

# More Police Does Not Mean Less Crime 

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## Executive Summary

## ...it is

debatable whether there is much room for crime reduction...

- A common assumption among Canadian policy makers is that hiring more police officers will lead to a reduction in the overall crime rate. Research from the United States and the United Kingdom establishes that an increased police presence can reduce crime in some contexts.
- Canadian urban centres are relatively safe and it is debatable whether there is much room for crime reduction and subsequent prevention in most of them.
- Analysis of crime rates, clearance rates and police staffing data suggests that increasing police staffing numbers has diminishing returns for crime reduction.
- Canadian cities that are facing crime problems have adequately staffed police services. Making more effective use of one-officer police cruisers and eliminating redundancies are more reasonable policy alternatives to an increase in police staffing.
- Providing funding for more police officers without proper scrutiny would be fiscally irresponsible.


## Analysis

Violent crime has been shunted to the forefront of the political agenda in urban Canada due in part to a rash of high profile homicides in Toronto. The Eaton's Centre, a College Avenue café, and a Scarborough housing complex were all scenes of fatal shootings in the City of Toronto during broad daylight this past summer. Though Toronto Police reports confirmed that the shootings were not random actions, many residents and politicians have called for an increased police presence. In response to the Scarborough shooting (believed to be gang related), Toronto Mayor Rob Ford demanded additional funding from Ontario Premier Dalton McGuinty for the Toronto Anti Violence Intervention Strategy (TAVIS) police teams. ${ }^{1}$ The panic over violent crime is far from a Toronto-centric problem. Violence has become such a concern in Edmonton that the police department there recommended curbing liquor store hours. 2 Air Canada is so concerned about crime in Downtown Winnipeg that it has deemed several downtown hotels too dangerous to house its staff during layovers. These events have lent momentum to the Conservative government's tough on crime agenda. But Conservatives aren't the only federal politicians who are making crime reduction a priority. Federal NDP justice critic Francoise Boivin also suggested that the federal government should be providing more officers as a means of preventing shootings and other violent crimes. ${ }^{3}$ Missing from the discussion is the question whether hiring more police officers leads to less crime? Under some circumstances, the answer is yes (with caveats). In Canadian cities, the answer appears to be no.

Hiring more police officers seems an obvious way to reduce crime. If there are more police on the ground it should be easier to catch criminals. Increasing the percentage of crimes in which the police lay a charge (clearance rate), as well as a more visible police presence ought to have a deterrent effect on criminals. Indeed, a recent analysis of the most significant studies on the correlation between police levels and crime from Her Majesty's Inspectorate of Constabulary (HMIC) has found that a 10\% increase in officers could lead to a 3\% decrease in crime (and vice versa). 4 Of course, like most studies on the subject, the report cautions against drawing strong conclusions: "Despite the apparent consistency of recent research it is too early to say, for all the reasons given above, that there is a direct causal link between higher numbers of police and lower crime." ${ }^{5}$ In reality, the answer to the question of whether more police leads to less crime is that it depends on the context.

Though the literature is by no means unanimous, a wealth of academic studies has cast doubt upon the notion that increasing the number of police officers reduces crime rates. Criminology studies have shown have lent momentum to the Conservative government's tough on crime agenda...

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that an influx of police patrols and follow-up detective investigations in American urban centres have not always produced positive results. ${ }^{6}$ It is by no means suggesting that police officers are ineffectual in crime prevention but rather that a surge of more officers without other policy changes can prove to be a waste. An Australian case study, for instance, confirmed that an increase in police is an effective means of crime prevention only when it is supplemented by policies that make general deterrence or prevention the primary goal. $\underline{\text { }}$ The "broken window" approach taken by the New York Police Department (NYPD) in the 1990s is a prime example. $\frac{8}{}$

The broken window approach was predicated on the idea that enforcement against minor crimes such as vandalism would send the message to criminals that the law is being enforced. Violent crime declined by 56 per cent and property crime by 65 per cent in New York during the 1990s. Nationally, these indicators declined by 28 and 26 per cent, respectively. ${ }^{9}$ While advocates often overstate the impact of broken window policing, it had a positive impact. 10 A limiting factor is that most of the aforementioned studies on the relationship between the number of police and crime in a city are based on U.S. data. The magnitude of the historic and current crime problems in American cities make importing these solutions to Canada challenging.
Many American cities contain major crime hot spots that skew crime statistics upward. These are areas where the benefit of increased police spending can vastly outweigh the cost. While the underlying causes of crime in these areas-the legacy of racism, strong gang presence, distrust of the authorities, poverty, and so forth-virtually ensure elevated crime levels, an overwhelming display of police force can have a substantial effect on reducing crimes. These areas tend to have an aura of lawlessness, which encourages criminal activity. It is why the Broken Window approach had such spectacular results in New York City during the 90s, and in Los Angeles during the 2000s. ${ }^{11}$ By restoring the sense that the law would be enforced, police were able to increase citizen perception of safety. And when people feel safe, they feel comfortable being outside in their neighbourhoods. It is a cycle that results in more eyes on the street, which further dissuades criminals. However, this approach is only effective in neighbourhoods where there is a perceived lack of law enforcement. Few such neighbourhoods exist in Canadian cities.

Canadian cities already have low crime rates. Even the safest US cities would rank alongside the most dangerous Canadian cities. Consider a quick comparison of some homicide rates. Toronto, lauded as Canada's safest big city, had a homicide rate of 2.2 per 100,000 people in 2010, which was only slightly above the national average of 1.6 persons. Saskatoon, ranked as one of Canada's most dangerous cities in 2010, had a homicide rate of 4.4. In 2009 (the most recent year for which
the U.S. Census Bureau has city level crime data), Seattle, one of the United States' safest cities, had a homicide rate of 3.7.12 The most dangerous US city in 2009, New Orleans, had a homicide rate of 51.7.13 The overall Canadian homicide rate in 2010 was $1.6, \mathbf{1 4}^{14}$ compared to 5.0 in the United States in 2009. 15 The approaches derived from and implemented in the most dangerous American cities are not necessarily applicable to Canadian cities, since there simply is not an urban crime epidemic in Canada. Tough medicine only works when there is a disease to cure.


## CHART 1

## Homicides per 100,000 Persons

 $\square$ U.S. Cities (2009) ■ Canadian Cities (2010)60.0

The approaches derived from and implemented in the most dangerous American cities are not necessarily applicable to Canadian cities...

For list of cities, see next page.

FRONTIER BACKGROUNDER

| City | Country | Homicides per 100,000 | Population | City | Country | Homicides per 100,000 | Population |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| New Orleans, LO | USA | 51.7 | 336425 | Thunder Bay | Canada | 4.3 | 116,937 |
| St. Louis, MO | USA | 40.3 | 355208 | Scottsdale, AZ | USA | 4.2 | 239115 |
| Detroit, MI | USA | 40.0 | 908441 | Corpus Christi, TX | USA | 4.2 | 287507 |
| Baltimore, MD | USA | 37.3 | 638755 | Reno, NV | USA | 4.1 | 221010 |
| Baton Rouge, LA | USA | 33.6 | 223187 | Regina | Canada | 4.0 | 198,322 |
| Newark, NJ | USA | 28.7 | 279203 | Yonkers, NY | USA | 4.0 | 202192 |
| Birmingham, AL | USA | 28.6 | 227373 | Hialeah, FL | USA | 3.8 | 208874 |
| Oakland, CA | USA | 25.7 | 404553 | Colorado Springs, CO | USA | 3.7 | 401626 |
| Washington, DC | USA | 24.0 | 599657 | Seattle, WA | USA | 3.7 | 602531 |
| Buffalo, NY | USA | 22.3 | 268655 | Spokane, WA | USA | 3.4 | 202932 |
| Kansas City, MO | USA | 20.6 | 484684 | Raleigh, NC | USA | 3.4 | 406005 |
| Memphis, TN | USA | 19.8 | 667421 | Portland, OR | USA | 3.4 | 560908 |
| Philadelphia, PA | USA | 19.5 | 1547605 | Winnipeg | Canada | 3.2 | 684,061 |
| Cleveland, OH | USA | 19.3 | 429238 | Garland, TX | USA | 3.2 | 218872 |
| Richmond, VA | USA | 19.2 | 203233 | Arlington, TX | USA | 3.2 | 379104 |
| Norfolk, VA | USA | 17.9 | 235097 | San Diego, CA | USA | 3.1 | 1314773 |
| Tulsa, OK | USA | 17.7 | 384851 | Edmonton | Canada | 3.1 | 830,496 |
| Cincinnati, OH | USA | 16.5 | 333568 | Mesa, AZ | USA | 3.0 | 470833 |
| Chicago, IL | USA | 16.1 | 2848431 | San Jose, CA | USA | 2.9 | 954009 |
| Montgomery, AL | USA | 15.3 | 202818 | Boise, ID | USA | 2.9 | 206437 |
| Atlanta, GA | USA | 14.5 | 552901 | Abbotsford | Canada | 2.9 | 137,550 |
| Savannah-Chatham Metro, GA | USA | 14.1 | 212711 | Surrey | Canada | 2.9 | 444,583 |
| Miami, FL | USA | 14.1 | 419205 | Victoria | Canada | 2.9 | 104,721 |
| Rochester, NY | USA | 13.6 | 205537 | Austin, TX | USA | 2.9 | 768970 |
| Nashville, TN | USA | 12.9 | 610176 | Codiac Region | Canada | 2.8 | 108,395 |
| Dallas, TX | USA | 12.9 | 1290266 | Halifax Metropolitan Area | Canada | 2.7 | 403,437 |
| Houston, TX | USA | 12.6 | 2273771 | Anaheim, CA | USA | 2.7 | 335970 |
| Pittsburgh, PA | USA | 12.5 | 312232 | Greater Sudbury | Canada | 2.4 | 164,357 |
| Jacksonville, FL | USA | 12.2 | 810064 | Kingston | Canada | 2.4 | 125,354 |
| Indianapolis, IN | USA | 12.2 | 813471 | Coquitlam | Canada | 2.3 | 128,747 |
| Orlando, FL | USA | 11.9 | 235109 | Hamilton | Canada | 2.3 | 533,280 |
| Milwaukee, WI | USA | 11.9 | 604673 | Toronto | Canada | 2.2 | 2,720,024 |
| Oklahoma City, OK | USA | 11.7 | 556939 | Irving, TX | USA | 2.0 | 202447 |
| Jersey City, NJ | USA | 11.6 | 240858 | Lincoln, NE | USA | 2.0 | 254438 |
| Toledo, OH | USA | 11.3 | 291066 | Chandler, AZ | USA | 2.0 | 256091 |
| Stockton, CA | USA | 11.3 | 292212 | El Paso, TX | USA | 1.9 | 618812 |
| Columbus, OH | USA | 10.8 | 759391 | Kelowna | Canada | 1.9 | 118,107 |
| Albuquerque, NM | USA | 10.6 | 530636 | London | Canada | 1.9 | 378,809 |
| Modesto, CA | USA | 10.3 | 204474 | Montreal | Canada | 1.9 | 1,934,082 |
| Louisville Metro, KY | USA | 9.8 | 631260 | Delta | Canada | 1.8 | 109,322 |


| City | Country | Homicides per 100,000 | Population | City | Country | Homicides per 100,000 | Population |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Mobile, AL | USA | 9.7 | 246171 | Vancouver | Canada | 1.8 | 660,496 |
| Akron, OH | USA | 9.7 | 206497 | Chula Vista, CA | USA | 1.8 | 224841 |
| Greensboro, NC | USA | 9.5 | 253191 | Gilbert, AZ | USA | 1.7 | 231799 |
| Durham, NC | USA | 9.2 | 227492 | Madison, WI | USA | 1.7 | 234461 |
| Fresno, CA | USA | 8.7 | 481370 | Richelieu Saint-Laurent | Canada | 1.6 | 189,388 |
| Long Beach, CA | USA | 8.6 | 463969 | Honolulu, HI | USA | 1.5 | 907124 |
| Bakersfield, CA | USA | 8.2 | 330897 | Henderson, NV | USA | 1.5 | 261883 |
| Los Angeles, CA | USA | 8.1 | 3848776 | Ottawa | Canada | 1.5 | 896,529 |
| Las Vegas MPD, NV | USA | 8.1 | 1377282 | Plano, TX | USA | 1.5 | 272747 |
| Boston, MA | USA | 8.0 | 624222 | Barrie | Canada | 1.4 | 139,050 |
| Phoenix, AZ | USA | 7.6 | 1597397 | Irvine, CA | USA | 1.4 | 215673 |
| Laredo, TX | USA | 7.5 | 226944 | Calgary | Canada | 1.3 | 1,138,393 |
| Charlotte-Mecklenburg, NC | USA | 7.5 | 777708 | Durham Region | Canada | 1.3 | 620,427 |
| Santa Ana, CA | USA | 7.4 | 339196 | Quebec | Canada | 1.1 | 547,102 |
| North Las Vegas, NV | USA | 7.3 | 232631 | St. John's | Canada | 1.1 | 186,242 |
| San Antonio, TX | USA | 7.2 | 1373936 | Fremont, CA | USA | 1.0 | 202714 |
| Fort Wayne, IN | USA | 7.2 | 251584 | Burnaby | Canada | 0.9 | 230,009 |
| Glendale, AZ | USA | 7.1 | 255080 | Niagara Region | Canada | 0.9 | 443,866 |
| Wichita, KS | USA | 6.8 | 367635 | Saanich | Canada | 0.9 | 116,885 |
| Omaha, NE | USA | 6.8 | 443037 | Laval | Canada | 0.8 | 398,667 |
| Winston-Salem, NC | USA | 6.5 | 230978 | Waterloo Region | Canada | 0.8 | 522,968 |
| Tucson, AZ | USA | 6.4 | 547981 | York Region | Canada | 0.7 | 1,040,165 |
| Sacramento, CA | USA | 6.4 | 470308 | Sherbrooke | Canada | 0.6 | 155,583 |
| Fort Worth, TX | USA | 6.1 | 723456 | Longueuil | Canada | 0.5 | 401,764 |
| Aurora, CO | USA | 5.9 | 324014 | Peel Region | Canada | 0.5 | 1,273,348 |
| Lubbock, TX | USA | 5.8 | 222884 | Gatineau | Canada | 0.4 | 260,809 |
| Tampa, FL | USA | 5.8 | 345233 | Halton Region | Canada | 0.4 | 506,900 |
| Denver, CO | USA | 5.8 | 604680 | Cape Breton Region | Canada | 0.0 | 101,339 |
| New York, NY | USA | 5.6 | 8400907 | Chatham-Kent | Canada | 0.0 | 109,048 |
| San Francisco, CA | USA | 5.6 | 809755 | Guelph | Canada | 0.0 | 124,130 |
| Chesapeake, VA | USA | 5.4 | 223261 | Langley Township | Canada | 0.0 | 105,708 |
| Riverside, CA | USA | 5.0 | 299871 | Levis | Canada | 0.0 | 137,218 |
| Anchorage, AK | USA | 4.9 | 283300 | Richmond | Canada | 0.0 | 196,856 |
| Minneapolis, MN | USA | 4.7 | 382618 | Saguenay | Canada | 0.0 | 145,689 |
| St. Paul, MN | USA | 4.6 | 280194 | Terrebonne | Canada | 0.0 | 129,415 |
| St. Petersburg, FL | USA | 4.5 | 244933 | Trois-Rivieres | Canada | 0.0 | 130,313 |
| Saskatoon | Canada | 4.4 | 229,342 | Vaudreuil-Soulanges Region | Canada | 0.0 | 134,564 |
| Lexington, KY | USA | 4.4 | 296406 | Windsor | Canada | 0.0 | 221,310 |
| Virginia Beach, VA | USA | 4.4 | 436175 |  |  |  |  |

There is only so much room for crime prevention. Given the low crime rates in Canadian cities, it is unclear how much room there is left to reduce crime. That is especially true of violent crime, as much of it is entirely unpreventable by law enforcement officials. It is unlikely that police would be able to prevent all cases of spousal abuse or sexual abuse that takes place within the confines of the assailant's house, for instance. Inter-gang murders are also extremely difficult to prevent. People whose livelihoods depend on operating outside of the law are by definition very good at evading the police. The best way to reduce the rate of gang related homicide is to undermine their business models. This can be done from the demand-side, by removing their monopoly on certain banned substances, or on the supply-side, by reducing the number of youth prone to joining gangs.-Some programs for at risk youth have demonstrated results in deterring them from joining gangs. 16 While it is beyond the scope of this paper to elaborate on programs for reducing gang membership, this is an area that deserves further exploration.

There are certainly areas of the country where crime is fairly high, but most are not in major cities. Prince George has had several years of violence due to the drug trade. While there may be some room for improvement, gang related crime tends to be cyclical, and is generally beyond control of the police. However, it doesn't tend to affect the general public. The rate of homicides where the victim and assailant are strangers is only $0.2 / 100,00017$ in Canada, which is less than a third of the rate in the United States. 18 The odds of being murdered by a stranger in a given year, 1 in 500,000, aren't that much better than the odds of being struck by lightning (1 in 775,000/year). $\underline{19}$ Moreover, the number of homicides in Prince George (aka the homicide capital of Canada) was only 9 in 2011.20 Simply put, urban crime is not an alarming problem in Canada.

Determining the effectiveness of police services is fraught with challenges. Differences in local geography, demographics, economics, and even climate, affect the level of police presence required. Given these challenges, and the limited number of large cities in Canada, it is difficult to construct a statistical model to determine the impact of the number of police per-capita on the level of crime. However, the data that is at our disposal give us a general sense of crime rates relative to police presence in Canadian urban centres.

While there are not enough data points to construct a rigorous model of the effects of police levels on crime in Canada, a cursory scatterplot gives us reason for skepticism that more police would lead to less crime. Below are graphs of the 100 largest police services in Canada, and all police services that serve populations of over 100,000. The crime severity index (CSI), a composite measure of the frequency and severity of crime, on the vertical axis, and the number of police officers
per 100,000 residents on the horizontal axis. These graphs illustrate a positive relationship between the number of police officers per 100,000 and the CSI. In other words, cities with more police per-capita also have higher crime rates. While correlation does not ensure causation, this should cast doubt on the crude notion that more police will lead to less crime in Canadian cities.

## CHART 3

100 Largest Police Services


## CHART 4

Police Serving Populations of 100,000+

...cities with more police per-capita also have higher crime rates.

Comparing police forces that serve 100,000 residents to those that serve over 1 million does not make for useful comparisons.

Comparing police forces that serve 100,000 residents to those that serve over 1 million does not make for useful comparisons. The dearth of large Canadian cities is a challenge when attempting to isolate the effects of having high police staffing levels. However, even if we include only forces that serve over 500,000 residents, there is still a positive relationship between the level of crime and the number of police officers.

## CHART 5 Crime Severity

| Police Service | Officers/100k Residents | Crime Severity Index |
| :--- | :---: | :---: |
| Montreal Police Service | 235 | 112.1 |
| Vancouver Police Department | 223 | 119.8 |
| Toronto Police Service | 216 | 79.3 |
| Edmonton Police Service | 199 | 129 |
| Winnipeg Police Service | 199 | 137 |
| Calgary Police Service | 167 | 79.8 |
| Ottawa Police Service | 153 | 68.3 |
| Hamilton Police Service | 151 | 85.7 |
| Durham Regional Police Service | 149 | 60.3 |
| Peel Regional Police | 148 | 56.5 |
| Waterloo Regional Police Service | 141 | 73.3 |
| York Regional Police | 140 | 44.4 |
| Quebec City Police Service | 131 | 67.6 |

## CHART 6 <br> Police Serving Populations of 500,000+

180.0 $\qquad$



Increasing the number of police officers in Canadian cities would appear to have diminishing returns in terms of crime prevention. However, the one area in which they appear to have a marginally positive impact is on the clearance rate. As we see in the graph below, there is a very minor correlation between a higher number of police officers per 100,000 and the clearance rate.


However, it is important to point out that there is also a negative relationship between the crime severity rate and the clearance rate. In other words, the less crime in a city, the higher percentage of crimes that are solved. It suggests that the higher clearance rate in cities with more officers is at least partially due to fewer per capita crimes to investigate. As an example, Toronto has a higher clearance rate (38.4) than Winnipeg (30.7). While it is true that Toronto has more police officers per 100,000 (216 compared to 199), Toronto also has a far lower crime severity index ( 79.3 compared to 137). As another example, but showing the inverse relationship, Ottawa has a higher clearance rate than Edmonton ( 39.7 compared to 33.3 ) despite having far less officers per 100,000 (153 compared to 199). The fact that Ottawa has a far lower crime severity index (68.3 compared to 129) than Edmonton would seem to explain the difference. Deploying more police officers to increase the clearance rate as a deterrent measure does not appear to be an effective strategy.

Even if some Canadian neighbourhoods do require a slightly increased police presence, there is reason to believe that it can be accomplished
> ...there is also a negative relationship between the crime severity rate and the clearance rate.
...the Toronto
Police Service has a unique overlapping scheduling practice that effectively results in the department operating on a 28 hour clock every day.
with current staffing levels. As an example, the City of Winnipeg requires all police cruisers to be staffed by two officers between the hours of 7 pm and 7am. $\underline{21}$ According to a report prepared for the Vancouver Police Department, the optimal percentage of cruisers containing two officers over the course of a day in the city is 60 per cent. ${ }^{22}$

This is consistent with results from a study of the Dallas Police Department. ${ }^{23}$ Lower percentages of two-officer vehicles during the day should be balanced out by higher percentages at night. The highest percentage of two vehicle cruisers on the road on average at any time during 2007 in Vancouver was under 75 per cent. ${ }^{24}$ It means that even at peak times, Winnipeg should theoretically be able to reduce its number of two officer cruisers by at least 25 per cent, thus freeing up more officers to cover more of the city.

Toronto is another city that could more efficiently use existing police officers. According to former Toronto Mayor John Sewell, there are two ways in which the city could reduce policing costs without reducing service. Toronto, like Winnipeg, relies too heavily on two-officer cars. After dark, only two-officer cars are permitted in Toronto. Using Vancouver as a benchmark, Toronto ought to be able to reduce the number of twoofficer vehicles during that period by 25 per cent. Furthermore, the Toronto Police Service has a unique overlapping scheduling practice that effectively results in the department operating on a 28 hour clock every day. ${ }^{25}$ The morning and afternoon shifts are scheduled for ten hours, and the night shift is scheduled for eight. A recent service efficiency study recommended that the city schedule all shifts for eight hours to avoid overlaps. This would save the city between $\$ 25$ - to $\$ 35$-million annually. ${ }^{26}$


While reducing the number of two-officer cars may seem hazardous, the City of Ottawa exclusively uses single officer vehicles and has a substantially higher clearance rate than Winnipeg, and a homicide rate roughly a third of Winnipeg's rate. The Ottawa Police Service responds to more than double the number of calls per officer than the Winnipeg Police Service. The Australian Institute of Criminology published an updated literature review in 2012 on single officer patrols, in which they concluded that "the available research indicates that there is not much difference between performance of single person patrols and two person patrols." $\underline{27}$ They also pointed out that there tend to be less complaints filed against single officers. However, it could be attributed to the fact that single officer cars are typically deployed to lower risk calls. Another study of the effects of switching from two-officer to oneofficer cars found that when Buffalo did so in 2003, response times improved dramatically. $\underline{ } 18$ While the evidence is not conclusive, it does not provide any reason to doubt the effectiveness of one-officer cars used in the appropriate context.

It is important to bear in mind that correlation does not necessarily establish causation. Having said that, the available data casts doubt upon the popular notion that more police equals less crime. What is more, the evidence suggests that police services in Canadian cities are already adequately staffed. Though the twenty-four hour news cycle draws more attention than ever to crimes committed, the statistics suggest that we have no reason to panic.
Rather than calling for surges in the number of police officers in cities, municipal politicians and law enforcement agencies should focus on ways to make more efficient use of existing police resources. Reducing the percentage of two-officer cars and eliminating scheduling redundancies are two of the ways in which Canadian police forces can more efficiently utilize human resources. Some of these resources should be shifted to crime hotspots such as the William Whyte neighbourhood of Winnipeg in Manitoba, and the North-Central area of Regina in Saskatchewan.

It is important to keep in mind that each city has slightly different needs and challenges. While this means that some cities might intrinsically require slightly higher or lower numbers of officers, there is no evidence to suggest that Canadian police forces are understaffed. Additional needs, such as patrols for specific hot spots, can be met by freeing up existing redundancies. suggests that police services in Canadian cities are already adequately staffed.

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http://www.fcpp.org/pdf/one vs two office police cars.pdf

