# A Online Appendix for "Does Banning the Box Help Ex-Offenders Get Jobs? Evaluating the Effects of a Prominent Example"

## A.1 Proof that $\xi_D$ falls between $\xi_n$ and $\xi_p$

After some manipulation, the derivative of $\xi_D$ with respect to $s_D$ can be expressed as:

$$\frac{d\xi_D}{ds_D} = \frac{\mu_n(1-\lambda_n)\lambda_p - \mu_p(1-\lambda_p)\lambda_n + (p+\delta)(\lambda_n - \lambda_p)}{[(1-s_D)\lambda_n + s_D\lambda_p]^2}$$

The sign of the numerator is the same as the sign of $\xi_p - \xi_n$. if $s_D = 0$, $\xi_D = \xi_n$. Hence if $\xi_n < \xi_p$, $\xi_D$ is monotonically increasing in $s_D$ until $s_D = 1$ and $\xi_D = \xi_p$. The opposite case for $\xi_n > \xi_p$ is analogous.

## A.2 Hiring rates

BTB only partially limits employers' information. After the initial interview, firms are allowed to conduct a criminal background check before finalizing a hiring decision. The impact of BTB on hiring thus may differ from its impact on interviews. In this model, after the interview takes place $\delta$ is sunk and no longer factors into employers' decisions. The worker will thus be hired if $q_i$ turns out to be sufficiently high, i.e., $q_i > w$.

Note that $q_i$ and $\theta_i$ are joint normal random variables with correlation $\rho = \sigma_R^2/\sqrt{\sigma_R^2(\sigma_R^2 + \sigma_e^2)}$. The joint probability of an interview and being hired is thus:

$$P_{hire} = P(q_i > w, \theta_i > \xi_R) \tag{10}$$

$$= \Phi\left(\frac{\mu_R - w}{\sigma_R}, \frac{\mu_R - \xi_R}{\sqrt{\sigma_R^2 + \sigma_e^2}}; \rho\right) \tag{11}$$

where $\Phi(\cdot, \cdot; \rho)$ is the bi-variate standard normal CDF with correlation $\rho$. Since this CDF is an increasing function of both its arguments, hiring rates have the same comparative statics as interview rates with respect to $\xi_R$. Thus the range of possible effects on record or demographic-group specific interview rates also translate into effects on hiring rates, making the theoretical effect of BTB on demographic group's average employment rates also ambiguous.

The probability of being hired conditional on an interview, however, is more complicated. To derive the conditional distribution of $q_i$ given an interview (i.e., $\theta_i > \xi_R$), observe that (suppressing a subscript $R$ to denote densities within a criminal record group):

$$f(q_i|\theta_i) = \frac{f(\theta_i|q_i)f(q_i)}{f(\theta_i)} \tag{12}$$

$$f(q_i|\theta_i > \xi_R) = \int_{\xi_R}^{\infty} \frac{f(\theta_i|q_i)f(q_i)}{f(\theta_i)} \frac{f(\theta_i)}{Pr(\theta_i > \xi_R)} d\theta_i \tag{13}$$

$$= f(q_i) \int_{\xi_R}^{\infty} \frac{f(\theta_i|q_i)}{Pr(\theta_i > \xi_R)} d\theta_i \tag{14}$$

$$= f(q_i) \frac{\Phi\left(\frac{q_i - \xi_R}{\sigma_e}\right)}{Pr(\theta_i > \xi_R)} \tag{15}$$

$$= \frac{1}{\sigma_R} \phi\left(\frac{q_i - \mu_R}{\sigma_R}\right) \frac{\Phi\left(\frac{q_i - \xi_R}{\sigma_e}\right)}{Pr(\theta_i > \xi_R)} \tag{16}$$

where I have relied on the fact that $f(\theta_i|q_i) \sim N(q_i, \sigma_e^2)$. This is a type of non-standard skewed normal distribution.[11] Observe that as $\xi_R \to -\infty$, we recover the unconditional distribution of $q_i$. As $\xi_R$ grows larger, the distribution develops a right skew. Notice also that as $\sigma_e \to 0$, this distribution approaches a truncated normal distribution, since the terms involving $\xi_R$ collapse to a simple indicator function. Hiring rates can be derived by integrating this density over $(w, \infty)$ with respect to $q_i$.

After the implementation of BTB, this density becomes a mixture across the two criminal record groups:

$$f_D(q_i|\theta_i > \xi_R) = \sum_{R=n,p} s_D^R \frac{1}{\sigma_R} \phi\left(\frac{q_i - \mu_R}{\sigma_R}\right) \frac{\Phi\left(\frac{q_i - \xi_D}{\sigma_e}\right)}{Pr_R(\theta_i > \xi_D)} \tag{17}$$

where $s_D^p = s_D, s_D^n = 1 - s_D$. Without a closed-form expression for the CDF of this density, is difficult to compare conditional hiring rates before and after BTB analytically. Depending on the parameterization, rates can increase or decrease. Thus, while effects of BTB for individuals with and without records on overall hiring rates go in the same direction as effects on interview rates, effects on the probability of hiring conditional on an interview need not.

[11] The conventional skewed normal distribution is given by $f(x) = \frac{2}{\sigma}\phi\left(\frac{x-\mu}{\sigma}\right)\Phi\left(\frac{x-\mu}{\sigma}\right)$, which only coincides with this distribution under special circumstances.

## A.3 Non-offender results

Due to the small size of the areas under study, datasets used in other analyses of BTB nationally such as the CPS are not suitable. The Census's OnTheMap data, which summarizes information from the confidential Longitudinal Employer-Household Dynamics dataset, can provide much more detail at fine levels of aggregation, but unfortunately are not available after 2014 and do not allow for sufficient demographic sub-group analysis.

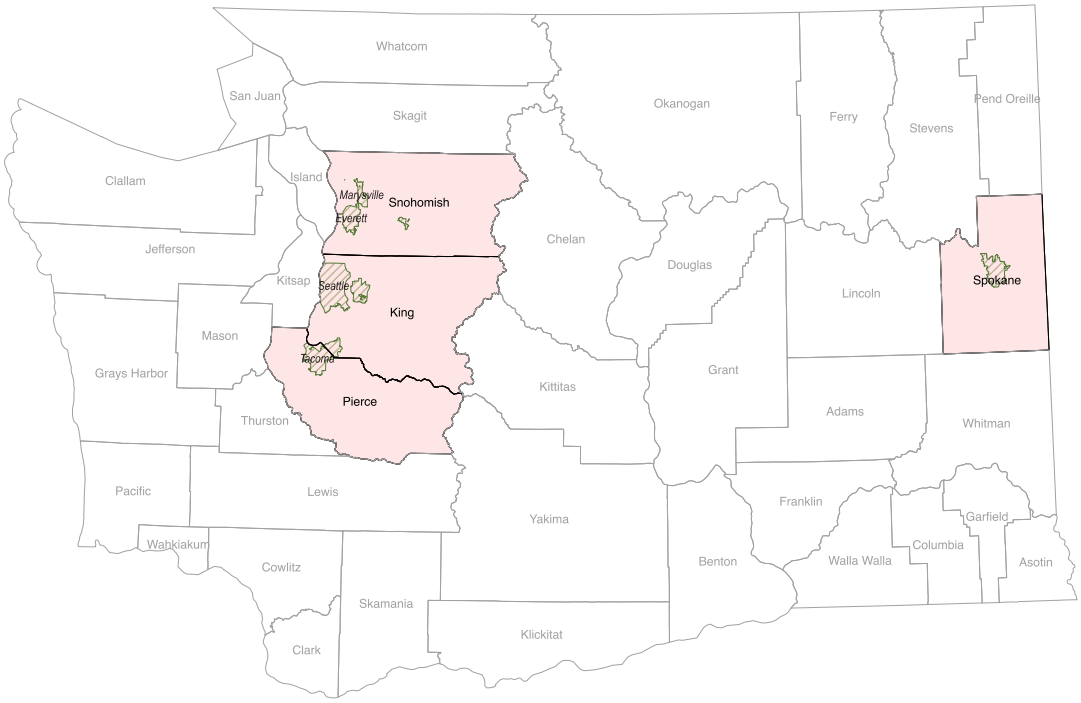
Given these constraints, I use the 2007-2015 American Community Survey (ACS) from IPUMS Ruggles et al. (2017). In this dataset, the smallest identifiable geography is a Public Use Microdata Area (PUMA), which nests within states and contains at least 100,000 people. I estimate Specification 9 for all individuals, black and Hispanic men, and men with no college education using various possible control areas. Because the ACS is a repeated cross-section, these regressions effectively test for differences in aggregate employment rates, adjusted for demographic composition, between Seattle and the comparison areas each year before and after BTB.

Table 7 reports the coefficients on the interaction of the treatment indicator and year or event-time variable. The specifications in Columns 1-3, which test for aggregate employment, detect decreases in employment in Seattle both relative to nearby counties and Spokane before *and* after BTB. The estimates for minority men in Columns 4-6 display a similar pattern. Unfortunately, the standard errors are large enough that it is difficult to rule out large positive or negative effects. It is also difficult to detect any apparent pre-trends that would invalidate the experiment. The same is true of the specifications in Columns 7-9, which test for effects on non-college men.

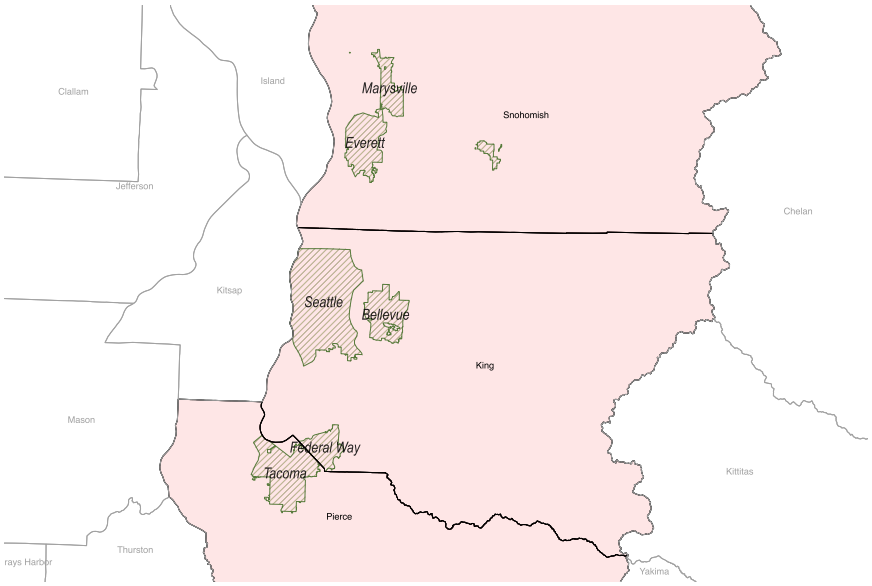
## A.4 Supplemental figures and tables

Figure 5: Treatment and control cities and counties in Washington State

A. Statewide map



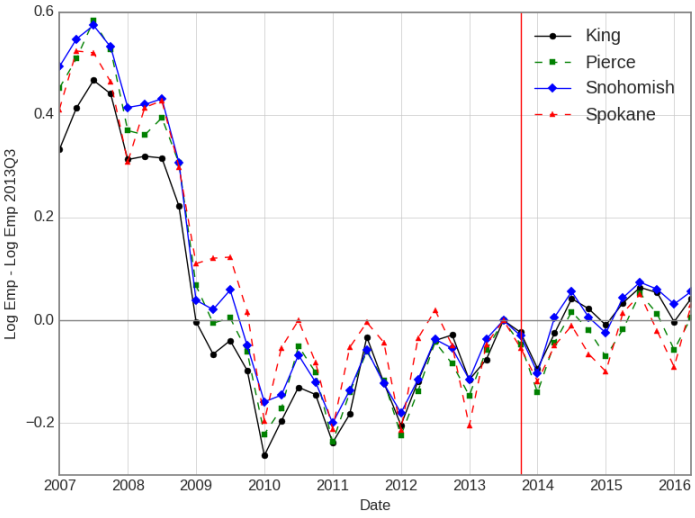

B. Seattle-area cities



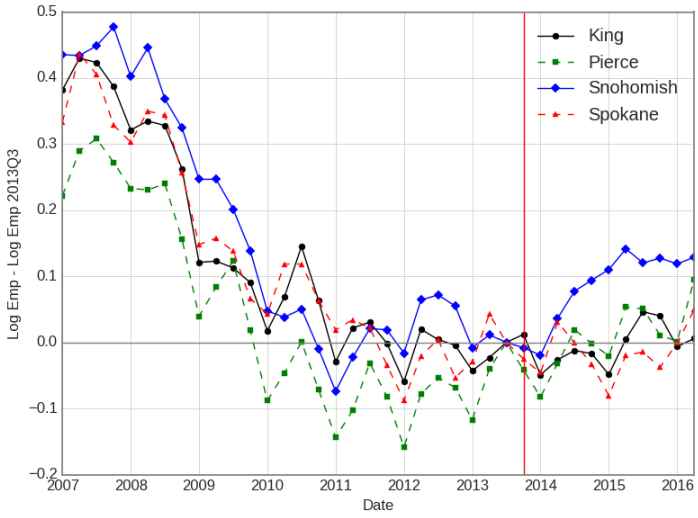

Notes: Panel A maps all counties in WA, with Snohomish, King, Pierce, and Spokane highlighted. Relevant city boundaries are also highlighted, but not all labeled. Additional detail on cities is shown in Panel B, which zooms in on the Seattle area.

Figure 6: Aggregate sample: Ex-offender employment and earnings by industry

**A. Construction / manufacturing employment**

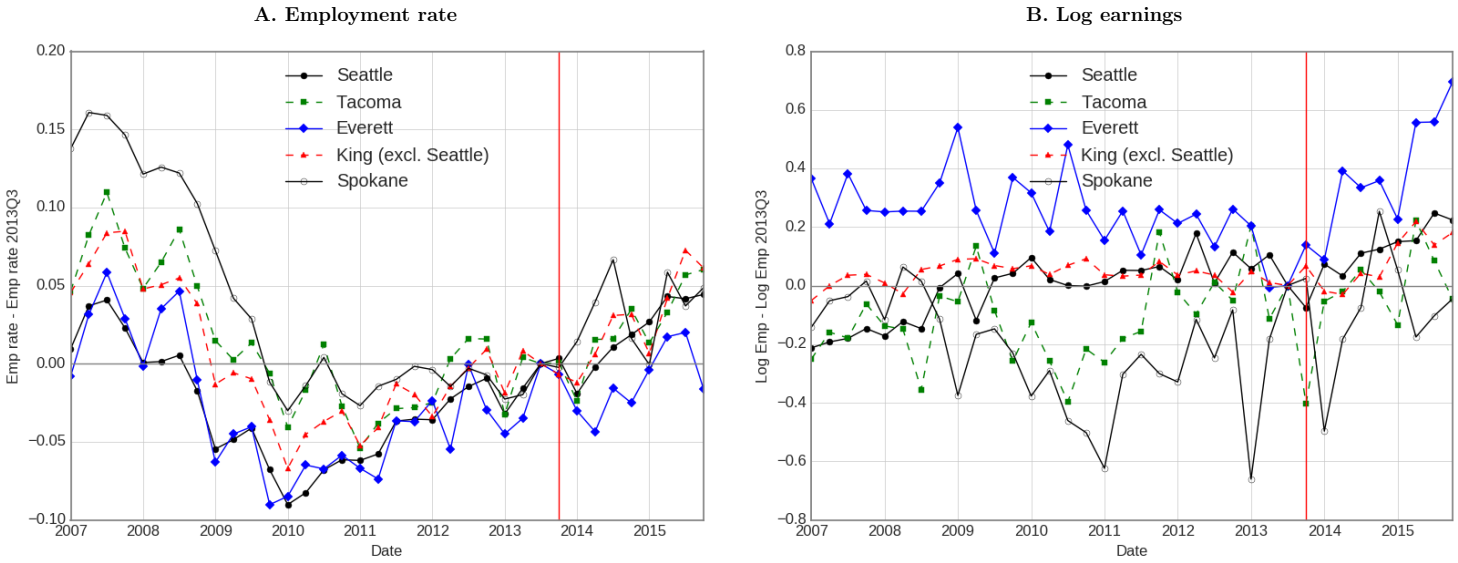



**B. Food and retail employment**




Notes: Figures plot the log of raw total employment and earnings from jobs in King, Pierce, Snohomish, and Spokane Counties by industry. Only individuals released from DOC supervision before 2013 are included, so that the sample is fixed pre-BTB. Employment refers to the number of unique individuals with positive earnings from a job in that county-quarter combination. Individuals with multiple jobs in different counties (which is rare) are counted twice.

Figure 7: Probationer analysis: Raw employment and earnings




Notes: Figure plots the employment rate and the mean of log earnings (excluding zeros) for offenders on probation in Seattle, Tacoma, Everett, Spokane, and other cities in King County offices. See the text and footnotes for additional detail on sample and list of offices included in each category.

Table 2: Aggregate sample: Logit estimates

| | vs. All | | vs. Pierce and Snohomish | | vs. Spokane | |
|---|---|---|---|---|---|---|
| | (1) Mlogit | (2) Logit | (3) Mlogit | (4) Logit | (5) Mlogit | (6) Logit |
| $t = -4$ | 0.0183 | 0.0160 | 0.0208 | 0.0192 | 0.0123 | 0.00978 |
| | (0.018) | (0.018) | (0.020) | (0.020) | (0.027) | (0.027) |
| $t = -3$ | 0.0359* | 0.0335 | 0.0326 | 0.0311 | 0.0437 | 0.0387 |
| | (0.018) | (0.018) | (0.020) | (0.020) | (0.027) | (0.027) |
| $t = -2$ | 0.0468* | 0.0443* | 0.0323 | 0.0309 | 0.0820** | 0.0769** |
| | (0.018) | (0.018) | (0.020) | (0.020) | (0.027) | (0.028) |
| $t = 0$ | 0.0215 | 0.0174 | 0.0141 | 0.0107 | 0.0390 | 0.0350 |
| | (0.018) | (0.018) | (0.020) | (0.020) | (0.027) | (0.027) |
| $t = 1$ | 0.0372* | 0.0306 | 0.0321 | 0.0269 | 0.0493 | 0.0391 |
| | (0.018) | (0.018) | (0.020) | (0.020) | (0.027) | (0.027) |
| $t = 2$ | 0.0430* | 0.0369* | 0.0428* | 0.0378 | 0.0435 | 0.0339 |
| | (0.018) | (0.018) | (0.020) | (0.020) | (0.027) | (0.028) |
| $t = 3$ | 0.0164 | 0.00890 | 0.0219 | 0.0155 | 0.00347 | -0.00863 |
| | (0.018) | (0.018) | (0.020) | (0.020) | (0.027) | (0.027) |
| $t = 4$ | 0.000915 | -0.0113 | -0.00191 | -0.0122 | 0.00764 | -0.0105 |
| | (0.018) | (0.018) | (0.020) | (0.020) | (0.027) | (0.027) |
| N | 3,628,155 | 396,490 | 3,628,155 | 340,600 | 3,628,155 | 262,812 |
| P-value pre trends | 0.200 | 0.215 | 0.466 | 0.449 | 0.019 | 0.036 |
| P-value post effects | 0.112 | 0.060 | 0.179 | 0.096 | 0.216 | 0.235 |

Standard errors in parentheses

* $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$

Notes: Table displays the results from multi- and bi-nomial logits corresponding to Equation 8. The underlined title above each pair of columns indicates the base category, e.g., employment in Pierce, Snohomish, or Spokane counties (columns 1-2). Columns labeled "mlogit" include employment in King County, employment elsewhere in the county, and non-employment as alternative outcomes. Columns labeled "logit" include only employment in King County and the base set of comparison counties. The reported coefficients are exponentiated and can be interpreted as effects on log odds of employment in King County relative to the base set. All specifications include fixed effects for age in quarters, gender and race. The p-values in the last two rows are from $\chi^2$ tests for the joint significance of all pre-treatment indicators (i.e., $s < 0$) and post-treatment indicators, respectively. Sample includes all individuals aged 18-54, not deceased, and already released from their first spell of DOC supervision before 2013. 2 years of data pre- and post-BTB implementation data included, although event-time indicators for $[-4, 4]$ only reported. $t = -1$ is omitted.

Table 3: Recently released sample: Difference-in-difference estimates

| | vs. All | | vs. Pierce and Snohomish | | vs. Spokane | |
|---|---|---|---|---|---|---|
| | (1) | (2) | (3) | (4) | (5) | (6) |
| | Emp. | Earnings | Emp. | Earnings | Emp. | Earnings |
| $s = -4$ | -0.00255 | 16.99 | 0.00342 | 59.11 | -0.0165* | -82.21* |
| | (0.0047) | (31.6) | (0.0052) | (35.4) | (0.0066) | (38.3) |
| $s = -3$ | 0.00107 | 43.53 | 0.00473 | 64.12* | -0.00750 | -5.203 |
| | (0.0042) | (27.1) | (0.0046) | (30.7) | (0.0059) | (32.6) |
| $s = -2$ | 0.00275 | 29.82 | 0.00187 | 22.71 | 0.00479 | 46.64 |
| | (0.0035) | (21.9) | (0.0038) | (24.3) | (0.0048) | (29.1) |
| $s = 0$ | 0.00125 | 61.27** | -0.000139 | 63.62* | 0.00445 | 55.89 |
| | (0.0035) | (22.7) | (0.0039) | (25.4) | (0.0047) | (28.7) |
| $s = 1$ | 0.00326 | 98.61*** | 0.00279 | 88.12** | 0.00449 | 123.6*** |
| | (0.0042) | (28.0) | (0.0046) | (31.4) | (0.0055) | (34.6) |
| $s = 2$ | 0.00686 | 119.3*** | 0.00939 | 101.2** | 0.00102 | 162.4*** |
| | (0.0044) | (30.1) | (0.0049) | (33.7) | (0.0061) | (38.3) |
| $s = 3$ | 0.00714 | 96.11** | 0.0111* | 90.24* | -0.00212 | 109.6** |
| | (0.0046) | (32.7) | (0.0051) | (36.6) | (0.0065) | (41.0) |
| $s = 4$ | 0.00185 | 83.21* | 0.00285 | 79.66 | -0.000428 | 92.05* |
| | (0.0049) | (36.9) | (0.0054) | (41.3) | (0.0070) | (46.1) |
| N | 888,174 | 888,174 | 736,896 | 736,896 | 531,506 | 531,506 |
| Dep. Var. Mean | 0.248 | 1472.360 | 0.250 | 1538.086 | 0.247 | 1433.100 |

Standard errors in parentheses

* $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$

Notes: Table displays estimates of Specification 9. The underlined title above each pair of columns indicates the control area, e.g., Pierce, Snohomish, and Spokane counties (columns 1-2). The coefficients reported are the $\gamma_s^T$ for $s \in [-4, 4]$, where $s = -1$ is omitted. Standard errors are clustered at the individual level. Employment is an indicator for any positive earnings in a given quarter, while earnings is total quarterly earnings (including zeros).

Table 4: Nonwhite recently released sample: Difference-in-difference estimates

| | All | | Pierce and Snohomish | | Spokane | |
|---|---|---|---|---|---|---|
| | (1) | (2) | (3) | (4) | (5) | (6) |
| | Emp. | Earnings | Emp. | Earnings | Emp. | Earnings |
| $s = -4$ | -0.00224 | -20.58 | 0.00110 | -13.59 | -0.0149 | -44.78 |
| | (0.0079) | (43.5) | (0.0085) | (47.7) | (0.014) | (62.1) |
| $s = -3$ | 0.00392 | 32.78 | 0.00535 | 42.99 | -0.00167 | -4.966 |
| | (0.0071) | (37.4) | (0.0076) | (41.4) | (0.012) | (48.9) |
| $s = -2$ | 0.00377 | 7.837 | 0.00131 | 5.212 | 0.0130 | 17.88 |
| | (0.0059) | (29.8) | (0.0063) | (32.2) | (0.010) | (47.1) |
| $s = 0$ | -0.00553 | 26.01 | -0.00659 | 31.74 | -0.00160 | 5.547 |
| | (0.0062) | (32.3) | (0.0067) | (35.0) | (0.011) | (51.2) |
| $s = 1$ | 0.00186 | 100.4* | 0.00225 | 121.5** | 0.000913 | 23.14 |
| | (0.0071) | (40.1) | (0.0078) | (43.4) | (0.012) | (62.6) |
| $s = 2$ | 0.0148* | 89.55* | 0.0208** | 100.3* | -0.00744 | 52.98 |
| | (0.0075) | (44.3) | (0.0080) | (48.0) | (0.014) | (70.6) |
| $s = 3$ | 0.0117 | 82.37 | 0.0210* | 118.1* | -0.0235 | -49.98 |
| | (0.0078) | (46.9) | (0.0083) | (50.9) | (0.014) | (71.5) |
| $s = 4$ | -0.00206 | 74.27 | -0.00220 | 100.3 | -0.000986 | -21.23 |
| | (0.0082) | (52.4) | (0.0089) | (56.8) | (0.014) | (80.7) |
| N | 328,814 | 328,814 | 298,680 | 298,680 | 214,966 | 214,966 |
| Dep. Var. Mean | 0.224 | 1125.617 | 0.225 | 1150.499 | 0.227 | 1150.650 |

Standard errors in parentheses

* $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$

Notes: Table displays estimates of Specification 9 for non-white offenders. The underlined title above each pair of columns indicates the control area, e.g., Pierce, Snohomish, and Spokane counties (columns 1-2). The coefficients reported are the $\gamma_s^T$ for $s \in [-4, 4]$, where $s = -1$ is omitted. Standard errors are clustered at the individual level. Employment is an indicator for any positive earnings in a given quarter, while earnings is total quarterly earnings (including zeros).

Table 5: Probationer analysis: Difference-in-difference estimates

| | vs. All | | vs. Neighboring | | vs. Everett | | vs. Within King Co. | | vs. Spokane | |
|---|---|---|---|---|---|---|---|---|---|---|
| | (1) Emp. | (2) Earnings | (3) Emp. | (4) Earnings | (5) Emp. | (6) Earnings | (7) Emp. | (8) Earnings | (9) Emp. | (10) Earnings |
| $s = -4$ | -0.00457 | -52.39 | -0.00236 | -47.94 | -0.0363 | -191.2 | 0.0125 | 28.88 | -0.0169 | -77.05 |
| | (0.016) | (71.3) | (0.016) | (74.8) | (0.031) | (116.4) | (0.018) | (86.8) | (0.021) | (85.1) |
| $s = -3$ | 0.00150 | -6.027 | 0.00248 | -4.161 | 0.00169 | -46.39 | 0.00625 | 23.97 | -0.00321 | -15.63 |
| | (0.015) | (68.1) | (0.016) | (70.9) | (0.028) | (110.9) | (0.018) | (81.2) | (0.022) | (79.6) |
| $s = -2$ | 0.00645 | 31.40 | 0.0102 | 30.60 | -0.00560 | -39.17 | 0.0108 | 68.44 | -0.0154 | 27.18 |
| | (0.013) | (56.6) | (0.013) | (59.0) | (0.024) | (94.5) | (0.015) | (66.9) | (0.018) | (67.2) |
| $s = 0$ | 0.0110 | 32.08 | 0.0133 | 52.08 | -0.0236 | -41.38 | 0.0209 | 74.59 | -0.00138 | -78.48 |
| | (0.014) | (60.7) | (0.015) | (63.2) | (0.027) | (91.3) | (0.016) | (73.9) | (0.018) | (69.7) |
| $s = 1$ | 0.0209 | -8.060 | 0.0244 | 9.466 | -0.00948 | -123.5 | 0.0331 | -1.765 | -0.00127 | -123.0 |
| | (0.016) | (71.1) | (0.016) | (74.7) | (0.028) | (108.1) | (0.018) | (90.7) | (0.020) | (80.7) |
| $s = 2$ | 0.00820 | 24.32 | 0.0167 | 48.82 | -0.00639 | -111.6 | 0.0177 | 74.59 | -0.0393 | -120.2 |
| | (0.016) | (71.7) | (0.016) | (75.0) | (0.028) | (108.7) | (0.018) | (90.3) | (0.021) | (82.3) |
| $s = 3$ | 0.00539 | -42.90 | 0.0146 | -5.122 | 0.0256 | -89.95 | 0.0168 | 39.09 | -0.0479* | -260.1** |
| | (0.016) | (76.0) | (0.017) | (79.6) | (0.028) | (113.3) | (0.019) | (95.7) | (0.022) | (95.9) |
| $s = 4$ | 0.00273 | -64.05 | 0.0130 | -12.26 | 0.0112 | -78.96 | 0.00949 | -20.92 | -0.0555* | -359.6** |
| | (0.017) | (86.1) | (0.018) | (89.8) | (0.030) | (130.7) | (0.020) | (108.0) | (0.025) | (114.9) |
| N | 430,927 | 430,927 | 380,301 | 380,301 | 164,352 | 164,352 | 278,176 | 278,176 | 179,491 | 179,491 |
| Dep. Var. Mean | 0.210 | 971.921 | 0.209 | 979.066 | 0.191 | 834.906 | 0.215 | 1054.790 | 0.192 | 836.153 |

Standard errors in parentheses

* $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$

Notes: Includes all individuals under supervision at time $t$ and assigned to a field office in relevant city or county. Estimates shown are the coefficient on the interaction of an indicator for assignment to a Seattle field office with event-time indicators. In columns 1-2, all comparison regions are including: Everett, Tacoma, other cities in King County (excluding Seattle), and Spokane. Column 3-4 excludes Spokane. Column 5-6 includes Everett only as a control. Column 7-8 includes other cities in King County only. And Column 9-10 includes Spokane only. All regressions included indicators for age (in quarters), gender, and race.

Table 6: Non-white probationer analysis: Difference-in-difference estimates

| | All | | Neighboring | | Everett | | Within King Co. | | Spokane | |
|---|---|---|---|---|---|---|---|---|---|---|
| | (1) Emp. | (2) Earnings | (3) Emp. | (4) Earnings | (5) Emp. | (6) Earnings | (7) Emp. | (8) Earnings | (9) Emp. | (10) Earnings |
| $s = -4$ | 0.0265 | 54.11 | 0.0245 | 42.61 | 0.101 | 225.5 | 0.0258 | 14.17 | 0.0463 | 157.0 |
| | (0.021) | (75.9) | (0.022) | (79.8) | (0.052) | (157.5) | (0.025) | (94.2) | (0.029) | (107.6) |
| $s = -3$ | 0.0210 | 32.01 | 0.0175 | 23.55 | 0.0961* | 224.6 | 0.0159 | -19.71 | 0.0520 | 98.73 |
| | (0.022) | (83.1) | (0.022) | (86.4) | (0.041) | (151.0) | (0.025) | (100.0) | (0.030) | (111.2) |
| $s = -2$ | 0.0199 | 98.83 | 0.0193 | 85.22 | 0.0556 | 175.4 | 0.0131 | 67.23 | 0.0208 | 160.1* |
| | (0.018) | (64.2) | (0.018) | (67.3) | (0.035) | (123.9) | (0.021) | (74.2) | (0.026) | (80.2) |
| $s = 0$ | 0.0104 | -6.115 | 0.00777 | -6.461 | -0.0617 | -245.5 | 0.0167 | -4.994 | 0.0323 | -14.53 |
| | (0.019) | (66.0) | (0.019) | (68.8) | (0.051) | (170.6) | (0.022) | (75.0) | (0.026) | (83.1) |
| $s = 1$ | 0.0207 | -19.24 | 0.0158 | -30.31 | 0.0247 | -16.70 | 0.0207 | -106.4 | 0.0551 | 51.42 |
| | (0.022) | (75.7) | (0.022) | (79.1) | (0.049) | (153.2) | (0.025) | (91.7) | (0.032) | (86.8) |
| $s = 2$ | 0.0236 | 61.18 | 0.0235 | 62.48 | 0.0215 | 66.31 | 0.0216 | 19.58 | 0.0288 | 54.79 |
| | (0.021) | (82.8) | (0.022) | (86.0) | (0.052) | (166.7) | (0.026) | (97.9) | (0.028) | (104.1) |
| $s = 3$ | 0.0186 | 89.86 | 0.0191 | 99.62 | 0.152*** | 291.3 | 0.00560 | 44.21 | 0.0157 | 25.22 |
| | (0.022) | (91.5) | (0.023) | (95.4) | (0.046) | (197.9) | (0.027) | (109.9) | (0.034) | (118.2) |
| $s = 4$ | 0.0154 | 15.12 | 0.0143 | 19.75 | 0.0213 | -34.73 | 0.00389 | -59.75 | 0.0250 | -20.23 |
| | (0.023) | (103.0) | (0.024) | (107.5) | (0.065) | (232.8) | (0.028) | (125.9) | (0.036) | (139.7) |
| N | 192,815 | 192,815 | 178,301 | 178,301 | 81,151 | 81,151 | 138,580 | 138,580 | 86,821 | 86,821 |
| Dep. Var. Mean | 0.179 | 656.697 | 0.180 | 667.145 | 0.160 | 558.576 | 0.185 | 700.128 | 0.158 | 537.093 |

Standard errors in parentheses

* $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$

Notes: Includes all non-white individuals under supervision at time $t$ and assigned to a field office in relevant city or county. Estimates shown are the coefficient on the interaction of an indicator for assignment to a Seattle field office with event-time indicators. In columns 1-2, all comparison regions are including: Everett, Tacoma, other cities in King County (excluding Seattle), and Spokane. Column 3-4 excludes Spokane. Column 5-6 includes Everett only as a control. Column 7-8 includes other cities in King County only. And Column 9-10 includes Spokane only. All regressions included indicators for age (in quarters), gender, and race.

Table 7: Results for non-offenders from ACS

| | All | | | Minority men | | | Non-college men | | |
|---|---|---|---|---|---|---|---|---|---|
| | (1) All | (2) Nearby | (3) Spokane | (4) All | (5) Nearby | (6) Spokane | (7) All | (8) Nearby | (9) Spokane |
| $2009 \cdot treat$ | -0.0253* | -0.0220* | -0.0459** | 0.0185 | 0.0190 | 0.0112 | -0.0172 | -0.0136 | -0.0317 |
| | (0.011) | (0.011) | (0.016) | (0.044) | (0.044) | (0.086) | (0.032) | (0.032) | (0.043) |
| $2010 \cdot treat$ | -0.0342** | -0.0298** | -0.0587*** | -0.0711 | -0.0666 | -0.159 | -0.0799* | -0.0710* | -0.130** |
| | (0.011) | (0.011) | (0.016) | (0.044) | (0.044) | (0.088) | (0.031) | (0.032) | (0.043) |
| $2011 \cdot treat$ | -0.0148 | -0.0129 | -0.0259 | -0.0444 | -0.0444 | -0.0446 | -0.0389 | -0.0347 | -0.0594 |
| | (0.011) | (0.011) | (0.016) | (0.045) | (0.045) | (0.084) | (0.032) | (0.032) | (0.043) |
| $2012 \cdot treat$ | -0.00311 | -0.00221 | -0.00795 | 0.0334 | 0.0325 | 0.0425 | 0.0153 | 0.0202 | -0.0189 |
| | (0.011) | (0.011) | (0.016) | (0.043) | (0.043) | (0.085) | (0.032) | (0.032) | (0.043) |
| $2014 \cdot treat$ | -0.0293** | -0.0301** | -0.0228 | -0.0366 | -0.0418 | 0.0544 | -0.0141 | -0.0156 | 0.0000188 |
| | (0.011) | (0.011) | (0.016) | (0.043) | (0.043) | (0.083) | (0.032) | (0.032) | (0.043) |
| $2015 \cdot treat$ | -0.00911 | -0.0129 | 0.0156 | -0.0217 | -0.0258 | 0.0356 | -0.0178 | -0.0212 | 0.00672 |
| | (0.011) | (0.011) | (0.016) | (0.043) | (0.043) | (0.080) | (0.032) | (0.032) | (0.043) |
| N | 167,532 | 147,998 | 46,576 | 9,705 | 9,175 | 2,059 | 34,252 | 29,789 | 7,470 |
| Dep. Var. Mean | 0.737 | 0.742 | 0.760 | 0.765 | 0.770 | 0.739 | 0.674 | 0.681 | 0.643 |

Standard errors in parentheses

* $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$

Notes: Treatment and control is defined using IPUMS 2000-2010 consistent PUMAs. Treated PUMAs are 1039-1043. "Nearby" control PUMAs include 1038 and 1044-1048. "Spokane" control PUMAs include 1033. Columns labeled "All" contain both "Nearby" and "Spokane" controls. Sample in columns 1-3 includes all individuals aged 16-54 and not living in group quarters. Columns 4-6 subsets to male black and/or Hispanic men. Columns 7-9 subsets to men without any college education. All regressions include a cubic in age, PUMA fixed effects, and indicators for sex, race, and education (when not subsetting on those variables).