

# The Long Shadow of Heroes: Martyrs' Cemetery, Patriotic Education, and Street Crime

by Jiajun Li \*

## Abstract

Moving beyond the traditional dichotomy of formal and informal social control, this study explores how state curbs crime by embedding political and historical narratives in physical space. Drawing on geo-coded crime data and a staggered Difference-in-Differences design, results show the establishment of Martyrs' Cemetery Parks (MCPs) lead to a significant decline of crimes within adjacent areas, especially property crimes. The crime-reduction effect decays with distance and operates through two channels: spatially by the clustering of patriotic education venues rather than more police force, and temporally by seasonally memorial activities especially during the August to October. Moreover, the vignette experiment, complemented by instrumental variable estimates derived from a national survey, provides plausible evidence demonstrating how memorial architecture fosters social order through implicit moral suasion from patriotic education rather than through conventional forms of coercion.

**Keywords:** Street Crime, Social Control, Patriotic Education, Moral Suasion.

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# 1 Introduction

How states forge and sustain social order is a foundational question in political science, with crime control standing as a primary governance objective. Traditional scholarship has largely focused on a dichotomous framework of social control: formal mechanisms employing state coercion through judicial systems, police forces, and prisons (Draca et al., 2011; Scoggins, 2021; Wang, 2020), and informal mechanisms relying on social norms, moral sanctions, and cultural institutions (Cameron et al., 2021; Corcoran et al., 2018; Cromby et al., 2010). While this dichotomy offers important insights, it overlooks a more subtle form of governance operating through the material environment—where political power becomes spatially embedded in civic landscapes to cultivate self-disciplining citizens.

Memorial architecture dedicated to war martyrs serves as a physical embodiment of a nation’s collective memory and historical narrative—and also a potent expression of this spatialized and implicit form of power. Unlike Foucault’s *panopticon*, which relies on architectural visibility to induce discipline through perceived surveillance (Foucault, 2012), or structures such as North Korea’s Juche Tower<sup>1</sup>, which exalt extreme personality cults of the former leadership, martyr memorials in urban landscapes function as dynamic symbolic instruments which materialize official historical narratives, valorize heroic sacrifice, and promote civic virtue—aiming not to deter through fear, but to inspire through moral and emotional appeal. Although substantial scholarly work has examined the causal links between formal or informal institutions and crime, far less attention has been given to architecture imbued with implicit political power and its often-overlooked role in social regulation. This raises a pivotal, yet understudied, question: Can memorial buildings actually reduce crime?

To address this gap, this study examines the impact of Martyrs’ Cemetery Parks (MCPs) on street crime in China, using geo-coded court judgment records on street crimes and data on MCPs established between 2013 and 2022. Applying a staggered Difference-in-Differences framework, I arrive at three main findings: (1) the presence of MCPs leads to a significant reduction in both the number and the proportion of crimes, particularly property crimes in adjacent areas; (2) despite this overall decline, the venues of criminal activity shift closer to the cemeteries, suggesting that these proximate, less populated zones may become relatively more susceptible to illegal behavior; (3) the effect of MCPs is limited and will decrease with radius. Further, I investigate the mechanisms through which MCPs deter crime by altering spatial features and temporal activities within a certain radius. Spatially, the establishment of MCPs attracts more patriotic education venues—rather than additional police force—in the surrounding areas. These sites collectively work to inspire residents’ self-disciplinary morality and reinforce lawful conduct. Temporally, memorial activities held in MCPs between August and October—particularly in areas with a higher density of schools and government institutions—contribute

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<sup>1</sup>[https://en.wikipedia.org/wiki/Juche\\_Tower](https://en.wikipedia.org/wiki/Juche_Tower)

to significant seasonal crime reduction.

This paper makes contributions to several strands of literature. First, it engages with studies on approaches to crime control. Existing research shows that social control mechanisms are shaped by a range of factors—including history, culture, and political institutions—and scholars have sought to identify which methods are most effective and cost-efficient in deterring crime (Bright et al., 2021; Cameron et al., 2021; Corcoran et al., 2018; Draca et al., 2011). A common distinction is drawn between formal and informal mechanisms of control (Jiang et al., 2014). This study extends this typology by demonstrating how state-built physical space—specifically, Martyrs’ Cemetery Parks in China—can also serve to suppress illegal behavior. My findings indicate that MCPs significantly reduce both the frequency and proportion of crimes in nearby areas, yet also reveal a paradox: these zones may attract criminal activity due to lower surveillance and fewer potential witnesses. Furthermore, the analysis suggests that MCPs exert a stronger dampening effect on premeditated crimes, such as property offenses, than on impulsive acts such as violent crime.

Secondly, this study offers a novel perspective on the relationship between patriotic education and social stability. Extant research has predominantly framed patriotic education as a tool of propaganda, emphasizing its role in persuading citizens (Mattingly and Yao, 2022), mobilizing support for military conflict (Liu and Shao, 2023; Qi et al., 2023), manipulating nationalist sentiment (Zhou and Wang, 2017), or preempting mass dissent (Liu and Ma, 2018). Moving beyond this predominantly discursive and instrumental view, I demonstrate that Martyrs’ Cemetery Parks, as critical venues for patriotic education, foster social order through non-coercive means: by appealing to civic morality and enhancing perceived surveillance, they contribute to a measurable reduction in crime. Furthermore, unlike transient propaganda delivered through slogans, textbooks, or videos, patriotic education materialized in enduring architecture exerts a more persistent influence by systematically reshaping the spatial character and seasonal rhythms of public life in the surroundings.

Last but not least, this study refines our understanding of modern state-building, particularly how political power is diffused throughout society. A central question in the social sciences concerns the mechanisms through which states extend their reach and cultivate legitimacy. Scholarly work has traditionally emphasized ‘hard’ capabilities, such as fiscal extraction (Lü and Landry, 2014), conscription (Cebul and Grewal, 2022), and bureaucratic administration (Andersen, 2024), as well as ‘soft’ capabilities like schooling (Paglayan, 2022) and official media propaganda (Han, 2025). This paper, however, identifies a more subtle and pervasive pathway: the strategic use of civic infrastructure. We demonstrate how the Chinese state embeds heroic memory, official narratives, and its own sources of legitimacy directly into the physical landscape through memorial architecture. By shaping the spaces of everyday life, these structures implicitly guide civic consciousness and historical understanding, representing a potent form of infrastructural governance that operates beyond the realms of both coercion and discourse.

The remainder of the paper proceeds as follows. Section 2 delineates the institutional background of Martyrs' Cemetery Parks and patriotic campaigns in China. Section 3 details the data sources and empirical strategy. Section 4 presents the main regression results, alongside a series of supporting analyses including parallel trends tests, placebo tests, robustness checks, and heterogeneity analysis. Section 5 delves into the underlying mechanisms. Finally, Section 6 concludes by summarizing the core findings and discussing their broader implications.

## **2 Literature Review**

### **2.1 Formal and Informal Social Control**

The enduring question of how states forge and maintain social order has traditionally been answered by two modes of social control. The first, formal control, is rooted in the fact of the state's monopoly on legitimate violence and is exercised through the coercive apparatus, such as judiciary (Mocan et al., 2020; Scoggins, 2021), police (Di Tella and Schargrodsky, 2004; Draca et al., 2011), and prisons (Levitt, 1996; Wang, 2020). It delineates legal boundaries or taboos authoritatively and to deter criminal activity through the threat and application of punitive sanctions. Empirical studies illustrate these channels clearly: for instance, Di Tella and Schargrodsky (2004) document a strong localized deterrent effect from visible police presence, with little spillover beyond the immediate area of deployment; Levitt (1996) estimate that incarcerating one additional prisoner reduces annual crimes by approximately fifteen; and Mocan et al. (2020) show that perceptions of judicial quality—such as court independence and impartiality—can meaningfully suppress dishonest and criminal conduct.

The second, informal control (e.g., morality (Cameron et al., 2021; Cromby et al., 2010), religion (Corcoran et al., 2018; Ratcliff and Schwadel, 2023), propaganda (Parsons, 1942), and social networks (Bright et al., 2021; Damm and Gorinas, 2020; Faust and Tita, 2019)), is derived from the society itself and operates not through the fear of legal punishment, but through the internalization of stigma, the power of social image, and the desire for belonging within a community. For instance, Corcoran et al. (2018) find religious intensity is positively and significantly associated with assault, but not with intentional homicide; Ratcliff and Schwadel (2023) demonstrate that a county's total adherence rate, mainline Protestant rate and, to a lesser degree, Catholic adherence rate are associated with fewer hate crimes; Schwarz et al. (2022) investigate a "culture of rape," wherein victims are often disbelieved and blamed in US and show irrelevant features of rape strongly affect whether the public views an incident as severe or worthy of punishment; Damm and Gorinas (2020) find inmates strengthen their criminal capital in prison because of exposure to offenders in their field of specialization (reinforcing peer effects), which will strengthen crimes that require specific capital, planning, and networks.

However, this formal-informal dichotomy rests on a problematic separation between the state and society as distinct spheres of influence. It is hard to explain the implicit influence of physical

environment that the state actively structures on but unexpectedly shaping moral landscape, guiding social conducts, and cultivating civic dispositions. This theoretical gap thus begs a pivotal question: how might the state strategically shape the material and spatial context of everyday life to produce a self-regulating citizenry? This study intends to illuminate the impact of memorial architecture on social control, which operates through the silent, persistent power of infrastructure and built form.

## **2.2 Architecture as Political Instrument on Crime**

A substantial body of scholarship reconceptualizes the built environment not as a mere backdrop to social life, but as an active and instrumental component of political power. Buildings, and particularly memorial structures, are potent vehicles for ideological narratives. The most famous theoretical example is the “panopticon” in Foucault (2012)’s work “Discipline and Punish”, which illustrates how architectural design can be used to surveil and discipline populations. Beyond this archetype of coercive visibility, scholars have extensively examined the relationship between civic landscapes, political power, and urban governance (Carmona et al., 2023; Hansson and Hellberg, 2020; Nathan and Sands, 2023). For instance, Nathan (2025b) finds that autocratic regimes often render urban space more legible by imposing gridded street plans, yet such orderly layouts may unintentionally reduce social interaction among residents, weaken local problem-solving networks, and depress electoral turnout (Nathan, 2025a); Zheng (2019) analyzes the evolution of Shanghai’s urban sculpture scene, finding that overt political didacticism has shifted into a veiled form under the guise of public care, which is achieved by embedding political propaganda within monumental sculptures through the strategic manipulation of their historical components—themes, events, or figures. Similarly, a broader strand of literature documents how built environments—from neighborhood designs to public architecture—systematically shape patterns of political participation and protest (Bollen and Nathan, 2025; Gade, 2020; Schwedler, 2022; Stadnicki, 2017).

Specially, memorial buildings materialize official history, valorize specific values, and naturalize particular political orders by embedding them in the seemingly permanent and apolitical fabric of the civic landscape. This symbolic power usually operates not through the threat of punishment, but through its capacity to shape identity and conduct from within—by making certain behaviors feel culturally inappropriate or morally incongruous in specific spatial contexts. This theoretical lens provides the crucial link between the physicality of Martyrs’ Cemetery Parks and their hypothesized role in the regulation of crimes. Martyrs’ Cemetery Parks in China are state-designated memorial spaces dedicated to individuals who have made exceptional contributions to the nation, including soldiers fallen in war, police officers killed in the line of duty, and civil servants who died during disaster relief operations. Their institutionalization and protection are formally governed by national regulations, notably the Regulations on the Protection and Management of Martyrs’ Memorial Facilities (Ministry of Civil Affairs,

2013)<sup>2</sup> and the Heroes and Martyrs Protection Law (National People’s Congress, 2018)<sup>3</sup>, which establish a graded management system based on commemorative significance and scale. Thus, it is believed that, far from being passive commemorative landscapes, MCPs constitute a core component of China’s institutionalized political power and official ideology. They represent a deliberate synthesis of spatial governance and ideological cultivation, serving as curated environments where official historical narratives are materially embedded and ritually activated to shape civic identity and sustain social order.

## 2.3 Patriotic Education in Martyrs’ Cemetery

Patriotic education is frequently regarded as a critical instrument of propaganda in non-democratic contexts, used to bolster regime stability, enhance policy compliance, and foster loyalty through the mobilization of nationalist sentiment (Liu and Shao, 2023; Qi et al., 2023; Zhang and Ma, 2023; Zhou and Wang, 2017). While existing scholarship has extensively examined the discursive and content-based dimensions of patriotic education in China, it has paid comparatively little attention to how such efforts are enacted through material and spatial means. Unlike conventional propaganda delivered via textbooks (Qian et al., 2017; Sneider, 2013) or media (Mattingly and Yao, 2022), Martyrs’ Cemetery Parks transcend purely communicative approaches by orchestrating immersive, experiential forms of ideological instilling. Through curated landscapes, monuments, steles inscribed with heroic narratives, and ritualized activities, MCPs embody nationalism in tangible form, turning abstract ideology into a spatially embedded and sensorially engaged mode of civic pedagogy.

Furthermore, moving beyond explanations that emphasize persuasion or the manipulation of temporally nationalistic emotions (Liu and Ma, 2018; Sinkkonen, 2013; Wang, 2008), the patriotic discourse materialized within MCPs actively shapes a distinctive moral framework. This framework derives from the “role model effect” of commemorated martyrs, who are presented as embodiments of ultimate sacrifice and civic virtue. By framing these figures as ethical exemplars, MCPs encourage visitors to internalize associated values and to strive to “be a good Chinese citizen” (Li, 2024; Lin and Jackson, 2023). This process transforms patriotic education from a primarily discursive project into a mechanism for moral suasion, where spatial and symbolic cues guide normative conduct and foster self-disciplining civic attitudes. Based on this, my research positions MCPs as dynamic regulatory mechanisms within urban governance, whose crime-control efficacy stems from their capacity to subtly reshape the normative environment. Investigating this connection thus moves the analysis beyond MCPs’ symbolic and educational roles, to examine their concrete function as instruments of social order—a function that aligns with the Chinese state’s broader emphasis on stability maintenance, yet does so through the distinctive, and theoretically significant, mechanism of cultivated self-discipline

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<sup>2</sup>[https://www.chinamartyrs.gov.cn/shengji\\_zcfg/yiqi\\_qgzcfg/202404/t20240410\\_411093.html](https://www.chinamartyrs.gov.cn/shengji_zcfg/yiqi_qgzcfg/202404/t20240410_411093.html)

<sup>3</sup>[http://www.npc.gov.cn/npc/c2/c30834/201905/t20190521\\_281441.html](http://www.npc.gov.cn/npc/c2/c30834/201905/t20190521_281441.html)

rather than overt control.

### 3 Data and Design

The empirical analysis draws on multiple datasets, including spatiotemporal crime records, MCP locations, and a set of geographic control variables, with the geographic units of analysis defined as areas within specified radii of MCPs.

#### 3.1 Data Sources

***Martyrs' cemetery parks.*** Based on information from The China Martyrs Website<sup>4</sup>, I compiled a dataset of martyrs' cemetery parks (MCPs) that includes their type, title, address, and year of establishment. These addresses were then converted into precise geographical coordinates (latitude and longitude) using the Baidu Maps API<sup>5</sup>. As shown in Figure 1, the final sample comprises 585 MCPs established between 2013 and 2022. These are predominantly concentrated in eastern and southern China, reflecting a spatial distribution that closely mirrors general population density patterns. Furthermore, provinces such as Jiangxi, Hebei, and Anhui exhibit a notably higher density of MCPs, a pattern stemming from their historical significance as key recruitment areas and sites of major conflict during the Second World War and the Chinese Civil War.

***Street crime records.*** Data on street crime in China were drawn from the dataset constructed by Zhang et al. (2025), publicly available via Scientific Data<sup>6</sup>. The data were constructed in several stages. First, over two million criminal judgment documents related to street and neighborhood offenses were retrieved from China Judgments Online<sup>7</sup> using keywords such as “robbery,” “drug trafficking,” and “kidnap.” Second, the Gemini-1.5-Flash-Latest model API (Google) was employed to extract structured information—including crime time, location, stolen items, and sentencing details. When temporal information of some cases was not uniformly encoded in the original data, regular expressions were applied to parse and standardize dates. Location descriptions were then converted into geographical coordinates (latitude and longitude) using the Baidu Maps API. For judgments referring to multiple crime locations, the first mentioned location was selected as the primary site for analysis. Finally, Euclidean distances between MCPs and crime locations were computed to define the adjacent radius for subsequent analysis. As shown in Figure 2, the temporal distribution of crime records within a 5km radius of the parks closely mirrors the overall national trend. Both series show consistent fluctuations and indicate that the bulk of recorded crimes fall between 2013 and 2019, while data from 2000 to 2012 are comparatively sparse. This under-representation in earlier years likely is because of

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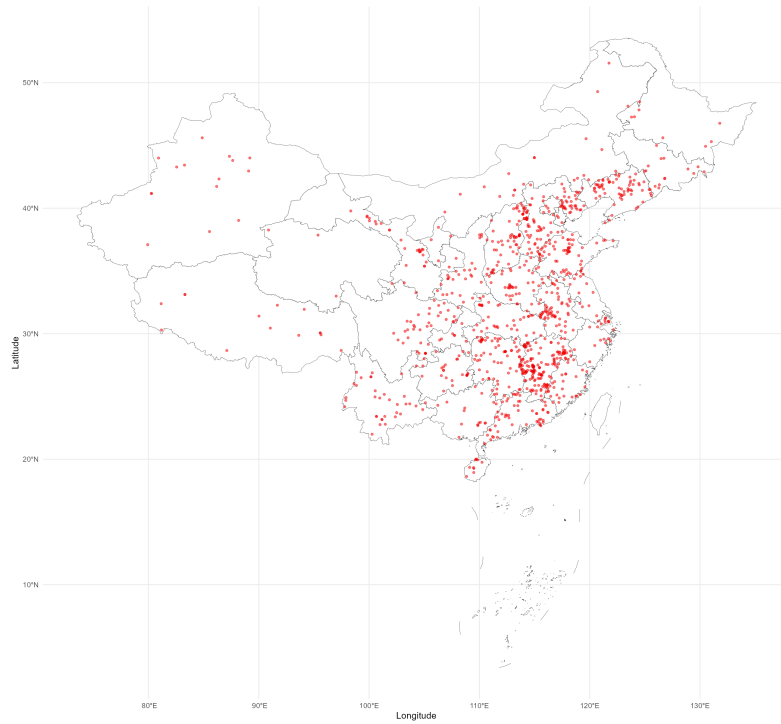
<sup>4</sup><https://www.chinamartyrs.gov.cn/>

<sup>5</sup><https://lbs.baidu.com/>

<sup>6</sup><https://www.nature.com/sdata/>

<sup>7</sup><https://wenshu.court.gov.cn/>

Figure 1: The Spatial Distribution of Martyrs' Cemetery Parks Across China (2013–2022)



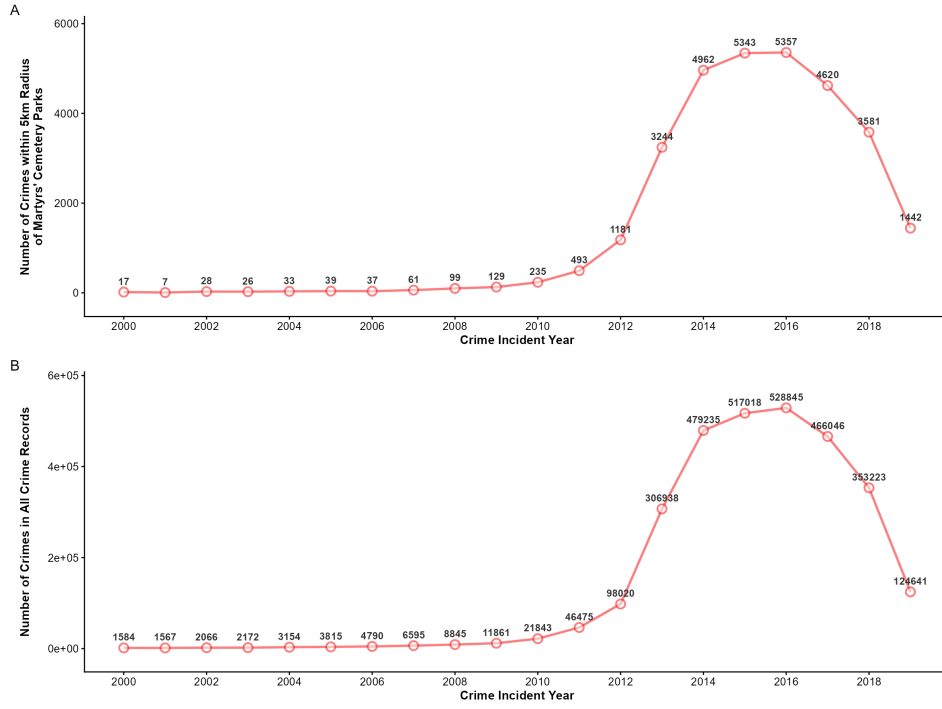
Source: The China Martyrs Website.

the incomplete digitization of court records and limitations in the online publication of judgments during that period. It should also be noted that only more severe cases that proceeded to court and were published online are included; minor offenses resolved through mediation or not exceeding statutory thresholds are absent. To the best of my knowledge, this dataset offers the most comprehensive publicly available geo-located crime information in China and can be considered broadly representative of trends in recorded street and neighborhood crime.

**Measure of crimes.** After geo-linking martyrs' cemetery parks to crime locations, the measurement of street crime requires careful consideration. I employ three complementary approaches. First, I calculate the natural logarithm of crime counts within a specified radius—an intuitive measure that reflects spatial and temporal variation, though sensitive to local population density and sampling biases. Second, in place of conventional crime rates tied to administrative units, I construct a crime ratio defined as the number of crimes within radius  $R$  divided by the number within radius  $2R$ . The impact of these parks may spill over administrative boundaries, and the size of administrative districts can distort measurements while the adjacent areas of parks remain constant, while this adopted approach can avoid these issues and make different MCPs comparable. Third, I compute the logarithmic distance between each park and crime location to assess proximity effects on criminal incidents. Summary statistics in Table A.1 show that all three metrics generally increase with radius size. In addition, parks at the city and county levels account for the majority of observations.



Figure 2: Trends in Crime Records: Parks' 5-km Radius vs. All Records (2000–2019)



Source: Zhang et al. (2025)

**Control variables.** To account for potential confounders, this study incorporates three categories of time-varying controls spanning 2012–2019. First, using Baidu Maps point-of-interest (POI) data, I identify the number of police stations, schools, restaurants, and patriotic venues within the vicinity of each MCP, based on category codes and keyword matching detailed in Table A.2. These variables help capture localized spatial characteristics and routine activity patterns. Second, night-time light intensity data from NASA are extracted and linked to MCP locations using ArcGIS, serving as a proxy for local economic activity and urbanization. Third, mobile base station density is obtained from OpenCellID<sup>8</sup>, providing a measure of human concentration and communication infrastructure. Importantly, both night-light luminosity and base station density also help approximate the density of public surveillance cameras—which are typically mounted on streetlights and traffic signals and connected to wireless networks—thus addressing a dimension of formal monitoring that may otherwise go unobserved.

### 3.2 Empirical Strategy

$$Y_{izm} = \alpha + \beta \times DID_{izm} + \vartheta'_1 \times \mathbf{X}_{izm} + u_i + \lambda_l + \gamma_z \times \omega_m + \epsilon_{izm} \quad (1)$$

<sup>8</sup><https://opencellid.org/>

$$Y_{izm} = \alpha + \sum \beta_k \times DID_{izm}^k + \vartheta'_1 \times \mathbf{X}_{izm} + u_i + \lambda_l + \gamma_z \times \omega_m + \epsilon_{izm} \quad (2)$$

The empirical analysis employs a staggered difference-in-differences design (Equation 1), supplemented by an event study specification (Equation 2) that address concerns regarding the heterogeneous treatment effects over time and to examine the parallel trend assumption (Baker et al., 2022), to identify the causal effect of MCPs on street crime outcomes. The treatment group consists of MCPs established between 2013 and 2019 (“switchers”), while those built after 2019 serve as a not-yet-treated control group. The model is estimated using MCP-year-month level panel data. The dependent variable,  $Y_{izm}$ , captures crime outcomes for park  $i$  in month  $m$  of year  $z$ . The key explanatory variable is  $DID_{izm}$ , a treatment dummy that turns on in the specific month and year when an MCP is established. The coefficient  $\beta$  captures the average treatment effect. Also, the specification includes MCP fixed effects ( $u_i$ ), MCP-type fixed effects ( $\lambda_l$ ), and ear-by-month interacted fixed effects ( $\gamma_z \times \omega_m$ ) to control for seasonal and temporal trends. A vector of control variables,  $\mathbf{X}_{izm}$ , is included with coefficients  $\vartheta'_1$ . The model is completed by a constant term  $\alpha$  and a clustered error term  $\epsilon_{izm}$ . This study utilizes a total of 140,400 observations from 2000 to 2019 for the main analysis, which does not include control variables due to missing POI data prior to 2012. Additionally, a sub-sample analysis from 2012 to 2019 incorporating control variables will be conducted to replicate the main analysis.

## 4 Results

### 4.1 Main Results

Based on the regression results presented in Table 1, I find consistent and statistically significant evidence that the establishment of MCPs reduces local criminal activity in adjacent areas. Panel A reports the main treatment effects from the staggered difference-in-differences specification. The coefficient on the DID estimator is negative and statistically significant across all three crime measures. Specifically, the presence of an MCP leads to a 0.018 log-point reduction in the number of crimes, a 0.865 percentage point decrease in the ratio of crimes within the designated (1km) radius, and a 0.130 log-point reduction in the average distance of crimes from the parks. The magnitude of these effects is substantial when evaluated against the dependent variable means. The reduction in the log number of crimes represents a decline of approximately 164% relative to the mean, while the decrease in the crime ratio constitutes a 145% reduction from its mean value. Similarly, the contraction in crime distance from the parks amounts to a 149% decrease relative to the sample mean.

Panel B examines potential anticipatory effects by advancing the treatment year by one year before the actual treatment, as constructing memorial buildings may spend much time and the locals will know this information before the real establishment year. The results remain robust,

showing statistically significant negative coefficients across all crime measures, though with slightly attenuated magnitudes compared to the analysis using the full sample. This pattern suggests that while there may be minor anticipatory behavior, the core treatment effect remains economically and statistically meaningful.

Table 1: Main Results

	Log number of crimes	Ratio of crimes	Avg. of crimes' log distance
<i>Panel A. Main Effects</i>			
DID	-0.018** (0.007)	-0.865** (0.386)	-0.130** (0.051)
DV Mean	0.011	0.595	0.087
Park FE	✓	✓	✓
Park Type FE	✓	✓	✓
Year × Month FE	✓	✓	✓
Num of Observations	140400	140400	140400
Adj. R <sup>2</sup>	0.154	0.145	0.148
<i>Panel B. Anticipatory Effects</i>			
DID	-0.014* (0.007)	-0.697* (0.387)	-0.100** (0.051)
DV Mean	0.011	0.595	0.087
Park FE	✓	✓	✓
Park Type FE	✓	✓	✓
Year × Month FE	✓	✓	✓
Num of Observations	140400	140400	140400
Adj. R <sup>2</sup>	0.154	0.145	0.147

Notes: \*  $p < 0.1$ , \*\*  $p < 0.05$ , \*\*\*  $p < 0.01$ . Observations are at the park-month level. Standard errors, clustered by park, are shown in parentheses. The model includes park fixed effects, park-type fixed effects, and year × month fixed effects. The mean of the dependent variable is reported.

Table 2 presents a sub-sample analysis with and without control variables and demonstrates the robustness of the core findings. First, the coefficient estimates for the DID variable remain remarkably stable across all three crime measures both with and without control variables. For the log number of crimes, the coefficient maintains -0.008 with consistent significance. Similarly, the crime ratio coefficient shows minimal change from -0.364 to -0.356, while the crime distance coefficient remains identical at -0.047, both retaining their statistical significance.

Additionally, the adjusted R-squared values show virtually no improvement with the addition of control variables. For the log number of crimes, the R-squared remains constant at 0.322, while the crime ratio and crime distance measures show negligible increases of 0.001 and 0.000 respectively. This pattern indicates that the fixed effects structure—incorporating park, park type, and year-by-month fixed effects—already accounts for the majority of systematic variation in crime outcomes. The control variables, while theoretically important, contribute little additional explanatory power to the model. The combination of stable coefficients and constant

model fit provides strong evidence that our baseline specification adequately captures the causal relationship between MCP establishment and crime reduction, and that this relationship is not confounded by observable characteristics.

Table 2: Main Effects Using Sub-sample (2012-2019)

	Log number of crimes	Ratio of crimes	Avg. of crimes' log distance
<i>Panel A. Without Controls</i>			
DID	-0.008** (0.004)	-0.364* (0.188)	-0.047** (0.023)
DV Mean	0.027	1.425	0.209
Park FE	√	√	√
Park Type FE	√	√	√
Year × Month FE	√	√	√
Num of Observations	56160	56160	56160
Adj. R <sup>2</sup>	0.322	0.302	0.304
<i>Panel B. Add Controls</i>			
DID	-0.008** (0.004)	-0.356* (0.191)	-0.047** (0.023)
DV Mean	0.028	1.430	0.209
Park FE	√	√	√
Park Type FE	√	√	√
Year × Month FE	√	√	√
Num of Observations	55956	55956	55956
Adj. R <sup>2</sup>	0.322	0.303	0.304

Notes: \*  $p < 0.1$ , \*\*  $p < 0.05$ , \*\*\*  $p < 0.01$ . Observations are at the park-month level. Standard errors, clustered by park, are shown in parentheses. The model includes park fixed effects, park-type fixed effects, and year × month fixed effects. The mean of the dependent variable is reported.

Table 3 presents the differential impacts of MCPs establishment across crime categories, revealing a striking pattern of selective deterrence. The results demonstrate that the crime-reduction effect is predominantly driven by property crimes, with minimal impact on violent or other offenses. As shown in Panel A, MCPs generate statistically significant and economically meaningful reductions in property crimes across all buffer distances. The treatment effect exhibits a clear distance gradient, strengthening from -0.008 at 1km to -0.031 at 5km. The magnitude is substantial—representing reductions of 34.8% to 16.7% relative to the respective dependent variable means. In stark contrast, Panels B and C reveal null effects for both violent crimes and other offenses. The coefficients cluster around zero across all distances, are statistically indistinguishable from zero, and represent negligible fractions of the dependent variable means.

Property crimes typically involve deliberate planning and cost-benefit calculation, making them more susceptible to the perceived increases in moral and surveillance costs generated by MCPs. The symbolic presence of martyr commemoration may raise the psychological costs of

committing economically motivated offenses through heightened moral consciousness. Conversely, violent crimes often stem from impulsive, emotionally charged situations where perpetrators are less likely to engage in the type of calculated decision-making that would be influenced by environmental moral cues. The null effects for violent crimes suggest that the mechanisms operating through MCPs—primarily affecting premeditated criminal calculus—have limited purchase on crimes of passion or spontaneous aggression.

Table 3: Effects on Different Categories of Crimes

	1km	2km	3km	4km	5km
<i>Panel A. Property Crime</i>					
DID	-0.008** (0.004)	-0.014* (0.008)	-0.020* (0.011)	-0.025** (0.013)	-0.031** (0.014)
DV Mean	0.023	0.080	0.120	0.155	0.186
Controls	✓	✓	✓	✓	✓
Park FE	✓	✓	✓	✓	✓
Park Type FE	✓	✓	✓	✓	✓
Year × Month FE	✓	✓	✓	✓	✓
Num of Observations	55956	55956	55956	55956	55956
Adj. R <sup>2</sup>	0.275	0.494	0.547	0.570	0.577
<i>Panel B. Violent Crime</i>					
DID	-0.001 (0.001)	0.002 (0.001)	0.001 (0.002)	0.000 (0.002)	0.002 (0.003)
DV Mean	0.002	0.008	0.014	0.019	0.024
Controls	✓	✓	✓	✓	✓
Park FE	✓	✓	✓	✓	✓
Park Type FE	✓	✓	✓	✓	✓
Year × Month FE	✓	✓	✓	✓	✓
Num of Observations	55956	55956	55956	55956	55956
Adj. R <sup>2</sup>	0.040	0.082	0.115	0.150	0.149
<i>Panel C. Others</i>					
DID	-0.001 (0.001)	0.001 (0.001)	0.000 (0.001)	0.000 (0.002)	0.002 (0.002)
DV Mean	0.001	0.006	0.010	0.014	0.017
Controls	✓	✓	✓	✓	✓
Park FE	✓	✓	✓	✓	✓
Park Type FE	✓	✓	✓	✓	✓
Year × Month FE	✓	✓	✓	✓	✓
Num of Observations	55956	55956	55956	55956	55956
Adj. R <sup>2</sup>	0.041	0.082	0.116	0.150	0.148

Notes: \*  $p < 0.1$ , \*\*  $p < 0.05$ , \*\*\*  $p < 0.01$ . Observations are at the park-month level. Standard errors, clustered by park, are shown in parentheses. The model includes park fixed effects, park-type fixed effects, and year × month fixed effects. The mean of the dependent variable is reported.

## 4.2 Parallel Trends and Robustness Checks

This subsection examines the parallel trend assumption for the staggered difference-in-difference design and show evidence of the robustness of the results.

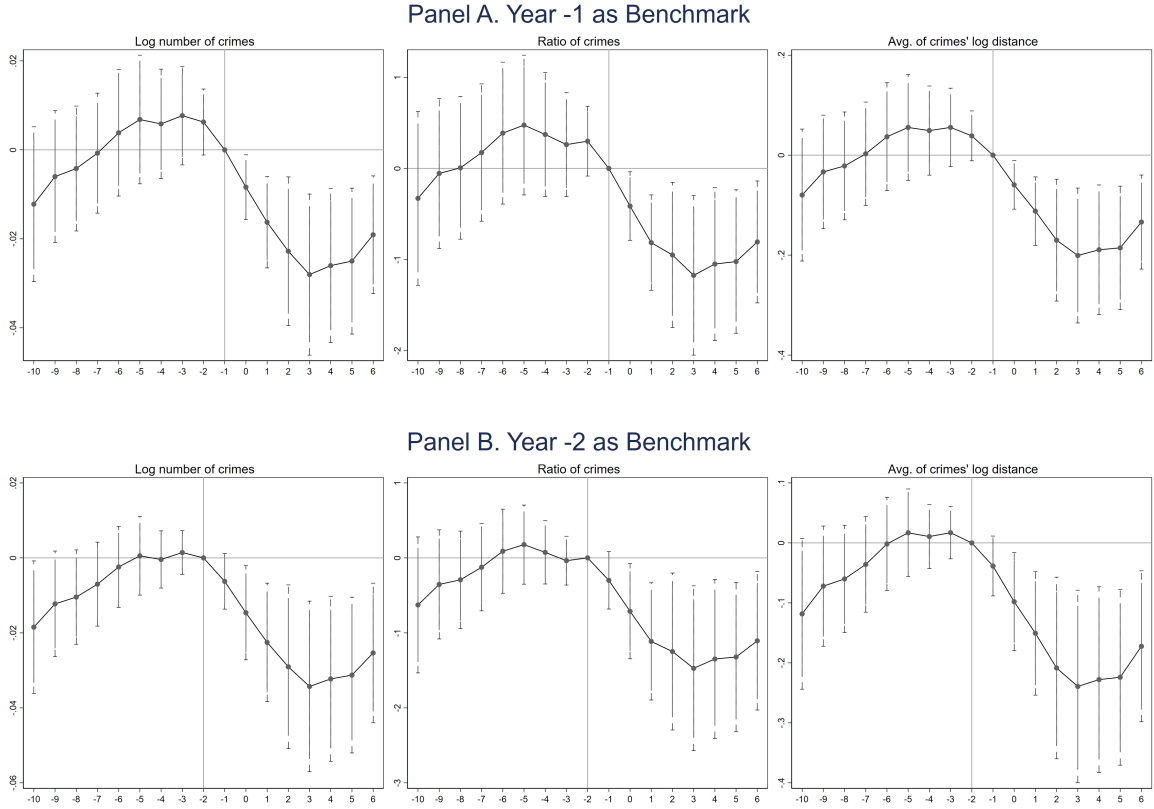
**Parallel trends.** The credibility of the staggered difference-in-differences design rests on satisfying the parallel trends assumption. Figure 3 uses the full 2000-2019 sample (without controls) and reveals pre-trends in crime outcomes are statistically indistinguishable between treatment and control groups across three measures. When normalizing the year preceding MCP establishment as the benchmark (Panel A), it observes a noticeable decline between years -2 and -1, potentially indicating anticipatory effects that I find in previous analysis. To address this concern, I re-estimate the model using year -2 as the reference period (Panel B). This specification reveals no statistically significant pre-trends, while showing a clear downward trajectory in crime outcomes following MCP establishment. Further, I validate these findings using the 2012-2019 subsample with (panel B) or without (panel A) control variables in Figure 4. Yet, no pre-trend exists for all pretreatment periods, while the post-treatment coefficients in both panels display remarkably similar downward trajectories. These results suggest that the observed crime reduction following MCP establishment represents a genuine treatment effect rather than a continuation of pre-existing trends.

**Placebo tests.** I conduct two types of placebo tests to verify that the observed crime-reduction effects are genuinely attributable to MCP establishment rather than spurious correlations or unobserved confounding factors. Panel A in Table 4 presents results from random reassignment of treatment timing. I randomly assign artificial establishment years to MCPs while preserving the actual data structure. The coefficients across all three crime measures are statistically insignificant and economically negligible. Panel B in Table 4 employs a temporal placebo test by artificially advancing the treatment timing by three years. The coefficients remain statistically insignificant across all specifications. The consistency of these placebo tests strengthens the causal interpretation of the main findings. The fact that neither random reassignment nor temporal advancement produces statistically significant effects suggests that the observed crime reduction is specifically tied to the actual timing of MCP establishment.

**Different buffer radii.** The robustness checks (shown in Table A.3, Table A.4, and Table A.5) across three crime measures within varying radius consistently demonstrate that the treatment effect of MCPs exhibits geographic boundaries. The crime-reduction effects remain negatively significant within the 2km to 5km radius range across all specifications, while the treatment effects become statistically insignificant at distances of 10km and beyond. These consistent patterns across multiple crime metrics confirm that MCPs exert localized rather than diffuse impacts, with their crime-reduction influence effectively bounded within approximately 5km radii.

**Selection Bias in MCP Siting over Time.** In the data, newly established MCPs are often located farther from urban centers than the earlier established, likely due to urban expansion

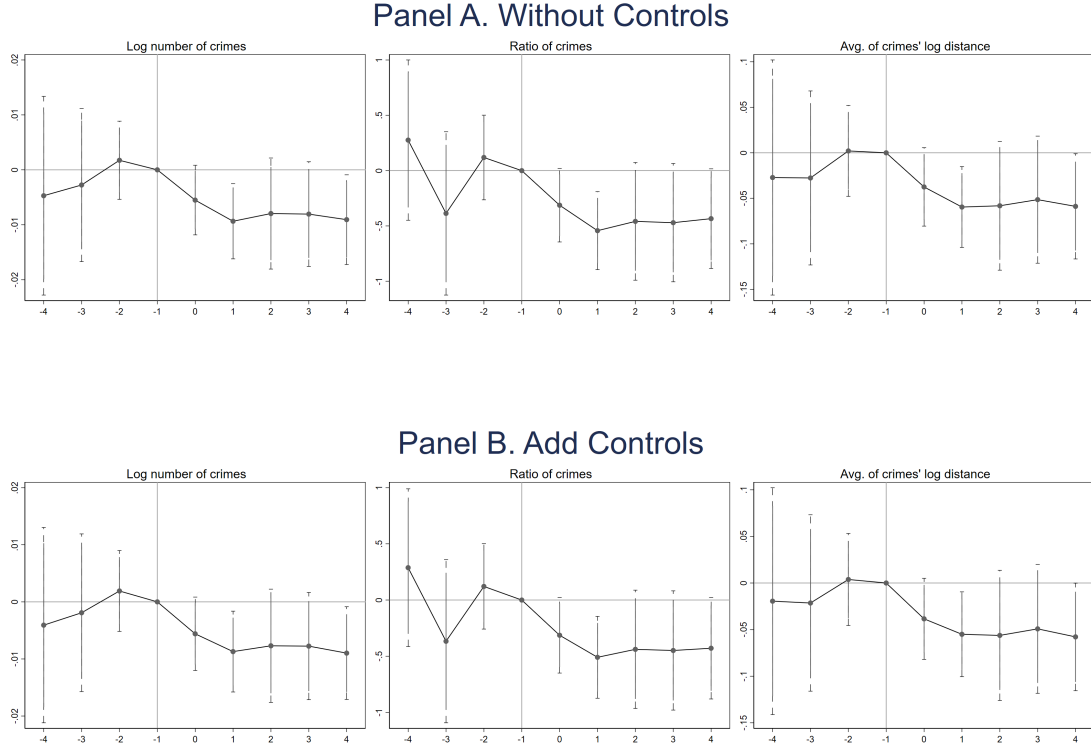
Figure 3: Parallel Trends



*Notes:* Any temporal trends are analyzed comparing the treatment and control groups at the park-month level. The plots connected by the solid line indicate changes in outcomes compared to the benchmark conditional on park fixed effects, park-type fixed effects, and year-month fixed effects. The dashed bars indicate the 95 percent confidence intervals while the solid bars indicate the 90 percent confidence intervals. The standard errors are clustered at the park level.

and higher land costs. This situation could introduce time-varying selection bias, making control areas systematically different from treated areas in the staggered difference-in-difference design. To address this concern, I employ a regression discontinuity difference-in-differences (RD-DD) design (see equation Equation 3), which compares areas that are geographically adjacent and therefore likely similar in both observed and unobserved characteristics prior to the establishment of an MCP and effectively isolate the treatment effect from time-varying spatial selection. Even if MCPs are systematically sited in less central areas over time, the RD-DD estimator identifies the causal impact by leveraging the discontinuity in treatment assignment at the boundary, under the assumption that locations just inside and just outside the cutoff are comparable. A key step in this approach is selecting an appropriate spatial buffer to distinguish treated from control zones. Based on the distance-decay patterns shown in Appendix Figures Table A.3, Table A.4, and Table A.5, I use a 5-km radius to define the treatment boundary: areas within 5 km of an MCP are classified as treated, while those outside serve as controls. One notable feature of this design is that the control area (e.g., the ring from 5 km to 10 km) is

Figure 4: Parallel Trends Using Sub-sample (2012-2019)



*Notes:* Any temporal trends are analyzed comparing the treatment and control groups at the park-month level. The plots connected by the solid line indicate changes in outcomes compared to the benchmark conditional on park fixed effects, park-type fixed effects, and year-month fixed effects. The dashed bars indicate the 95 percent confidence intervals while the solid bars indicate the 90 percent confidence intervals. The standard errors are clustered at the park level.

substantially three times larger than the treated area (the circle within 5 km radius). To ensure comparability, all variables are weighted by zone size in the estimation.

$$Y_{izm} = \alpha + \beta_1 \times MCP_{izm} + \beta_2 \times Adjacent_{izm} + \beta_3 \times MCP_{izm} \times Adjacent_{izm} + \theta'_1 \times \mathbf{X}_{izm} + u_i + \lambda_l + \gamma_z \times \omega_m + \epsilon_{izm} \quad (3)$$

Table 5 presents the RD-DD estimates testing for potential selection bias in MCP siting. The results consistently show a negative and statistically significant interaction term between establishment of MCP and adjacent area across both bandwidth specifications. In the primary comparison (0–5 km vs. 5–10 km), the interaction coefficient is  $-0.120$  ( $p < 0.05$ ), indicating that areas inside the 5 km buffer experience a pronounced drop in crime following MCP establishment relative to nearby outer-ring areas. When a narrower, more contiguous bandwidth is used (3–5 km vs. 5–7 km), the interaction remains significant ( $-0.055$ ,  $p < 0.05$ ), though attenuated



Table 4: Placebo Tests

	Log number of crimes	Ratio of crimes	Avg. of crimes' log distance
<i>Panel A. Replace Treatment with Random Years</i>			
DID	-0.001 (0.002)	-0.049 (0.087)	-0.004 (0.013)
DV Mean	0.011	0.595	0.087
Park FE	✓	✓	✓
Park Type FE	✓	✓	✓
Year × Month FE	✓	✓	✓
Num of Observations	140400	140400	140400
Adj. R <sup>2</sup>	0.153	0.144	0.146
<i>Panel B. Advance Treatment by Three Years</i>			
DID	-0.002 (0.005)	-0.286 (0.283)	-0.022 (0.038)
DV Mean	0.011	0.595	0.087
Park FE	✓	✓	✓
Park Type FE	✓	✓	✓
Year × Month FE	✓	✓	✓
Num of Observations	140400	140400	140400
Adj. R <sup>2</sup>	0.153	0.144	0.146

Notes: \*  $p < 0.1$ , \*\*  $p < 0.05$ , \*\*\*  $p < 0.01$ . Observations are at the park-month level. Standard errors, clustered by park, are shown in parentheses. The model includes park fixed effects, park-type fixed effects, and year × month fixed effects. The mean of the dependent variable is reported.

in magnitude—consistent with a gradual distance-decay of the treatment effect. Besides, Figure A.2 in appendix tests the the sorting phenomena around the treatment boundary and indicates that no significant evidence that change discontinuously at the 5 km cutoff. These estimates reinforce two key points. First, the significant interaction term confirms that the crime reduction is spatially concentrated within the immediate vicinity of MCPs, rather than reflecting citywide or region-wide trends. Second, the fact that the effect remains discernible even when comparing tightly close rings just inside and outside the 5 km cutoff alleviates concerns that the main results are driven by time-varying selection in MCP location. Together, the RD-DD evidence supports the interpretation that MCPs reduce crime in their proximate surroundings.

## 5 Mechanism

In this section, I examine how the establishment of MCPs reduces crime by altering spatial feature and temporal rhythm in adjacent areas.

### 5.1 Spatial Mechanism

The establishment of MCPs represents a deliberate state-led intervention in urban and social space, fundamentally reshaping the institutional and symbolic character of their surroundings. I test two possible hypotheses: whether crime reduction stems from an increase in formal policing or from the clustering of patriotic venues that foster moral suasion.

Table 5: RD-DD Estimates: 5-km Boundary as the Cutoff

	0-5km VS 5-10km	3-5km VS 5-7km
<i>Dependent Variable: Number of crimes</i>		
Establishment of MCP	-0.053* (0.028)	-0.026 (0.017)
Adjacent	0.151*** (0.041)	0.097*** (0.025)
Establishment of MCP $\times$ Adjacent	-0.120** (0.051)	-0.055** (0.025)
DV Mean	0.347	0.165
Controls	✓	✓
Park FE	✓	✓
Park Type FE	✓	✓
Year $\times$ Month FE	✓	✓
Num of Observations	111912	111912
Adj. R <sup>2</sup>	0.489	0.366

Notes: \*  $p < 0.1$ , \*\*  $p < 0.05$ , \*\*\*  $p < 0.01$ . Observations are at the park-month level. Standard errors, clustered by park, are shown in parentheses. The model includes park fixed effects, park-type fixed effects, and year  $\times$  month fixed effects. The mean of the dependent variable is reported.

As shown in Panel A of Table 6, MCP establishment does not lead to a systematic increase in police presence. The coefficients on the log number of police POIs are statistically insignificant across all buffer distances, with point estimates near zero and representing negligible changes relative to the mean. This null effect rules out the hypothesis that crime reduction is driven by enhanced formal surveillance or law enforcement deployment.

In contrast, Panel B of Table 6 reveals a consistent and statistically significant increase in patriotic venues around MCPs. The coefficients are positive and significant across all radii, showing a hump-shaped pattern that peaks at 4km. In economic terms, these estimates represent substantial increases of 22.0% to 36.6% relative to the baseline means. This pattern indicates that MCPs generate meaningful agglomeration effects for symbolic and educational infrastructure.

Further, I examine the direct association between the density of patriotic venues and the log number of crimes. The results reveal a systematic and statistically significant negative relationship that emerges beyond the immediate vicinity of the MCPs. As shown in both panels of Table 7, the coefficients for patriotic POIs remain negative and statistically significant across the 2km to 5km radius range. Notably, the statistically insignificant effect at the 1km radius is theoretically meaningful, suggesting that the crime-reduction is absorbed by the MCP within the very narrow radius.

Table 6: Effects on Police and Patriotic POIs

	1km	2km	3km	4km	5km
<i>Panel A. Log Number of Police POIs</i>					
DID	-0.007 (0.011)	0.018 (0.016)	-0.006 (0.015)	0.001 (0.015)	0.001 (0.016)
DV Mean	0.304	0.653	0.887	1.069	1.244
Controls	✓	✓	✓	✓	✓
Park FE	✓	✓	✓	✓	✓
Park Type FE	✓	✓	✓	✓	✓
Year × Month FE	✓	✓	✓	✓	✓
Num of Observations	55956	55956	55956	55956	55956
Adj. R <sup>2</sup>	0.908	0.951	0.957	0.961	0.960
<i>Panel B. Log Number of Patriotic POIs</i>					
DID	0.015* (0.008)	0.029*** (0.010)	0.037*** (0.011)	0.039*** (0.012)	0.033*** (0.012)
DV Mean	0.041	0.107	0.149	0.177	0.202
Controls	✓	✓	✓	✓	✓
Park FE	✓	✓	✓	✓	✓
Park Type FE	✓	✓	✓	✓	✓
Year × Month FE	✓	✓	✓	✓	✓
Num of Observations	55956	55956	55956	55956	55956
Adj. R <sup>2</sup>	0.721	0.844	0.864	0.874	0.884

Notes: \*  $p < 0.1$ , \*\*  $p < 0.05$ , \*\*\*  $p < 0.01$ . Observations are at the park-month level. Standard errors, clustered by park, are shown in parentheses. The model includes park fixed effects, park-type fixed effects, and year × month fixed effects. The mean of the dependent variable is reported.

## 5.2 Temporal Mechanism

I further examine the temporal dimension of how Martyrs' Cemetery Parks (MCPs) affect local crimes. The temporal mechanism hypothesis suggests that MCPs generate seasonal reductions in crime through intensified memorial and patriotic activities during specific months. I conceptualize and measure the intensity of this temporal mechanism through three observable issues. First, I identify all memorial days and public holidays related to MCPs as shown in Figure A.1, finding they concentrate predominantly in the August-October period. Second, these activities primarily involve participation from students and public sector employees, groups particularly responsive to patriotic education initiatives. Third, the activities are spatially anchored at MCPs themselves.

To test this mechanism and heterogeneous treatment effects across the calendar year, I employ a three way interaction term between MCP establishment, monthly indicators, and density of schools or police stations. The coefficient plots in Figure 5 reveal a distinct seasonal pattern: the crime-reduction effect of MCPs strengthens significantly during the August-October period, with the strongest effect observed in September. This pattern aligns precisely with the concen-

Table 7: Patriotic POIs and Crimes

	1km	2km	3km	4km	5km
<i>Panel A. Without Controls</i>					
Log Number of Patriotic POIs	-0.008 (0.014)	-0.053*** (0.020)	-0.050* (0.026)	-0.081*** (0.031)	-0.061** (0.029)
DV Mean	0.041	0.107	0.149	0.177	0.202
Park FE	✓	✓	✓	✓	✓
Park Type FE	✓	✓	✓	✓	✓
Year × Month FE	✓	✓	✓	✓	✓
Num of Observations	55956	55956	55956	55956	55956
Adj. R <sup>2</sup>	0.322	0.522	0.571	0.593	0.601
<i>Panel B. Add Controls</i>					
Log Number of Patriotic POIs	-0.008 (0.014)	-0.056*** (0.020)	-0.048* (0.026)	-0.080** (0.031)	-0.059** (0.029)
DV Mean	0.041	0.107	0.149	0.177	0.202
Park FE	✓	✓	✓	✓	✓
Park Type FE	✓	✓	✓	✓	✓
Year × Month FE	✓	✓	✓	✓	✓
Num of Observations	55956	55956	55956	55956	55956
Adj. R <sup>2</sup>	0.322	0.524	0.574	0.596	0.604

Notes: \*  $p < 0.1$ , \*\*  $p < 0.05$ , \*\*\*  $p < 0.01$ . Observations are at the park-month level. Standard errors, clustered by park, are shown in parentheses. The model includes park fixed effects, park-type fixed effects, and year × month fixed effects. The mean of the dependent variable is reported.

tration of memorial activities and the involvement of organized groups during these months.

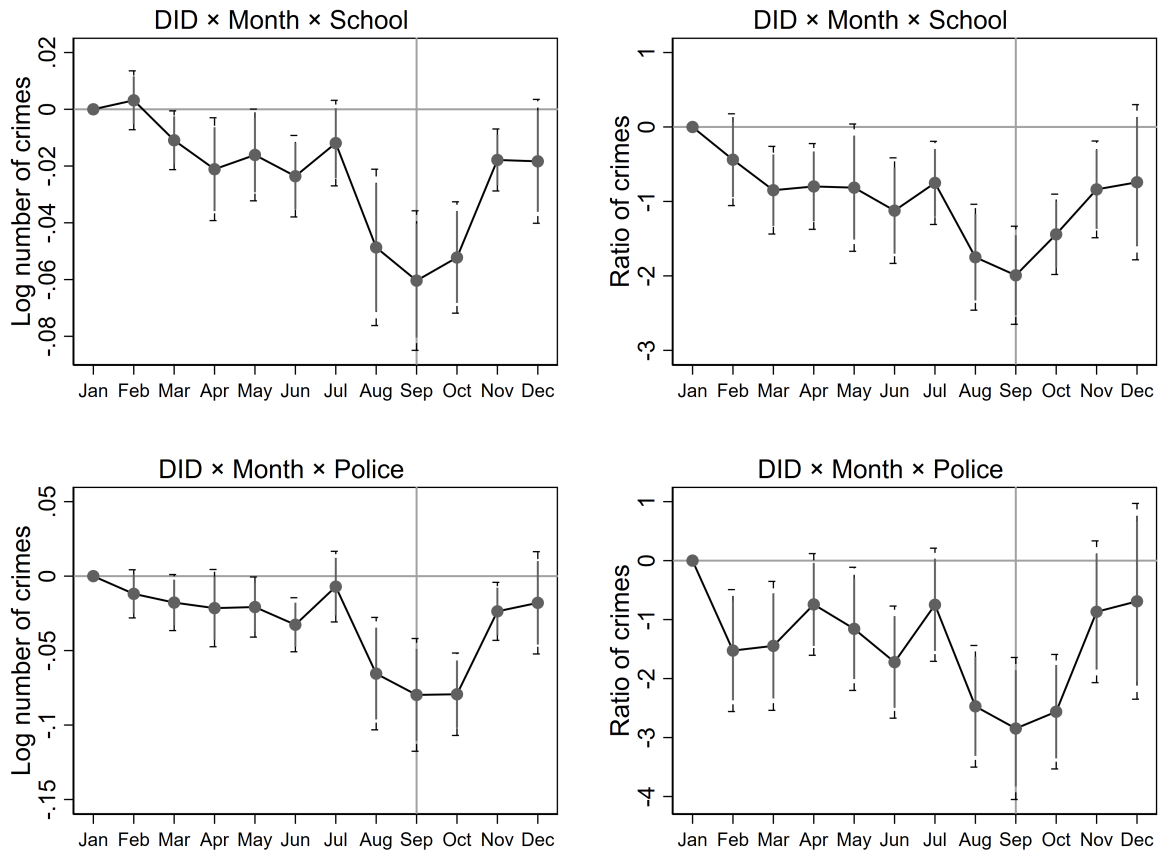
To provide more rigorous causal evidence for the temporal mechanism, I leverage the exogenous establishment of two national memorial days (Victory Day of the War of Resistance Against Japan, and Martyrs' Memorial Day) in 2014 as a policy shock in a triple differences (DDD) design. Table 8 presents the results, which reveal a nuanced pattern of how state-led commemoration amplifies the crime-reduction effect of MCPs through institutional channels.

The baseline DID × After 2014 interaction in columns (1) and (4) shows statistically significant negative coefficients (-0.026 for log crimes; -1.067 for crime ratio), indicating that the establishment of memorial days strengthened the crime-reduction effect of MCPs.

The DID × After 2014 × September interaction term in columns (2) and (5) reveals substantial negative and statistically significant coefficients (-0.024 for log crimes; -1.008 for crime ratio), indicating that the crime-reduction effect was particularly concentrated in September following the establishment of the memorial days. This aligns with the timing of both newly established commemorations—Victory Day of the War of Resistance Against Japan (September 3) and Martyrs' Memorial Day (September 30).

Further, the DID × After 2014 × September × Log Num of School POIs term shows statistically significant negative coefficients (-0.066 for log crimes; -3.331 for crime ratio), demonstrat-

Figure 5: Monthly Trends



*Notes:* Any temporal trends are analyzed comparing the treatment and control groups at the park-month level. The plots connected by the solid line indicate changes in outcomes compared to the benchmark conditional on park fixed effects, park-type fixed effects, and year-month fixed effects. The dashed bars indicate the 95 percent confidence intervals while the solid bars indicate the 90 percent confidence intervals. The standard errors are clustered at the park level.

ing that the September crime-reduction effect is strongest in areas with higher school density. This pattern supports the proposed mechanism that schools serve as key organizational vehicles for memorial activities, magnifying the moral suasion effect through structured participation.

The coefficient progression across specifications reveals an important pattern: the baseline DID x After 2014 effect becomes statistically insignificant once I account for the September concentration and school-mediated mechanisms. This suggests that the memorial day effect operates primarily through the intensive margin of September activities facilitated by educational institutions, rather than through uniform year-round impacts.

These findings provide compelling evidence for the temporal mechanism: state-led memorialization creates predictable seasonal reductions in crime that operate through institutional channels. The concentration of effects in September and their amplification in high-school-density areas demonstrates how political commemoration translates into social order through organized participation rather than mere symbolic presence.

Table 8: Effects of Establishing Memorial Days on Crimes

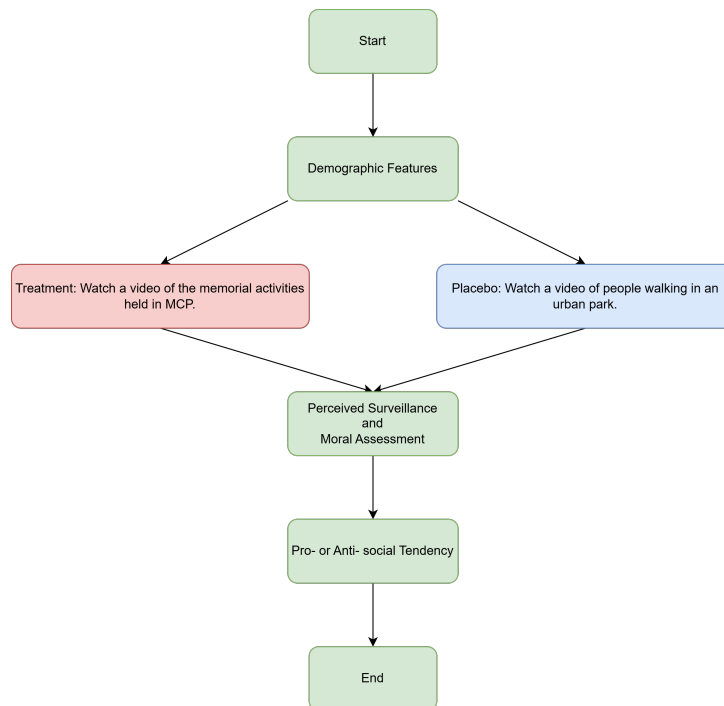
	Log number of crimes			Ratio of crimes		
	(1)	(2)	(3)	(4)	(5)	(6)
DID	0.010** (0.004)	0.010** (0.004)	-0.004 (0.002)	0.394 (0.217)	0.379 (0.224)	-0.084 (0.105)
After 2014	0.027** (0.008)	0.025** (0.008)	-0.002 (0.004)	1.164** (0.402)	1.110** (0.401)	0.115 (0.160)
DID × After 2014	-0.026** (0.008)	-0.024** (0.008)	0.003 (0.004)	-1.067** (0.415)	-0.983** (0.412)	-0.073 (0.192)
September		-0.001 (0.003)	0.002 (0.002)		0.014 (0.100)	0.165 (0.090)
DID × September		-0.000 (0.003)	-0.002 (0.004)		0.177 (0.119)	-0.444** (0.178)
After 2014 × September		0.020*** (0.002)	-0.014*** (0.004)		0.644** (0.190)	-0.385** (0.155)
DID × After 2014 × September		-0.024*** (0.002)	0.020*** (0.004)		-1.008*** (0.244)	0.816*** (0.173)
Log Num of School POIs			-0.034 (0.018)			-1.473 (0.892)
DID × Log Num of School POIs			0.030** (0.010)			0.989* (0.470)
After 2014 × Log Num of School POIs			0.050** (0.015)			1.890** (0.762)
DID × After 2014 × Log Num of School POIs			-0.043*** (0.010)			-1.384** (0.503)
September × Log Num of School POIs			-0.007 (0.011)			-0.318 (0.365)
DID × September × Log Num of School POIs			0.005 (0.014)			1.532** (0.480)
After 2014 × September × Log Num of School POIs			0.050*** (0.006)			1.551*** (0.342)
DID × After 2014 × September × Log Num of School POIs			-0.066*** (0.009)			-3.331*** (0.464)
DV Mean	0.028	0.028	0.028	1.430	1.430	1.430
Controls	√	√	√	√	√	√
Park FE	√	√	√	√	√	√
Park Type FE	√	√	√	√	√	√
Num of Observations	55956	55956	55956	55956	55956	55956
Adj. R <sup>2</sup>	0.318	0.318	0.327	0.299	0.299	0.303

Notes: \*  $p < 0.1$ , \*\*  $p < 0.05$ , \*\*\*  $p < 0.01$ . Observations are at the park-month level. Standard errors, clustered by park, are shown in parentheses. The model includes park fixed effects, park-type fixed effects, and year × month fixed effects. The mean of the dependent variable is reported.

### 5.3 Psychological issues

While prior evidence establishes that MCPs alter local spatial configurations and temporal rhythms, it remains insufficient to determine whether the observed crime-reduction stems primarily from changes in visitors flow rate or from deeper, internal psychological shifts induced by patriotic education. Furthermore, even if psychological change does occur, the specific mental mechanism remains unclear: is it heightened perceived surveillance, or genuine moral persuasion? To disentangle these pathways, this study implements a survey experiment designed to isolate and measure the psychological changes attributable to MCP exposure, as detailed in the procedure outlined in Figure 6.

Figure 6: Procedure



*Source:*

(The experiment is under preparation.)

To generalize the moral suasion inference from the vignette experiment, this study incorporates data from the 2014 China Labor-force Dynamics Survey. Table A.6 presents the OLS estimates of the relationship between MCPs and citizen perceptions. The results consistently show that a higher number of MCPs in the civic landscape is associated with greater perceived safety, lower perceived crime probability, and a stronger self-reported desire to help others. Critically, the inclusion of the desire to help others in columns (4) and (8) reveals a significant positive relationship with safety and a negative one with crime probability, suggesting it acts as a plausible channel. This pattern aligns with the theory of moral suasion: MCPs may cultivate a pro-social civic ethos, which in turn enhances collective perceptions of order and security.

To establish a causal interpretation, Table 9 employs an instrumental variable (IV) strategy, exploiting geographic distance to major revolutionary base areas (RBAs) as a source of exogenous variation in MCP construction. The identification relies on two assumptions. First, relevance: proximity to historical revolutionary centers is a strong predictor of MCP density, as areas with greater sacrificial legacy naturally developed more commemorative infrastructure. Second, exclusion restriction: conditional on controls and province fixed effects, a city’s distance to these historical sites likely influences contemporary civic perceptions only through its effect on the stock of MCPs, not through other direct channels.

The 2SLS estimates across all three panels yield directionally consistent and statistically significant results, confirming the core finding that MCPs enhance perceived safety and prosocial attitudes while reducing perceived crime risk. Notably, the instrument employing the distance to the closest RBA (Panel A) is theoretically and empirically preferable to those relying on distance to a single, specific RBA such as Jinggangshan or Yan’an (Panels B and C). Even though the F statistics of Yan’an RBA is the largest, a single-base instrument may be disproportionately influenced by the unique historical, geographical, and subsequent political-economic trajectory of that particular location, which could correlate with contemporary civic perceptions through channels other than MCPs—violating the exclusion restriction. The closest-distance metric mitigates this concern by synthesizing the influence of multiple historical centers, thereby providing a more generalized and exogenous measure of a city’s historical integration into the revolutionary struggle. This approach is particularly apt given that the construction of martyr cemeteries draws upon the legacy of multiple, distinct war periods (e.g., the Civil Wars and the Anti-Japanese War). By considering the distance to the closest major RBA, the instrument more fully captures the exogenous historical impetus for commemorative infrastructure, yielding a stronger and more stable first-stage relationship and, consequently, more precise causal estimates.

## 6 Conclusion

Based on a comprehensive empirical analysis employing staggered difference-in-differences designs and multiple robustness checks, this study demonstrates that Martyrs’ Cemetery Parks in China significantly reduce street crime in their immediate vicinity, establishing a novel pathway of social control operating through spatial politics. I find robust evidence that MCPs lead to a sustained decrease in local crime counts and ratios, with effects that systematically decay as geographic distance increases. Crucially, mechanism analyses reveal that this crime-reduction effect operates not through traditional formal control—as police presence remains unchanged—but through the cultivation of a moral ecosystem by altering spatial and temporal specifications. The establishment of MCPs catalyzes the agglomeration of patriotic education venues and amplifies the crime-reducing impact during ritual-intensive periods (August-October), particularly



Table 9: Instrument Variable Estimates

	Perceived Safety	Perceived Crime Probability	Desire to Help Others
<i>Panel A. IV: Distance to the Closest RBA</i>			
Number of MCPs	0.175*** (0.037)	-0.033* (0.019)	0.186*** (0.048)
Cragg-Donald Wald F statistic		41.082	
Anderson canon. corr. LM statistic		41.071 (p=0.000)	
DV Mean	3.195	1.181	3.396
Province FE	√	√	√
Controls	√	√	√
Num of Observations	18624	18624	18624
<i>Panel B. IV: Distance to Jinggangshan RBA</i>			
Number of MCPs	0.366* (0.199)	-0.211* (0.119)	0.570* (0.310)
Cragg-Donald Wald F statistic		3.953	
Anderson canon. corr. LM statistic		3.959 (p=0.000)	
DV Mean	3.195	1.181	3.396
Year FE	√	√	√
Province FE	√	√	√
Controls	18624	18624	18624
<i>Panel C. IV: Distance to Yan'an RBA</i>			
Number of MCPs	0.140*** (0.018)	-0.040*** (0.010)	0.097*** (0.022)
Cragg-Donald Wald F statistic		143.695	
Anderson canon. corr. LM statistic		142.868 (p=0.000)	
DV Mean	3.195	1.181	3.396
Province FE	√	√	√
Controls	√	√	√
Num of Observations	18624	18624	18624

Notes:

in areas with higher school density.

These findings illuminate a sophisticated mode of social control that operates through the symbolic appropriation of urban space. The demonstrated capacity of memorial architecture to reduce crime through non-coercive channels offers new insights for predominant theories of social control that prioritize either state coercion or social norms. Rather, the evidence suggests that the Chinese state has effectively developed a hybrid strategy—what might be termed “spatialized governance” or “infrastructural governance”—that harnesses the moral authority (martyrs) of historical narrative to shape public behavior. Particularly, the effectiveness against property crimes reveals the mechanism’s reliance on calculative decision-making: unlike impulsive violence, property offenses involve sufficient deliberation to be influenced by environmental moral cues. The seasonal intensification during commemorative periods further demonstrates how the state creates rhythmic governance to reinforce social order. Furthermore, the patriotic-education-school-mediated effects reveal how existing institutional networks amplify state symbolism, suggesting that the efficacy of spatial governance depends crucially on its integration with societal organizations. This case thus advances the understanding of state-society

relations by showing how political power flows not only through administrative hierarchies but also through the subtle restructuring of civic consciousness via everyday environments.

Several limitations warrant acknowledgment. First, while I demonstrate behavioral changes through crime reduction, I lack direct psychological evidence documenting the proposed moral suasion mechanism. Future research could integrate surveys or experimental methods to measure individual-level moral consciousness and emotional responses. Second, our crime data, drawn from court judgments, potentially suffers from selection bias as only formally adjudicated cases entering the judicial system are recorded. This may underrepresent minor offenses and crimes resolved through informal channels. Third, the Chinese-specific context—combining unique political traditions, memorialization practices, and institutional environments—may limit direct cross-cultural applicability. The particular resonance of martyr symbolism within China’s revolutionary historical narrative might not readily transfer to other political settings. Future studies could test whether similar spatial governance mechanisms operate in different regime types with alternative symbolic resources. These limitations, however, do not undermine our core findings but rather outline productive pathways for extending the research on spatial politics and social control.

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# Appendix A

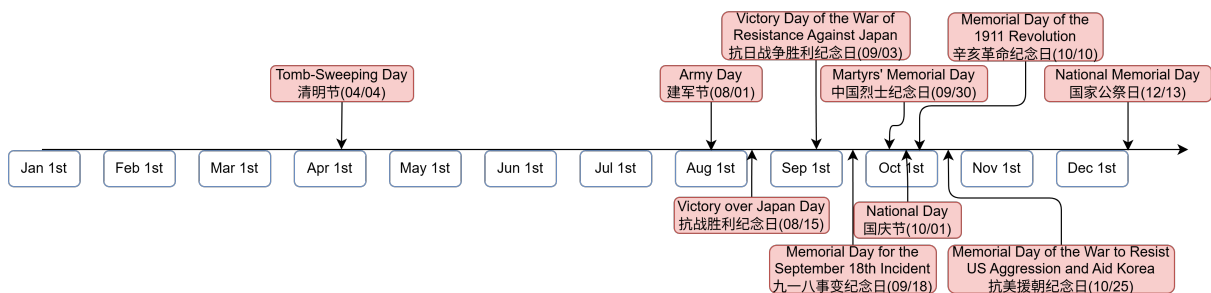
Table A.1: Summary Statistics

	Mean	SD	Min	Max	Num of Obs.
Number of crimes within 1km radius	0.019	0.189	0.000	7.000	140400
Ratio of crimes within 1km radius	0.595	5.442	0.000	85.714	140400
Avg. of crimes' log distance within 1km radius	0.087	0.745	0.000	6.908	140400
Number of Patriotic POIs within 1km radius	0.071	0.362	0.000	6.000	55956
Number of Police POIs within 1km radius	0.682	1.586	0.000	21.000	55956
Number of Restaurant POIs within 1km radius	23.448	81.347	0.000	811.000	55956
Number of School POIs within 1km radius	2.108	5.931	0.000	88.000	55956
Number of New Base Stations within 2km radius	1.430	86.426	0.000	9212.000	140400
Type of martyrs' cemetery park	3.675	0.605	1.000	4.000	140400

Table A.2: POI data

Variable	Category	Keywords
Police Stations	Government Institutions (政府机构)	Police Station (派出所), Public Security Bureau (公安局)
Patriotic Venues	Government Institutions (政府机构), Scenic Attractions (风景名胜), Scientific & Educational & Cultural Sectors (科教文卫)	Communist (红色), Patriotic (爱国), Revolutionary (革命), Memorial Halls (纪念馆)
Schools	Scientific & Educational & Cultural Sectors (科教文卫)	Primary School (小学), Secondary School (中学), Middle School (初中), High School (高中), School (学校), College (学院), University (大学)
Restaurants	Food and Beverage (餐饮)	NA

Figure A.1: Memorial Days and Public Holidays Related to Martyrs' Cemetery



Source: Self-made figure.

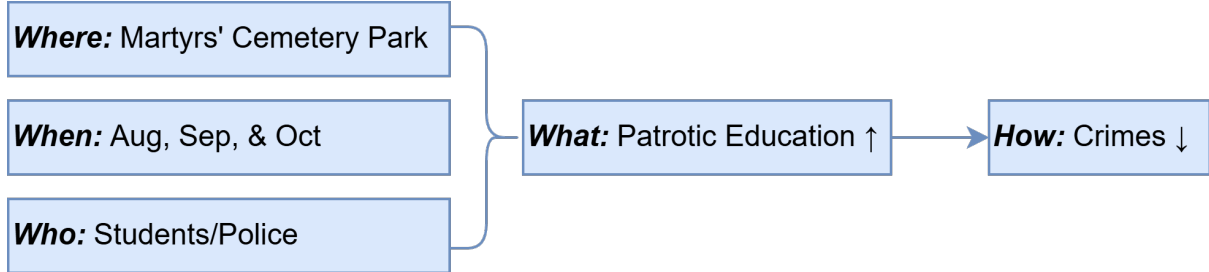


Table A.3: Effects on Log Number of Crimes within Different Radius

<i>Panel A.</i>	2km	3km	4km	5km
DID	-0.043*** (0.017)	-0.053** (0.023)	-0.069** (0.027)	-0.069** (0.029)
DV Mean	0.039	0.058	0.076	0.091
Park FE	√	√	√	√
Park Type FE	√	√	√	√
Year × Month FE	√	√	√	√
Num of Observations	140400	140400	140400	140400
Adj. R <sup>2</sup>	0.267	0.304	0.329	0.345
<i>Panel B.</i>	10km	15km	20km	25km
DID	-0.061 (0.038)	-0.057 (0.044)	-0.041 (0.048)	-0.040 (0.050)
DV Mean	0.168	0.246	0.322	0.395
Park FE	√	√	√	√
Park Type FE	√	√	√	√
Year × Month FE	√	√	√	√
Num of Observations	140400	140400	140400	140400
Adj. R <sup>2</sup>	0.415	0.483	0.541	0.591

Notes: \*  $p < 0.1$ , \*\*  $p < 0.05$ , \*\*\*  $p < 0.01$ . Observations are at the park-month level. Standard errors, clustered by park, are shown in parentheses. The model includes park fixed effects, park-type fixed effects, and year × month fixed effects. The mean of the dependent variable is reported.



Table A.4: Effects on Ratio of Crimes within Different Radius

<i>Panel A.</i>	2km	3km	4km	5km
DID	-1.414** (0.679)	-1.736* (0.942)	-2.455** (1.106)	-2.477** (1.187)
DV Mean	1.947	2.901	3.776	4.468
Park FE	√	√	√	√
Park Type FE	√	√	√	√
Year × Month FE	√	√	√	√
Num of Observations	140400	140400	140400	140400
Adj. R <sup>2</sup>	0.225	0.268	0.299	0.317
<i>Panel B.</i>	10km	15km	20km	25km
DID	-1.657 (1.297)	-1.886 (1.227)	-1.792 (1.234)	-0.673 (1.197)
DV Mean	7.164	8.987	10.334	11.507
Park FE	√	√	√	√
Park Type FE	√	√	√	√
Year × Month FE	√	√	√	√
Num of Observations	140400	140400	140400	140400
Adj. R <sup>2</sup>	0.370	0.408	0.439	0.465

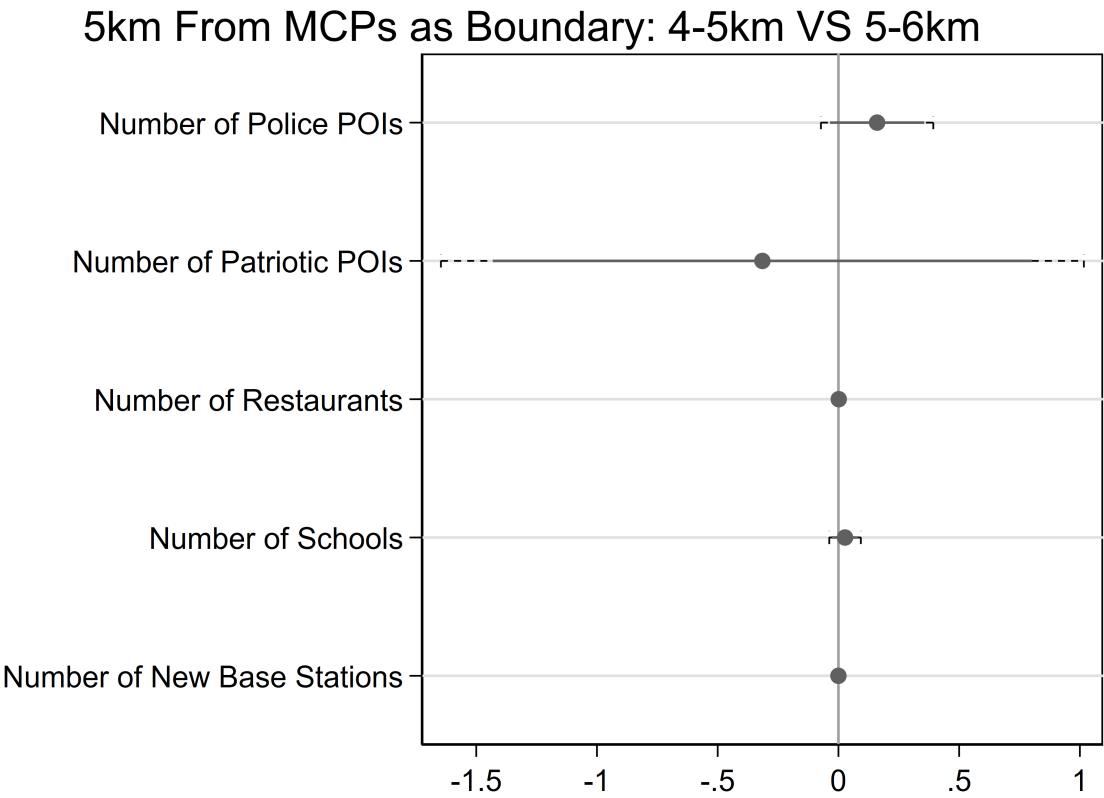
Notes: \*  $p < 0.1$ , \*\*  $p < 0.05$ , \*\*\*  $p < 0.01$ . Observations are at the park-month level. Standard errors, clustered by park, are shown in parentheses. The model includes park fixed effects, park-type fixed effects, and year × month fixed effects. The mean of the dependent variable is reported.

Table A.5: Effects on Avg. of Crimes' Log Distance within Different Radius

<i>Panel A.</i>	2km	3km	4km	5km
DID	-0.248** (0.096)	-0.225* (0.119)	-0.289** (0.135)	-0.276* (0.146)
DV Mean	0.278	0.408	0.533	0.643
Park FE	√	√	√	√
Park Type FE	√	√	√	√
Year × Month FE	√	√	√	√
Num of Observations	140400	140400	140400	140400
Adj. R <sup>2</sup>	0.237	0.269	0.289	0.306
<i>Panel B.</i>	10km	15km	20km	25km
DID	-0.079 (0.170)	0.004 (0.173)	0.057 (0.173)	0.060 (0.169)
DV Mean	1.201	1.715	2.163	2.574
Park FE	√	√	√	√
Park Type FE	√	√	√	√
Year × Month FE	√	√	√	√
Num of Observations	140400	140400	140400	140400
Adj. R <sup>2</sup>	0.380	0.448	0.506	0.552

Notes: \*  $p < 0.1$ , \*\*  $p < 0.05$ , \*\*\*  $p < 0.01$ . Observations are at the park-month level. Standard errors, clustered by park, are shown in parentheses. The model includes park fixed effects, park-type fixed effects, and year × month fixed effects. The mean of the dependent variable is reported.

Figure A.2: Test the Sorting Phenomena around 5-km Cutoff



Notes: Any temporal trends are analyzed comparing the treatment and control groups at the park-month level. The plots connected by the solid line indicate changes in outcomes compared to the benchmark conditional on park fixed effects, park-type fixed effects, and year-month fixed effects. The dashed bars indicate the 95 percent confidence intervals while the solid bars indicate the 90 percent confidence intervals. The standard errors are clustered at the park level.

Table A.6: Number of MCPs and Psychological Issues

	Perceived Safety			Perceived Crime Probability				Desire to Help Others			
	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)
Log Number of MCPs	0.017*** (0.006)	0.069*** (0.007)	0.035*** (0.007)		-0.030*** (0.004)	-0.039*** (0.005)	-0.031*** (0.005)		0.050*** (0.009)	0.111*** (0.011)	0.046*** (0.010)
Desire to Help Others				0.127*** (0.005)				-0.023*** (0.003)			
DV Mean	3.195	3.195	3.195	3.195	1.181	1.181	1.181	1.181	3.396	3.396	3.396
Province FE	x	✓	✓	✓	x	✓	✓	✓	x	✓	✓
Controls	x	x	✓	✓	x	x	✓	✓	x	x	✓
Num of Observations	18624	18624	18624	18624	18624	18624	18624	18624	18624	18624	18624
Adj. R <sup>2</sup>	0.000	0.060	0.101	0.132	0.003	0.024	0.030	0.031	0.002	0.087	0.149

Notes: