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Crime Victimization and Income Distribution

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Abstract

Crime levels have risen significantly in Argentina during recent years. In this study, we analyze the relationship between crime victimization and income distribution. Our main question is whether the rich or the poor have been the main victims of this crime rise. For home robberies, we found that the poor have suffered the main crime increases. For street robberies, both groups show similar augments in victimization. The findings are consistent with additional evidence showing that the rich are able to protect their houses through pecuniary security devices better than the poor. We find no differences in reporting rates and access to justice by social groups.

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EXECUTIVE SUMMARY

1. Objectives and Research Questions

During the 1990s, crime has risen sharply in Argentina. The main purpose of this study is to analyze empirically the changes in the distribution of crime victimization by income level experienced in Argentina during the decade, i.e. whether the rich or the poor have been the main victims of the increase in crime. We also study differences in crime reporting rates, use of private security devices and access to justice by income groups.

2. Database Used

A household survey on current and past victimization rates and income levels specially designed for this study is our main source of information. The target population of the survey was the population of the Buenos Aires Metropolitan Area. We interviewed 200 households in the City of Buenos Aires and 200 households in the suburban Great Buenos Aires. The survey was conducted by the opinion poll company Catterberg & Asoc. during February of 2002.

In the survey, we collected information on victimization events, whether or not those events were reported to the police, whether or not any action was pursued in the judicial system, why crime events were not reported to the police and why legal actions were not pursued, information about the behavioral responses to crime, consumption of private protection, and income and demographic household information. In particular, we asked people of different income levels about the crimes they have suffered in the last ten years and their use of private protection devices.

3. Methodology

Our main question is which income group has been most affected by the significant increase in crime suffered in Argentina during the 1990s. We defined three periods: 1990-1994 (the first part of the decade with low unemployment and strong growth),

1995-2000 (the period after the Tequila crisis with significant unemployment and a declining economy), and the final year of 2001 (right before the default of the external debt, the end of Convertibility, and the current unemployment peak). We then compare the *change* in crime levels for the high-income group relative to the *change* in crime levels for the low-income group over these periods. For this comparison, we use three different methodologies: difference-in-differences of the mean levels of the victimization variables, difference-in-differences of the coefficients from a Logit victimization regression that controls for personal characteristics, neighborhood characteristics, and individual random-effects; and difference-in-differences of the coefficients from a linear random-effects victimization regression with the same set of controls. We also estimate Logit models to investigate differential use of security devices, public police patrolling, and crime reporting decisions by income level.

4. Main Findings

4.1. Evolution of Crime Levels

Our results confirm that there was a significant increase in victimization rates. We also find a decrease in reporting rates. 10% of the households interviewed in our survey suffered a home robbery (forcible entry into their house) during 2001. This percentage was 9.8% for the whole period 1995-2000, and 9.1% for the period 1990-1994 (note that the growth is large as the periods are of different length). 45% of these crimes were reported to the police in 2001, but the figure was larger in the previous years (48.7% for 1995-2000, and 80% for 1990-1994). For robberies outside the home, 31.8% of the interviews show that at least one member of the household has been robbed during 2001. This percentage was 27.8% for 1995-2000, and 9.4% for 1990-1994. The reporting rate of this type of crime was lower than for home robberies, but similarly decreasing over time (37.8% for 2001, 50.5% for 1995-2000, and 54.3% for 1990-1994). We also report a growing feeling of insecurity in the population.

4.2. Home Robberies

For the period 1990-1994, high-income households suffered a significantly higher home victimization rate than low-income families. After that period, low-income households experienced a significant increase in their victimization likelihood, while high-income families show non-significant changes. The cross-sectional differences between rich and poor became insignificant in those subsequent periods. Thus, the victimization rate of the low-income households caught up to the high-income rate during the decade. Importantly, the difference-in-differences tests show that the increase in crime victimization for the low-income group is higher than the change experienced by the high-income group. Thus, the poor have suffered the main increase in home robberies.

4.3. Street Robberies

For robberies suffered outside the house, we find that high-income households suffered a higher victimization rate than low-income families for the three periods. We also find that both groups have suffered a significant increase in crime levels. The difference-in-difference tests show no relative differences in the changes in street victimization rates across groups. Thus, for street robberies both groups show similar augments in victimization.

4.4. Private Protection Devices

Our findings on victimization rates are consistent with additional evidence showing that the rich are able to protect their houses through pecuniary security devices better than the poor. High-income households tend to use more private security, alarms, armored doors, and window bars than low-income groups to protect their houses. They are also more likely to acquire home insurance. Instead, low-income families appear more likely to own a watchdog for security protection. Thus, high-income people seem to use market based crime protection mechanisms, rather than non-pecuniary devices. On the other hand, the ability to use protection devices against street robberies and the superiority of high-income families to protect themselves against this type of crime seem to be limited. In summary, there seem to be significant differences in the home protection devices implemented by different social groups, while differences in street protection devices appear weaker.

4.5. Public Police Protection and Access to Justice

We find no significant differences in public police protection, reporting rates and access to justice by social groups. First, there seem to be no differences in public police protection across social groups. Even when we consider whether the presence of private protection reduces the frequency of public police patrolling, we do not find that public police has been redeployed from rich to poor neighborhoods to compensate for the hiring of private security in rich areas. Second, we do not find that income level affects the likelihood of reporting a criminal act. The study of crime reporting decisions indicates that receiving no answers from the police and the judiciary is the most frequent response after reporting a crime. The low value of the loss, skepticism about the investigation, and reporting costs seem to be the main causes for the lack of reporting.

5. Policy Implications

? There has been a dramatic increase in crime in Argentina during recent years, and the poor seem to have been the main victims of this crime increase as the rich have been able to protect their houses through the use of private protection devices. The first obvious policy recommendation is that, in order to fight this crime increase, more resources should be allocated to the judiciary, the public police, and the penitentiary system. Unfortunately, the scarcity of fiscal resources generated by the very same economic crisis that induced the crime rise has implied that less, rather than more, resources are available to the public protection forces. Moreover, if proper cost-benefit analysis guides the allocation of resources in the public sector, the evaluation of crime reduction policies has to take into account the unequal distribution of the increase in crime.

? If high-income households hire crime protection devices to protect their houses and the crime increase concentrates in poor neighborhoods, it would be optimal that public police forces follow crime moving to low-income areas. Our evidence on police patrolling does not suggest that a compensatory redeployment of public protection has been taking place.

An important policy recommendation is that public police should concentrate more efforts in the low-income areas that cannot afford private protection.

? The home protection devices used by the households in our sample may induce important externalities. In particular, it is expected that the use of observable devices by a household leads criminals to target another property, inducing negative externalities. Instead, the diffusion of unobservable security devices may generate positive externalities by increasing the expected probability for a criminal of getting caught when facing any target (see Ayres and Levitt (1998) who focus on unobservable anti-theft devices produced by the Lojack company, Lott and Mustard (1997) and Duggan (2001) who focus on the right-to-carry concealed handguns laws, and Di Tella and Schargrodsky (2001) who study the effect of observable police presence). The regulation by the State of the private security industry should take into account these potential externalities by favoring the use of unobservable devices with potential positive externalities. For example, Ayres and Levitt (1998) report that law enforcement agencies in the US condition the acceptance of the Lojack technology on the actual device not being observable from outside of the cars.

? The use of private security devices may induce positive externalities for the immediate neighborhood that also becomes protected, while negative externalities for the areas that are further away and receive the displacement in crime (Di Tella and Schargrodsky, 2001). Thus, we can think that private protection induces positive externalities within the neighborhood, but negative externalities among neighborhoods. If this is true, the distributional effect of these externalities would be different if rich and poor groups live segregated by income level than if there is some mixing of citizens of different income levels in the same neighborhoods. Urban, public utilities, and other policies that reduce segregation would have beneficial distributive effects in the presence of these externalities.

? If there are significant negative externalities among neighborhoods associated with the use of private security devices, some form of taxation or regulation of the private security

industry may be necessary. In most countries, including Argentina, the sector is largely unregulated. If the consumption of private security devices induce negative externalities, these market failures may generate an overprovision of private security by the free market. An important policy recommendation is that taxes could be charged to the hiring of private security and the tax revenues allocated to the public police forces in charge of protecting the areas that may be suffering the negative externalities. Alternatively, regulation of the private security industry may oblige consumers of these services to extend the coverage to neighboring areas under their support.

6. Questions for future research

The results from our household survey show that the poor have been the main victims of the increase in home robberies experienced in Argentina since 1990. The results also show that the rich have been able to protect their houses through private security devices better than the poor. It would be interesting to further explore what are the barriers that restrain crime protection by the poor in Argentina. One possibility is that the poor are underprotected from housebreaking because their houses are of poor quality. Fences, bars, armored doors, and other protection devices cannot be built in a shack in a shanty town. In turn, this raises the question of what are the factors that affect the quality of housing in poor neighborhoods. A main restrain on investments in house quality could be the lack of property rights. Individuals do not invest if the fruits of their investments could be seized by others. Thus, the inadequacy of property rights may induce underinvestment in house building generating crime underprotection. This important issue could be study, for example, by analyzing the impact of land title registration programs on crime victimization.