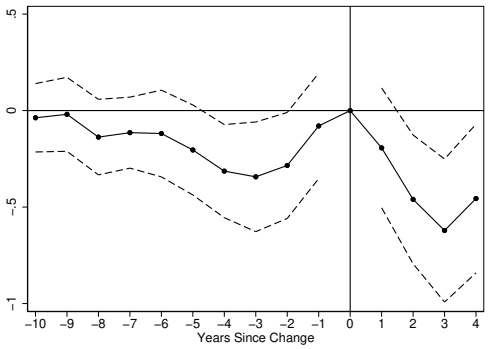
d) Latino



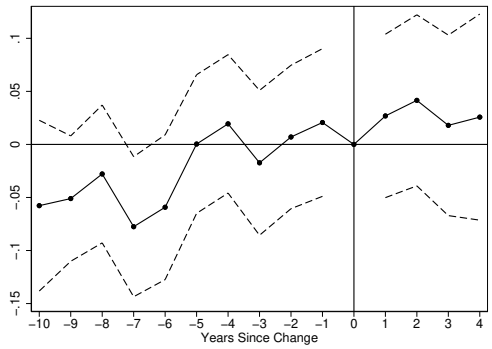
e) Age

Notes. Figures show point estimates and 95 percent confidence intervals of results from regressions estimating 16 years prior and four year post change of admissions policy. Regressions control for calendar year, program, and program-specific linear time trends. Standard errors clustered at the program level.

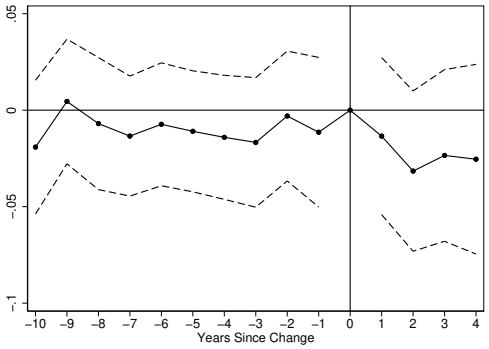
Figure A8: Results Using Two Way Fixed Effects, Outcomes



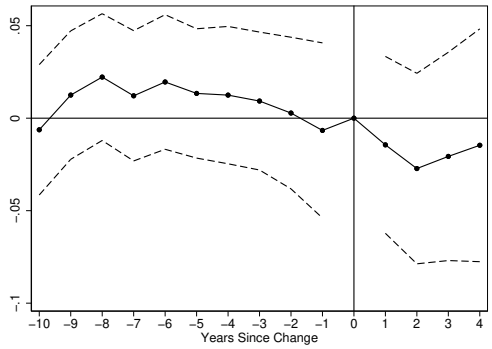
a) Time to Start



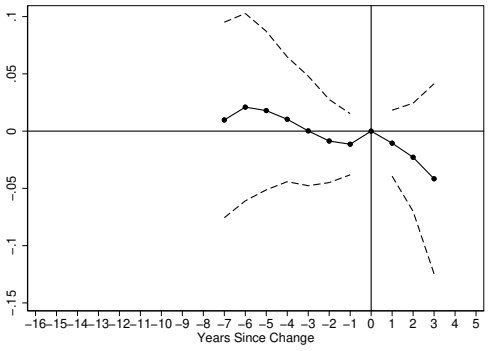
b) First-Year GPA



c) Any Degree



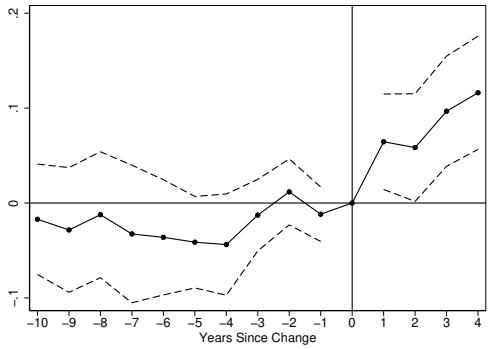
d) Complete ADN



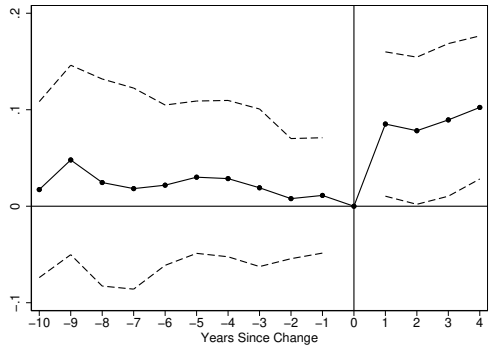
e) NCLEX-RN Pass Rates

Notes. Figures show point estimates and 95 percent confidence intervals of results from regressions estimating 16 years prior and four year post change of admissions policy. Regressions control for calendar year, program, and program-specific linear time trends. Standard errors clustered at the program level.

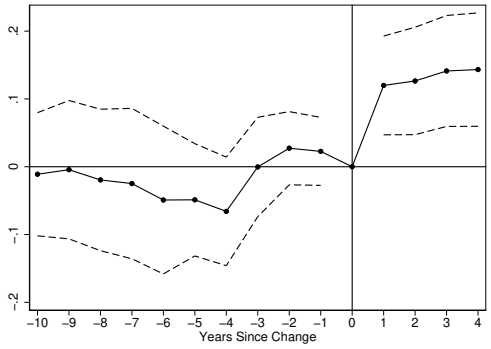
Figure A9: Results Using "Stacked" Approach, Academic Background



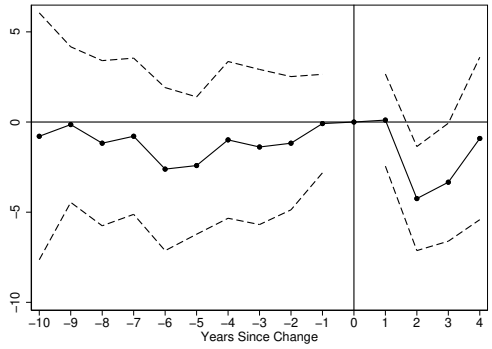
a) GPA



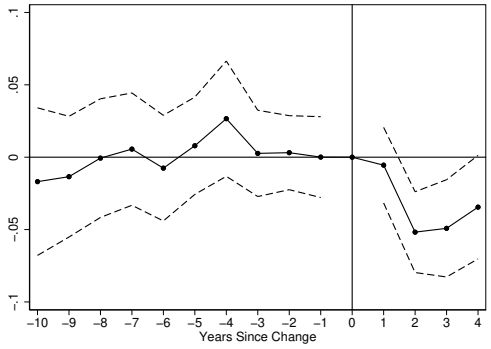
b)Math GPA



c) Biology GPA



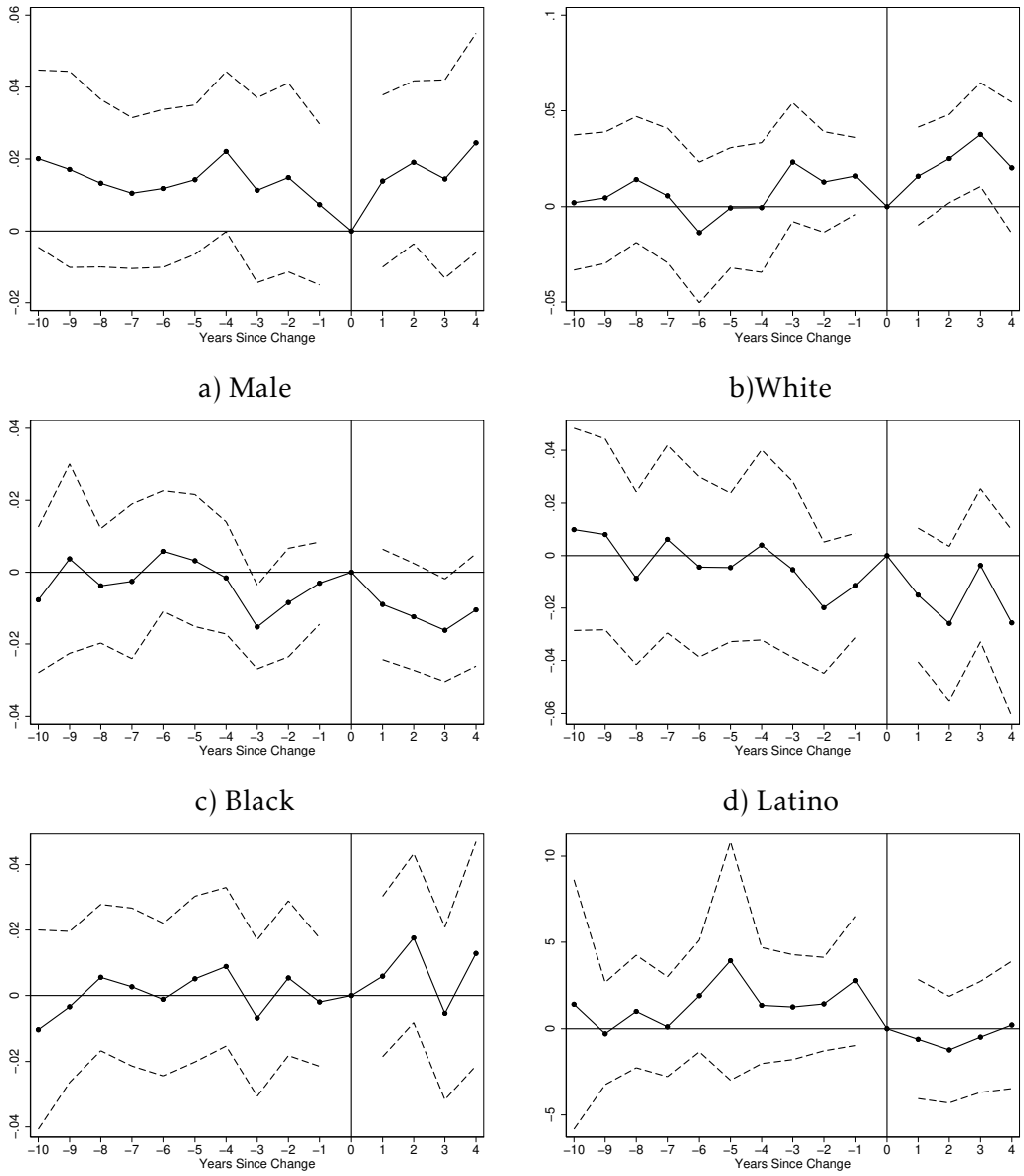
d) Units Attempted



e) Basic Skills Courses

Notes. Figures show point estimates and 95 percent confidence intervals of results from regressions estimating equation 7. Regressions control for calendar year-event and program-event interactions. Standard errors clustered at the program level.

Figure A10: Results Using "Stacked" Approach, Demographics



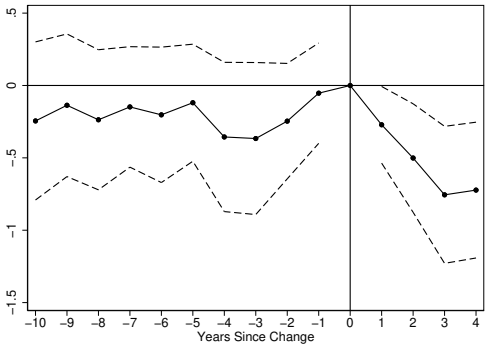
a) Male b)White

c) Black d) Latino

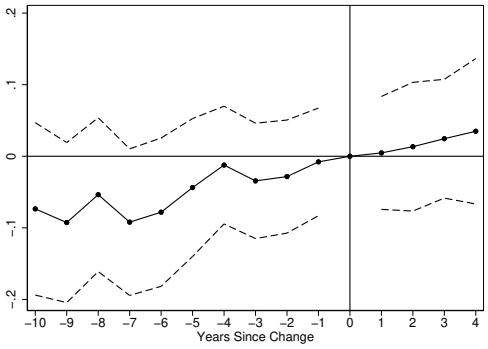
e) Asian f) Age

Notes. Figures show point estimates and 95 percent confidence intervals of results from regressions estimating equation 7. Regressions control for calendar year-event and program-event interactions. Standard errors clustered at the program level.

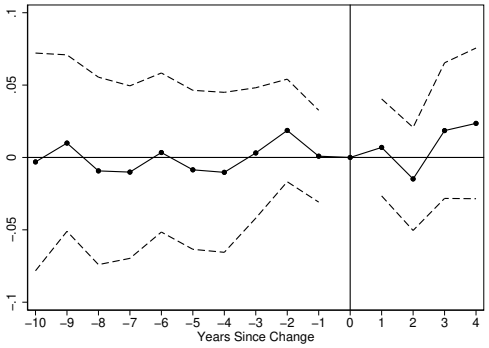
Figure A11: Results Using "Stacked" Approach, Outcomes



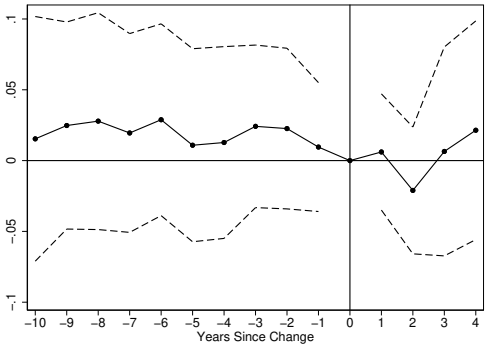
a) Time to Start



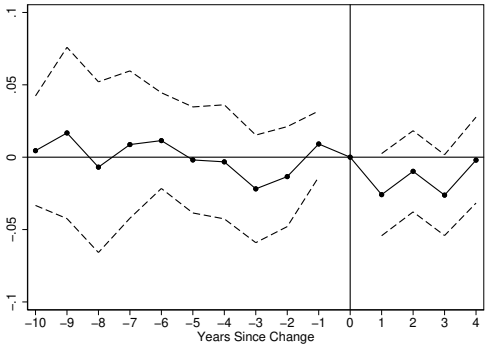
b) First-Year GPA



c) Any Degree



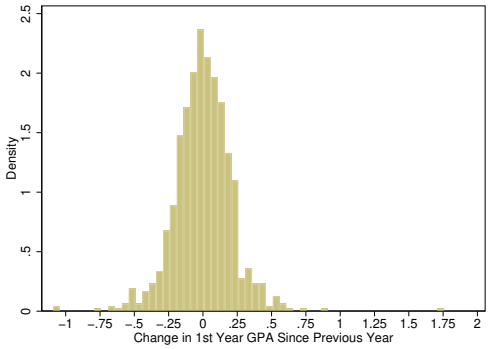
d) Complete ADN



e) NCLEX-RN Pass Rates

Notes. Figures show point estimates and 95 percent confidence intervals of results from regressions estimating equation 7. Regressions control for calendar year-event and program-event interactions. Standard errors clustered at the program level.

Figure A12: Distribution of Year-to-Year Changes in First Year Nursing GPA, pre-2007



Notes. Figure shows distribution of college-level differences from one year to the next in mean GPA of first year nursing courses. Data are included from the 1993 academic year through the 2007 academic year, the year prior to the first change in admissions.

Table A1: Test for Endogeneity of Timing

	(1) Unweighted	(2) Weighted
Male	0.250	-0.459
	(1.880)	(1.742)
White	0.545	0.811
	(0.888)	(0.905)
Black	-0.648	2.091
	(2.336)	(2.332)
Hispanic	-0.868	-1.402
	(1.001)	(1.056)
Asian	-0.648	0.353
	(0.895)	(0.662)
Other Race	1.424	-0.126
	(1.610)	(1.438)
Age	-0.00359***	-0.00348***
	(0.000551)	(0.000590)
GPA	1.268*	1.381*
	(0.468)	(0.528)
GPA in Math	0.447	0.590
	(0.355)	(0.371)
GPA in Biology	0.488	-0.398
	(0.958)	(0.924)
Units Attempted	-0.00864	-0.0122
	(0.0128)	(0.0143)
Basic Skills Courses	0.225	0.759
	(1.038)	(1.028)
Time to Enrollment	-0.0213	0.0344
	(0.140)	(0.170)
Any Degree, 3 Years	-0.171	-0.369
	(0.993)	(1.093)
Any Nursing Degree, 3 Years	0.355	0.297
	(0.931)	(0.946)
Unemployment Rate	-2.679	5.635
	(15.73)	(22.56)
UI Benefits (log)	-0.978*	-0.689
	(0.376)	(0.504)

Notes. Each cell shows results from a regression of year of adoption of evaluative measures on college mean characteristics in 2007, the year prior to the policy change. Column 1 does not weight, while Column 2 weights by the size of the incoming cohort. Standard errors clustered at the program level. $*p < 0.05, **p < 0.01, ***p < 0.001$

Table A2: Main Results, Age Detail

	(1) Under 25	(2) 25-29	(3) 30-39	(4) Over 40
A. Event Study				
Event Year +1	0.00487	0.000127	-0.00797	0.00297
	(0.0167)	(0.0129)	(0.0113)	(0.0125)
Event Year +2	0.0354	-0.0203	-0.0143	-0.000856
	(0.0186)	(0.0143)	(0.0157)	(0.0145)
Event Year +3	0.0313	-0.00362	-0.0297	0.00204
	(0.0243)	(0.0179)	(0.0157)	(0.0155)
Event Year +4	0.0257	0.000444	-0.0289	0.00278
	(0.023)	(0.018)	(0.0176)	(0.0137)
	.	.	.	.
Y-mean	0.328	0.222	0.269	0.181
N	1352	1352	1352	1352
B. Differences in Differences				
Post Change	0.0196	-0.00572	-0.0166	0.00271
	(0.0161)	(0.0127)	(0.0102)	(0.0109)
	.	.	.	.
Y-mean	0.328	0.222	0.269	0.181
N	1352	1352	1352	1352
Y-Mean	0.375	0.223	0.246	0.157
N	254002	254002	254002	254002

Notes. Both panels shows estimates of equation 6. Panel A estimates each post-event change separately, while Panel B is the ATT for all post-event coefficients. Standard errors clustered at the program level. $*p < 0.05, **p < 0.01, ***p < 0.001$

Table A3: Student Background Characteristics and Eventual Degree Attainment, pre-2008 Cohorts

	(1)	(2)	(3)	(4)	(5)	(6)
	Complete ADN Program			Complete Any Degree		
Male	-0.0558***	-0.0438***	-0.0430***	-0.0469***	-0.0403***	-0.0398***
	(0.00965)	(0.00841)	(0.00839)	(0.00659)	(0.00511)	(0.00515)
White	0.0918***	0.0560***	0.0548***	0.0652***	0.0390***	0.0382***
	(0.0180)	(0.00834)	(0.00851)	(0.0117)	(0.00607)	(0.00625)
Black	-0.0226	-0.00488	-0.00375	-0.00824	0.0239**	0.0251**
	(0.0241)	(0.00970)	(0.00906)	(0.0136)	(0.00852)	(0.00841)
Hispanic	0.0477**	0.0147*	0.0149*	0.0372**	0.0232***	0.0240***
	(0.0152)	(0.00621)	(0.00626)	(0.0111)	(0.00670)	(0.00663)
Age	-0.000365	-0.00308***	-0.00320***	0.0000240	-0.00157***	-0.00160***
	(0.000890)	(0.000657)	(0.000662)	(0.000606)	(0.000453)	(0.000454)
GPA	0.0966***	0.0909***	0.0912***	0.163***	0.167***	0.165***
	(0.0157)	(0.0116)	(0.0111)	(0.0118)	(0.00804)	(0.00784)
GPA in Math	0.0209***	0.00990**	0.00829**	0.00491	-0.00290	-0.00315
	(0.00558)	(0.00308)	(0.00277)	(0.00464)	(0.00264)	(0.00260)
GPA in Biology	0.0847***	0.0700***	0.0689***	0.0389***	0.0287***	0.0290***
	(0.00916)	(0.00771)	(0.00722)	(0.00639)	(0.00543)	(0.00524)
Units Taken	0.00267***	0.00121***	0.00109***	0.00528***	0.00442***	0.00436***
	(0.000251)	(0.000170)	(0.000157)	(0.000244)	(0.000221)	(0.000218)
Basic Skills Courses	-0.0470**	-0.0409***	-0.0413***	-0.0354**	-0.0309***	-0.0333***
	(0.0155)	(0.00610)	(0.00622)	(0.0107)	(0.00437)	(0.00441)
Time to Enrollment	0.00624**	0.00545***	0.00522***	0.00272	0.00265*	0.00251*
	(0.00185)	(0.00121)	(0.00114)	(0.00137)	(0.00107)	(0.00107)
N	62423	62423	62423	62423	62423	62423
Y-Mean	0.401	0.401	0.401	0.643	0.643	0.643
R-Squared	0.126	0.295	0.316	0.183	0.254	0.261
Cohort FE	X	X	X	X	X	X
College FE		X	X		X	X
College Trends			X			X

Notes. Table shows results of OLS regressions of student characteristics on completion of an ADN or of any community college program. Regressions also control for the square of age. Standard errors clustered at the program level.
$*p < 0.05, **p < 0.01, ***p < 0.001$

Table A4: Main Results, Academic Background, by Previous Admissions Type

	(1) GPA	(2) Math GPA	(3) Bio GPA	(4) Units	(5) Basic Skills
A. Waitlist					
Post Change	0.0799	0.0366	0.0366	-5.29	-0.0264
	(0.0449)	(0.0581)	(0.0581)	(3.88)	(0.0303)
	.	.	.	.	.
Y-mean	3.03	2.79	2.87	58.7	0.436
N	386	383	382	391	391
B. Lottery and FCFS					
Post Change	0.06*	0.0573	0.0573	-0.672	-0.0306
	(0.0268)	(0.0317)	(0.0317)	(1.73)	(0.0201)
	.	.	.	.	.
Y-mean	3.03	2.83	2.92	59.5	0.479
N	954	951	953	961	961

Notes. All panels shows estimates from regressions estimating the ATT according to equation 5. Panel A consists of programs that had waitlists prior to changing their admissions, while Panel B consists of programs that had various types of lotteries and first-come-first-served regimes. Standard errors clustered at the program level.
$*p < 0.05, **p < 0.01, ***p < 0.001$

Table A5: Main Results, Demographics, by Previous Admissions Type

	(1) Male	(2) White	(3) Black	(4) Latino	(5) Asian	(6) Mean Age
A. Waitlist						
Post Change	0.00101	0.000584	0.0018	0.0271	-0.0206	-3.99
	(0.0175)	(0.0286)	(0.0102)	(0.0213)	(0.0163)	(3.98)
	.	.	.	.	.	.
Y-mean	0.172	0.464	0.0869	0.203	0.101	35.8
N	391	391	391	391	391	391
B. Lottery and FCFS						
Post Change	0.00605	0.00141	-0.00741	-0.0184	0.00933	0.292
	(0.0128)	(0.0183)	(0.00799)	(0.0165)	(0.0102)	(2)
	.	.	.	.	.	.
Y-mean	0.173	0.415	0.0936	0.253	0.11	33.7
N	961	961	961	961	961	961

Notes. All panels shows estimates from regressions estimating the ATT according to equation 5. Panel A consists of programs that had waitlists prior to changing their admissions, while Panel B consists of programs that had various types of lotteries and first-come-first-served regimes. Standard errors clustered at the program level.
$*p < 0.05, **p < 0.01, ***p < 0.001$

Table A6: Main Results, Outcomes, by Previous Admissions Type

	(1) Wait Time	(2) First-Year GPA	(3) Any Degree	(4) Finish ADN	(5) Pass NCLEX
A. Waitlist					
Post Change	-0.959**	0.0668	-0.0559	-0.0875	-0.0122
	(0.351)	(0.0822)	(0.0448)	(0.0448)	(0.0231)
	.	.	.	.	.
Y-mean	6.36	3.05	0.622	0.463	0.875
N	391	385	391	391	257
B. Lottery and FCFS					
Post Change	-0.0683	0.0386	0.00388	-0.00478	-0.0216
	(0.222)	(0.0553)	(0.0227)	(0.0317)	(0.0155)
	.	.	.	.	.
Y-mean	5.78	3.05	0.603	0.409	0.881
N	961	959	961	961	693

Notes. All panels shows estimates from regressions estimating the ATT according to equation 5. Panel A consists of programs that had waitlists prior to changing their admissions, while Panel B consists of programs that had various types of lotteries and first-come-first-served regimes. Standard errors clustered at the program level.
$*p < 0.05, **p < 0.01, ***p < 0.001$

Table A7: Results using Two-Way Fixed Effects, Academic Background

	(1) GPA	(2) Math GPA	(3) Bio GPA	(4) Units	(5) Basic Skills
A. Event Study					
Event Year +1	0.0250	0.0356	0.100**	-0.210	-0.0218
	(0.0258)	(0.0304)	(0.0336)	(1.398)	(0.0125)
Event Year +2	0.0123	0.0453	0.127***	-3.398*	-0.0620***
	(0.0279)	(0.0335)	(0.0330)	(1.414)	(0.0129)
Event Year +3	0.0215	0.0549	0.113***	-3.503*	-0.0610***
	(0.0269)	(0.0325)	(0.0339)	(1.670)	(0.0144)
Event Year +4	0.0361	0.0640	0.136***	-1.276	-0.0446**
	(0.0281)	(0.0365)	(0.0363)	(1.864)	(0.0166)
F-test: pre-years	0.485	0.545	1.643	0.779	0.440
p-value: pre-years	0.901	0.859	0.088	0.649	0.927
F-test: post-years	0.489	0.886	4.523	2.502	7.285
p-value: post-years	0.744	0.471	0.001	0.040	0.000
B. Differences in Differences					
Post Change	0.0231	0.0424	0.115***	-1.916	-0.0430***
	(0.0219)	(0.0270)	(0.0284)	(1.215)	(0.0110)
Y-Mean	3.006	2.762	2.958	63.290	0.490
N	232372	143125	158185	254335	254335

Notes. Both panels shows estimates from regressions estimating 16 years prior and four year post change of admissions policy. Regressions control for calendar year, program, and program-specific linear time trends. Panel A estimates each post-event change separately, while Panel B constrains all post-event coefficients to be equivalent. The F-tests are a test that all the pre-event or post-event coefficients are jointly zero. Standard errors clustered at the program level.
$*p < 0.05, **p < 0.01, ***p < 0.001$

Table A8: Results using Two-Way Fixed Effects, Demographics

	(1) Male	(2) White	(3) Black	(4) Latino	(5) Mean Age
A. Event Study					
Event Year +1	0.00675	0.0187	-0.00508	-0.0126	-0.511
	(0.00941)	(0.0107)	(0.00573)	(0.0114)	(1.212)
Event Year +2	0.00808	0.0269*	-0.00652	-0.0208	-1.558
	(0.0101)	(0.0106)	(0.00564)	(0.0114)	(1.428)
Event Year +3	0.00435	0.0351**	-0.00449	-0.0145	-1.784
	(0.0110)	(0.0119)	(0.00610)	(0.0128)	(1.526)
Event Year +4	0.0240*	0.0141	-0.00163	-0.00543	-1.028
	(0.0117)	(0.0122)	(0.00664)	(0.0147)	(1.627)
F-test: pre-years	0.694	1.057	0.859	1.546	1.508
p-value: pre-years	0.731	0.392	0.571	0.117	0.130
F-test: post-years	1.279	2.833	0.482	1.005	0.485
p-value: post-years	0.276	0.023	0.749	0.404	0.747
B. Differences in Differences					
Post Change	0.00883	0.0234**	-0.00520	-0.0149	-1.029
	(0.00836)	(0.00863)	(0.00484)	(0.00971)	(1.110)
Y-Mean	0.199	0.362	0.073	0.249	33.677
N	254335	254335	254335	254335	254002

Notes. Both panels shows estimates from regressions estimating 16 years prior and four year post change of admissions policy. Regressions control for calendar year, program, and program-specific linear time trends. Panel A estimates each post-event change separately, while Panel B constrains all post-event coefficients to be equivalent. The F-tests are a test that all the pre-event or post-event coefficients are jointly zero. Standard errors clustered at the program level.
$*p < 0.05, **p < 0.01, ***p < 0.001$

Table A9: Results using Two-Way Fixed Effects, Outcomes

	(1) Wait Time	(2) First-Year GPA	(3) Any Degree	(4) Finish ADN
A. Event Study				
Event Year +1	-0.186	0.0284	-0.0124	-0.0176
	(0.152)	(0.0381)	(0.0206)	(0.0241)
Event Year +2	-0.453**	0.0423	-0.0301	-0.0306
	(0.164)	(0.0399)	(0.0209)	(0.0259)
Event Year +3	-0.617***	0.0173	-0.0217	-0.0246
	(0.183)	(0.0421)	(0.0224)	(0.0283)
Event Year +4	-0.445*	0.0235	-0.0214	-0.0179
	(0.190)	(0.0483)	(0.0248)	(0.0315)
F-test: pre-years	1.339	1.472	0.418	0.403
p-value: pre-years	0.203	0.143	0.939	0.946
F-test: post-years	3.444	0.335	0.537	0.380
p-value: post-years	0.008	0.855	0.708	0.823
B. Differences in Differences				
Post Change	-0.370**	0.0295	-0.0204	-0.0228
	(0.133)	(0.0337)	(0.0177)	(0.0214)
Y-Mean	7.015	3.055	0.547	0.351
N	254002	183400	254335	254335

Notes. Both panels shows estimates from regressions estimating 16 years prior and four year post change of admissions policy. Regressions control for calendar year, program, and program-specific linear time trends. Panel A estimates each post-event change separately, while Panel B constrains all post-event coefficients to be equivalent. The F-tests are a test that all the pre-event or post-event coefficients are jointly zero. Standard errors clustered at the program level.
$*p < 0.05, **p < 0.01, ***p < 0.001$

Table A10: Results Using "Stacked" Approach, Academic Background

	(1) GPA	(2) Math GPA	(3) Bio GPA	(4) Units	(5) Basic Skills
A. Event Study					
Event Year +1	0.0646*	0.0852*	0.120**	0.107	-0.00550
	(0.0251)	(0.0374)	(0.0364)	(1.277)	(0.0131)
Event Year +2	0.0585*	0.0783*	0.127**	-4.245**	-0.0518***
	(0.0284)	(0.0381)	(0.0396)	(1.443)	(0.0140)
Event Year +3	0.0968***	0.0895*	0.141***	-3.338*	-0.0491**
	(0.0290)	(0.0395)	(0.0409)	(1.636)	(0.0168)
Event Year +4	0.116***	0.102**	0.143***	-0.910	-0.0345
	(0.0298)	(0.0371)	(0.0418)	(2.253)	(0.0179)
F-test: pre-years	1.428	0.330	0.988	0.571	0.975
p-value: pre-years	0.162	0.973	0.452	0.838	0.463
F-test: post-years	3.915	2.326	3.715	5.696	4.600
p-value: post-years	0.004	0.054	0.005	0.000	0.001
N	19467	19457	19455	19481	19481
B. Differences in Differences					
Post Change	0.0825***	0.0883**	0.132***	-2.094	-0.0347**
	(0.0229)	(0.0317)	(0.0344)	(1.243)	(0.0117)
N	19467	19457	19455	19481	19481
Y-mean	3.047	2.806	2.996	70.448	0.507

Notes. Both panels shows estimates from regressions estimating equation 7. Regressions control for calendar year-event and program-event interactions. Panel A estimates each post-event change separately, while Panel B constrains all post-event coefficients to be equivalent. Standard errors clustered at the program level.
$*p < 0.05, **p < 0.01, ***p < 0.001$

Table A11: Results Using "Stacked" Approach, Demographics

	(1) Male	(2) White	(3) Black	(4) Latino	(5) Asian	(6) Other Race	Mean Ag
A. Event Study							
Event Year +1	0.0139	0.0159	-0.00897	-0.0150	0.00589	0.00227	-0.608
	(0.0120)	(0.0128)	(0.00769)	(0.0128)	(0.0122)	(0.0169)	(1.721)
Event Year +2	0.0191	0.0251*	-0.0124	-0.0259	0.0176	-0.00436	-1.223
	(0.0113)	(0.0115)	(0.00745)	(0.0147)	(0.0129)	(0.0124)	(1.541)
Event Year +3	0.0145	0.0376**	-0.0162*	-0.00374	-0.00540	-0.0123	-0.482
	(0.0138)	(0.0135)	(0.00715)	(0.0146)	(0.0132)	(0.0138)	(1.604)
Event Year +4	0.0245	0.0202	-0.0105	-0.0257	0.0129	0.00307	0.214
	(0.0153)	(0.0171)	(0.00784)	(0.0177)	(0.0171)	(0.0168)	(1.842)
F-test: pre-years	0.610	0.982	1.846	1.347	1.112	1.992	0.736
p-value: pre-years	0.806	0.457	0.049	0.200	0.349	0.031	0.691
F-test: post-years	0.878	2.692	1.495	1.122	1.182	1.072	0.233
p-value: post-years	0.476	0.030	0.201	0.344	0.317	0.369	0.920
N	19481	19481	19481	19481	19481	19481	19481
B. Differences in Differences							
Post Change	0.0178	0.0245*	-0.0120	-0.0175	0.00777	-0.00281	-0.551
	(0.0108)	(0.00983)	(0.00667)	(0.0121)	(0.0108)	(0.0130)	(1.253)
N	19481	19481	19481	19481	19481	19481	19481
Y-mean	0.190	0.385	0.079	0.288	0.128	0.121	35.110

Notes. Both panels shows estimates from regressions estimating equation 7. Regressions control for calendar year-event and program-event interactions. Panel A estimates each post-event change separately, while Panel B constrains all post-event coefficients to be equivalent. Standard errors clustered at the program level. $*p < 0.05, **p < 0.01, ***p < 0.001$

Table A12: Results Using "Stacked" Approach, Outcomes

	(1) Wait Time	(2) First-Year GPA	(3) Any Degree	(4) Finish ADN	(5) Pass NCLEX
A. Event Study					
Event Year +1	-0.272*	0.00469	0.00693	0.00609	-0.0259
	(0.132)	(0.0394)	(0.0167)	(0.0205)	(0.0142)
Event Year +2	-0.501**	0.0134	-0.0148	-0.0211	-0.00975
	(0.187)	(0.0450)	(0.0178)	(0.0224)	(0.0140)
Event Year +3	-0.755**	0.0245	0.0186	0.00646	-0.0262
	(0.237)	(0.0415)	(0.0234)	(0.0369)	(0.0140)
Event Year +4	-0.723**	0.0349	0.0235	0.0214	-0.00201
	(0.235)	(0.0508)	(0.0260)	(0.0386)	(0.0148)
F-test: pre-years	0.659	1.153	0.677	0.401	0.956
p-value: pre-years	0.763	0.318	0.747	0.947	0.480
F-test: post-years	3.294	0.159	1.052	0.896	2.052
p-value: post-years	0.011	0.959	0.379	0.466	0.085
N	19481	19372	19481	19481	15931
B. Differences in Differences					
Post Change	-0.551***	0.0186	0.00787	0.00260	-0.0162
	(0.158)	(0.0357)	(0.0163)	(0.0222)	(0.0120)
N	19481	19372	19481	19481	15931
Y-mean	7.651	3.011	0.641	0.457	0.888

Notes. Both panels shows estimates from regressions estimating equation 7. Regressions control for calendar year-event and program-event interactions. Panel A estimates each post-event change separately, while Panel B constrains all post-event coefficients to be equivalent. Standard errors clustered at the program level. $*p < 0.05, **p < 0.01, ***p < 0.001$