RESEARCH BRIEF

Crime Control Effects of a Police Substation Within a Business-Improvement District: A Quasi-Experimental Synthetic Control Evaluation

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Key Takeaways

- The Newark Police Department opened a police substation in their downtown district in 2012
- The substation had the strongest effect on motor vehicle theft, with significant reductions also observed for burglary
- Robbery and theft from auto experienced significant spatial displacement
- Quality-of-life summonses and directed police patrol significantly increased in the target area
- Parking summonses significantly decreased in the target area
- The effect of the substation was heightened when proactive policing activities increased in the target area

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Research Summary:

In Sept. 2012, a partnership between the Newark Police Department (NPD) and Newark Downtown District (NDD) culminated in the opening of a police substation in downtown Newark. NPD's Metro Division uses the substation as its headquarters and has primary responsibility for policing a 0.35 square-mile target area within downtown Newark. Coinciding with the opening of the substation, the NDD increased its number of quality-of-life ambassadors, uniformed civilian personnel who travel throughout downtown Newark on foot to identify and rectify problems that may impact the community. The NDD also funded the renovation of the building space, paid the mothy rent of the substation, and added a crime analyst position to its staff to assist the NPD in tracking crime trends in the downtown area.

The microsynthetic control method (i.e. microsynth) was used to evaluate the effect of the substation on crime. Microsynth ensures the cumulative treated and control units have identical pre-intervention crime trends and are statistically equivalent across covariates that may influence crime. Microsynth measures treatment effect through a difference-in-difference estimate of post-intervention crime counts in the treated area compared to the control area.

To measure the effect of the substation over time, as well as to account for the evolving nature of the partnership, our analysis estimates effect across two distinct time periods: (1) the initial 3-year program period (Sept. 2012 – Aug. 2015) and (2) the period following the expiration of the MOU between NPD and NDD (Sept. 2015 – Aug. 2018).

We tested the effect of the substation on six crime types: aggravated assault, burglary, murder, theft from auto, motor vehicle theft, and robbery. We were also interested in identifying potential causal mechanisms of the observed findings, and included six police activities in a process evaluation: arrests, field interrogations, quality-of-life (QOL) summonses, directed police patrols, motor vehicle parking summonses, and motor vehicle moving summonses.

The strongest crime control effects were observed for motor vehicle theft, which significantly reduced in both of the 3-year post intervention periods. Burglary also reduced during the Sept. 2012 – Aug. 2015 time period. While robbery counts in the target area did not significantly change in the postintervention period, spatial displacement effects (i.e. a significant increase in the catchment zone surrounding the target area) occurred. From Sept. 2015- Aug. 2018, the significant reduction of theft from auto in the target area was offset by a significant increase in the catchment zone. From Sept. 2015 – Aug. 2018, QOL summonses and directed patrols significantly increased, and parking summonses significantly decreased. During this same time period, the motor vehicle theft decrease nearly tripled from the Sept. 2012 – Aug. 2015 period (-88 to -252). Silver linings can also be seen in the crime increases, as the robbery increase from Sept. 2015 to Aug. 2018 (57) was less than half of the Sept. 2012 to Aug.2 015 increase (148).

The opening of NPD's substation resulted in an increase in visible police presence accompanied by increases in proactive policing activities, which impacted motor vehicle theft and burglary. This suggest substations that facilitate proactive policing may help prevent these crime types. Agencies wishing to address robbery and theft from auto may have to design substation strategies in a manner that better influences offender decision-making in order to prevent spatial displacement.

Research brief and full article available at bit.ly/sub-station