Supplemental Information Social Class and Representation in American Cities

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November 30, 2019

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A Validity of the RDD

The "no sorting" assumption is the key identifying assumption of the RDD—that potential outcomes are smooth across the discontinuity. I tested the validity of the assumption in several ways. After examining the distribution of the rating variable, which is displayed in Figure A.1, I tested the density of the rating variable at the threshold per McCrary (2008) and failed to reject the null hypothesis of no sorting (log difference in heights is 0.009 with SE 0.183; p = 0.962). Finally, I also conducted a series of placebo tests. I used local linear regression models similar to those described in the main text but substituted several pre-treatment covariates as dependent variables to check for a discontinuity at the cutpoint in the rating variable. Covariates include population, the percent of the population that is white, the level of unemployment, the home ownership rate, median household income and an indicator for mayor-council form of government. I also analyze several lagged dependent variables. The results are displayed in Tables A.1and A.2 and provide support for the validity of the RDD. In each model, the coefficient for Profit-oriented Mayor fails to reach statistical significance, suggesting covariates are not discontinuous at the threshold.



Figure A.1: Distribution of the forcing variable

Dependent Variable	Coefficient	Std. Error	p-value	Bandwidth					
Optimal Bane	dwidth								
Total Revenue (per capita, lagged)	-64.795	220.725	0.769	0.087					
Total Own-Source Revenue (per capita, lagged)	-53.263	159.394	0.739	0.077					
Total Taxes (per capita, lagged)	35.261	82.289	0.669	0.092					
Property Tax (per capita, lagged)	74.099	63.764	0.246	0.090					
Sales Tax (per capita, lagged)	-46.812	28.664	0.104	0.085					
Charges & Misc. Revenue (per capita, lagged)	-55.27	42.522	0.195	0.083					
Total Expenditures (per capita, lagged)	-24.107	220.502	0.913	0.085					
Housing & Community Development (per capita, lagged)	-3.383	16.004	0.833	0.070					
Welfare (per capita, lagged)	31.857	21.91	0.147	0.115					
Municipal Form	0.019	0.127	0.884	0.073					
Population (logged)	0.039	0.114	0.732	0.090					
Percent White	0.032	0.116	0.781	0.087					
Unemployment Rate	0.019	0.124	0.876	0.075					
Median Household Income (logged)	0.019	0.126	0.883	0.073					
Median House Value (logged)	0.061	0.109	0.577	0.101					
Home Ownership Rate	0.018	0.127	0.885	0.073					
5% Bandwidth									
Total Revenue (per capita, lagged)	17.754	245.629	0.942	0.050					
Total Own-Source Revenue (per capita, lagged)	-12.758	173.208	0.941	0.050					
Total Taxes (per capita, lagged)	109.615	94.266	0.247	0.050					
Property Tax (per capita, lagged)	134.791	79.056	0.09	0.050					
Sales Tax (per capita, lagged)	-50.4	34.559	0.147	0.050					
Charges & Misc. Revenue (per capita, lagged)	-74.451	49.815	0.137	0.050					
Total Expenditures (per capita, lagged)	103.636	236.993	0.662	0.050					
Housing & Community Development (per capita, lagged)	-6.523	16.717	0.697	0.050					
Welfare (per capita, lagged)	36.141	24.436	0.141	0.050					
Municipal Form	-0.08	0.155	0.607	0.050					
Population (logged)	-0.258	0.242	0.287	0.050					
Percent White	3.911	4.558	0.392	0.050					
Unemployment Rate	-1.262	1.156	0.278	0.050					
Median Household Income (logged)	0.036	0.079	0.649	0.050					
Median House Value (logged)	-0.172	0.146	0.242	0.050					
Home Ownership Rate	2.751	2.93	0.349	0.050					

Table A.1: Covariate continuity tests

Note: Estimated using local linear regression. Robust standard errors reported. Optimal bandwidths calculated per Calonico, Cattaneo and Titiunik (2014) using the rdrobust package for R.

Dependent Variable	Coefficient	p-value	Confidence Interval	Bandwidth
Total Revenue (per capita, lagged)	-64.795	0.66	[-601.34, 381.025]	0.087
Total Own-Source Revenue (per capita, lagged)	-53.263	0.638	[-449.452, 275.419]	0.077
Total Taxes (per capita, lagged)	35.261	0.618	[-137.77, 231.784]	0.092
Property Tax (per capita, lagged)	74.099	0.276	[-64.776, 226.636]	0.09
Sales Tax (per capita, lagged)	-46.812	0.191	[-111.591, 22.275]	0.085
Charges & Misc. Revenue (per capita, lagged)	-55.27	0.21	[-162.388, 35.687]	0.083
Total Expenditures (per capita, lagged)	-24.107	0.825	[-534.679, 426.038]	0.085
Housing & Community Development (per capita, lagged)	-3.383	0.702	[-43.645, 29.381]	0.07
Welfare (per capita, lagged)	31.857	0.189	[-15.89, 80.528]	0.115
Municipal Form	0.019	0.929	[-0.326, 0.297]	0.073
Population (logged)	-0.19	0.46	[-0.672, 0.304]	0.09
Percent White	3.969	0.289	[-3.609, 12.131]	0.087
Unemployment Rate	-0.554	0.401	[-2.869, 1.147]	0.075
Median Household Income (logged)	0.022	0.596	[-0.108, 0.188]	0.073
Median House Value (logged)	-0.131	0.205	[-0.401, 0.086]	0.101
Home Ownership Rate	3.216	0.189	[-1.918, 9.701]	0.073

Table A.2: Covariate continuity tests

Note: Coefficients and bias-corrected confidence intervals estimated using local linear regression with the rdrobust package for R.

B Results

Table B.3 provides details on the results presented in Figures 6, 8, and 10 of the main text. Table B.4 presents these results estimated using the rdrobust package in R to generate bias-corrected confidence intervals per Calonico, Cattaneo and Titiunik (2014).

Dependent	Point	Std.				
Variable	Estimate	Error	p-value	Bandwidth	n	
Total Revenue	73.87	75.16	0.327	0.050	160	5% Bandwidth
Own-source Revenue	89.33	72.43	0.219	0.050	160	5% Bandwidth
Total Taxes	-15.62	28.72	0.587	0.050	160	5% Bandwidth
Property Tax	14.09	22.78	0.537	0.050	160	5% Bandwidth
Sales Tax	-15.14	13.94	0.279	0.050	160	5% Bandwidth
Total Charges	22.06	14.80	0.138	0.050	160	5% Bandwidth
Total Expenditure	115.96	93.54	0.217	0.050	160	5% Bandwidth
Housing & Community Development	-3.23	12.38	0.794	0.050	147	5% Bandwidth
Welfare	0.08	4.96	0.987	0.050	160	5% Bandwidth
Total Revenue	72.08	72.49	0.322	0.054	170	CCT Optimal Bandwidth
Own-source Revenue	89.51	67.91	0.189	0.056	175	CCT Optimal Bandwidth
Total Taxes	-6.81	21.91	0.756	0.081	253	CCT Optimal Bandwidth
Property Tax	16.31	18.99	0.391	0.073	230	CCT Optimal Bandwidth
Sales Tax	-8.00	8.17	0.328	0.124	371	CCT Optimal Bandwidth
Total Charges	10.91	14.26	0.445	0.062	193	CCT Optimal Bandwidth
Total Expenditure	98.64	79.72	0.218	0.063	195	CCT Optimal Bandwidth
Housing & Community Development	2.62	10.42	0.802	0.074	224	CCT Optimal Bandwidth
Welfare	-4.68	5.24	0.372	0.110	339	CCT Optimal Bandwidth

Table B.3: Main Results

Note: The table provides details on results of local linear regression models with robust standard errors. All models include the following covariates: population(logged), median household income (constant dollars, logged), median house value (constant dollars, logged), share of population that is white, and the value of the dependent variable measured the year before the mayoral election.

Table B.4: Main Results with Bias-Corrected Confidence Intervals

Dependent Variable	Coefficient	p-value	Confidence Interval	Bandwidth	n
Total Revenue	72.077	0.227	[-58.691, 247.513]	0.054	170
Own-source Revenue	89.513	0.118	[-28.201, 250.51]	0.056	175
Total Taxes	-6.814	0.814	[-58.725, 46.125]	0.081	253
Property Tax	16.306	0.346	[-22.403, 63.821]	0.073	230
Sales Tax	-8.003	0.399	[-28.319, 11.269]	0.124	371
Total Charges	10.911	0.228	[-9.94, 41.634]	0.062	193
Total Expenditure	98.644	0.174	[-54.409, 300.662]	0.063	195
Housing & Community Development	2.623	0.839	[-19.481, 24]	0.074	224
Welfare	-4.682	0.395	[-19.854, 7.84]	0.110	339

 $\it Note:$ Coefficients and bias-corrected confidence intervals estimated using local linear regression with the rdrobust package for R.

C Alternative Coding of Occupations

This section includes RDD results from analyses that use an alternative coding scheme to categorize occupations. In the main results presented in the text, profit-oriented occupations include business owner or executive, business employee, farm owner or manager, and technical professional. Table C.5 presents estimates of the effect of electing a profit-oriented candidate where attorneys are included in the profit-oriented occupation category. These estimates come from covariate-adjusted local linear regression models identical to those used to produce the main results. Covariates include city population(logged), median household income (constant dollars, logged), median house value (constant dollars, logged), share of population that is white, and the value of the dependent variable measured the year before the mayoral election. Table C.6 presents analogous results from the same covariate-adjusted RDD specifications but incorporates second alternative coding of the profit-oriented occupation category where attorney is included but technical professional is instead classified as not-for-profit occupation.

Substantively, the results using both alternative coding schemes are quite similar to the main results (included in B.3 above). In most cases, point estimates have the same sign and are similar in magnitude. Perhaps the most noteworthy difference that emerges from the alternative coding of the profit-oriented occupations involves sales tax. Using either alternative coding option generates a negative effect of electing a profit-oriented candidate on sales tax, and these estimates are statistically significant at the 90% level. Depending on the bandwidth and coding scheme, the effect size ranges from -\$17.98 (SE 9.20) to -\$30.88 (SE 15.93).

Dependent	Point	Std.				
Variable	Estimate	Error	<i>p</i> -value	Bandwidth	n	
Total Revenue	83.82	83.18	0.316	0.050	131	5% Bandwidth
Own-source Revenue	135.05	79.74	0.093	0.050	131	5% Bandwidth
Total Taxes	1.51	36.72	0.967	0.050	131	5% Bandwidth
Property Tax	20.16	32.37	0.535	0.050	131	5% Bandwidth
Sales Tax	-30.88	15.93	0.055	0.050	131	5% Bandwidth
Total Charges	8.43	14.72	0.568	0.050	131	5% Bandwidth
Total Expenditure	-65.76	80.50	0.416	0.050	131	5% Bandwidth
Housing & Community Development	6.51	13.89	0.640	0.050	130	5% Bandwidth
Welfare	-12.65	11.40	0.269	0.050	131	5% Bandwidth
Total Revenue	35.65	63.21	0.573	0.077	197	CCT Optimal Bandwidth
Own-source Revenue	102.16	67.41	0.132	0.062	158	CCT Optimal Bandwidth
Total Taxes	-0.21	27.12	0.994	0.082	208	CCT Optimal Bandwidth
Property Tax	11.50	24.12	0.634	0.079	201	CCT Optimal Bandwidth
Sales Tax	-27.25	14.34	0.059	0.058	151	CCT Optimal Bandwidth
Total Charges	-6.95	13.56	0.609	0.078	199	CCT Optimal Bandwidth
Total Expenditure	-70.11	67.58	0.301	0.080	201	CCT Optimal Bandwidth
Housing & Community Development	4.91	10.15	0.629	0.097	237	CCT Optimal Bandwidth
Welfare	-13.88	8.83	0.118	0.081	204	CCT Optimal Bandwidth

Table C.5: Main Results - Alternative Occupation Coding

Note: The table provides details on results of local linear regression models with robust standard errors. All models include the following covariates: population(logged), median household income (constant dollars, logged), median house value (constant dollars, logged), share of population that is white, and the value of the dependent variable measured the year before the mayoral election.

Dependent	Point	Std.				
Variable	Estimate	Error	p-value	Bandwidth	n	
Total Revenue	84.22	84.97	0.323	0.050	160	5% Bandwidth
Own-source Revenue	86.83	64.20	0.178	0.050	160	5% Bandwidth
Total Taxes	-16.93	31.55	0.592	0.050	160	5% Bandwidth
Property Tax	-6.97	28.45	0.807	0.050	160	5% Bandwidth
Sales Tax	-20.16	11.06	0.070	0.050	160	5% Bandwidth
Total Charges	6.30	14.67	0.668	0.050	160	5% Bandwidth
Total Expenditure	11.94	129.75	0.927	0.050	160	5% Bandwidth
Housing & Community Development	7.27	11.39	0.525	0.050	155	5% Bandwidth
Welfare	-6.42	10.02	0.523	0.050	160	5% Bandwidth
Total Revenue	49.60	60.83	0.416	0.090	275	CCT Optimal Bandwidth
Own-source Revenue	32.33	45.98	0.483	0.082	252	CCT Optimal Bandwidth
Total Taxes	-25.35	21.49	0.239	0.106	320	CCT Optimal Bandwidth
Property Tax	-15.13	19.47	0.438	0.104	313	CCT Optimal Bandwidth
Sales Tax	-17.98	9.20	0.052	0.074	235	CCT Optimal Bandwidth
Total Charges	-3.70	12.25	0.763	0.072	229	CCT Optimal Bandwidth
Total Expenditure	8.11	86.47	0.925	0.093	284	CCT Optimal Bandwidth
Housing & Community Development	2.97	9.54	0.756	0.077	234	CCT Optimal Bandwidth
Welfare	-7.31	7.82	0.351	0.086	262	CCT Optimal Bandwidth

Table C.6: Main Results - Alternative Occupation Coding

Note: The table provides details on results of local linear regression models with robust standard errors. All models include the following covariates: population(logged), median household income (constant dollars, logged), median house value (constant dollars, logged), share of population that is white, and the value of the dependent variable measured the year before the mayoral election.

D Shorter and Longer Term Effects of Electing Profit-Oriented Candidates

Figure D.2 presents RDD results using outcome variables measured in multiple years. The horizontal axis indicates the effect size, and year indicators are on the vertical axis—1st year indicates an outcome measured in the first year after the mayoral election, 2nd year indicates the second year after the election (the results presented in the main text), 3rd year indicates the third year post-election, and so on. The points indicate estimates from covariate-adjusted local linear regression models (analogous to those used throughout the paper). All specifications include the following covariates: population(logged), median household income (constant dollars, logged), median house value (constant dollars, logged), share of population that is white, and the value of the dependent variable measured the year before the mayoral election.



Figure D.2: Effect of Electing a Profit-Oriented Candidate Over Time

References

- Calonico, Sebastian, Matias D. Cattaneo and Rocio Titiunik. 2014. "Robust Nonparametric Confidence Intervals for Regression-Discontinuity Designs." *Econometrica* 82(6):2295–2326.
- McCrary, Justin. 2008. "Manipulation of the Running Variable in the Regression Discontinuity Design: A Density Test." *Journal of Econometrics* 142(2):698–714.