LAWYERS, GUNS, AND BURGLARS

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I. INTRODUCTION

So we drove down the road, and I was lookin' for a house that looked like if there was somebody at home that it'd be somebody that didn't carry a gun or didn't have no weapons in the house, so they couldn't use them.

—Arkansas burglar¹

In recent years, litigators have begun to displace legislators as American lawmakers. Recently, more than two dozen cities and counties, under the coordination of an anti-gun organization, have filed suits against handgun manufacturers. While the effect of these suits may be to impose de facto handgun prohibition by driving manufacturers out of business, or by making handguns affordable only to the wealthy, these suits claim that handgun manufacturers should be held accountable for the externalities imposed by their products. For example, since city government hospitals spend money treating the victims of

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^{1.} Claire Wolfe, 101 Things to Do 'til the Revolution 15 (1996).

^{2.} The plaintiffs are the New York Attorney General, twelve cities and counties in California, and New Orleans, Miami/Dade, Bridgeport (Conn.), Wayne County and Detroit, St. Louis, Cincinnati, Camden County (N.J.), Boston, Gary, the District of Columbia, and New York City. See Center to Prevent Handgun Violence, The Legal Action Project Docket (visited Feb. 2, 2001) http://www.gunlawsuits.com/docket/index.asp (CPHV is the litigation arm of Handgun Control, Inc., the nation's leading anti-gun lobby).

gunshot wounds, it is argued that handgun manufacturers should be forced to reimburse city governments.³

The handgun suits are not unique; they are the latest manifestation of a growing trend to have litigators and courts decide complex questions of social policy which had previously been reserved to the legislature. Alcohol, prescription drugs, high-fat foods, and automobiles have all been discussed as potential future lawsuit targets if the handgun cases succeed. The handgun cases, it should be noted, are partly funded with the plaintiffs attorneys' winnings from the tobacco cases.⁴

This Article analyzes one specific reason why courts are ill-suited to exercise legislative functions, as the handgun suits and similar cases ask the courts to do: courts cannot properly assess the true socioeconomic costs and benefits of controversial products. To illustrate the point, this Article looks in detail at a very large positive externality which is overlooked in the handgun suits: the major role that widespread gun ownership plays in reducing the rate of home invasion burglaries (a.k.a "hot burglaries"). Because potential burglars cannot tell which homes possess guns, most burglars choose to avoid entry into any occupied home, for fear of getting shot.⁵ The entry pattern of American burglars contrasts sharply with that of burglars in other nations; in Canada and Great Britain, burglars prefer to find the residents at home, since alarms will be turned off, and wallets and purses will be available for the taking.⁶

Consequently, American homes which do not have guns enjoy significant "free rider" benefits. Gun owners bear financial and other burdens of gun ownership; but gun-free and gun-owning homes enjoy exactly the same general burglary deterrence effects from widespread American gun ownership. This positive externality of gun ownership is difficult to account for in a litigation context (since the quantity and cost of deterred crime is difficult to measure), and may even go unnoticed by court—since the free rider beneficiaries (non-gun owners) are not represented before the court.⁷

Part II of this Article looks at the differences between the behavior of American burglars and their cousins in other nations. Part III specifies the risks that American burglars face from various deterrents, including armed victims. Part IV details how burglars choose targets, while empirical data about burglary deterrence are analyzed in Part V. Part VI looks at what happens during confrontations between burglars and victims. Part VII compares and contrasts defensive firearms ownership with other anti-burglary strategies, such as guard dogs. Policy implications and network effects of firearms ownership are explored in Part VIII.

^{3.} See, e.g., McNamara v. Arms Technology, Inc No. 99-912662 NZ (Cir. Ct., Wayne County, Mich., Apr. 26, 1999); Archer v. Arms Technology, Inc., No. 99-912658 NZ (Cir. Ct., Wayne County, Mich., Apr. 26, 1999).

See Douglas McCollam, Long Shot, AM. LAWYER, June 1, 1999, at 89.

^{5.} See infra notes 10-22 and accompanying text.

^{6.} See infra notes 63–67, 73–74 and accompanying text.

^{7.} See infra notes 113-144 and accompanying text.

II. INTERNATIONAL COMPARISONS

It is axiomatic in the United States that burglars avoid occupied homes. As an introductory criminology textbook explains, "Burglars do not want contact with occupants; they depend on stealth for success." Only thirteen percent of U.S. residential burglaries are attempted against occupied homes. But this happy fact of life, so taken for granted in the United States, is not universal.

The overall Canadian burglary rate is higher than the American one, and a Canadian burglary is four times more likely to take place when the victims are home. 10 In Toronto, forty-four percent of burglaries were against occupied homes. and twenty-one percent involved a confrontation with the victim. 11 Most Canadian residential burglaries occur at night, while American burglars are known to prefer daytime entry to reduce the risk of an armed confrontation.¹² Research by the federal government's Office of Juvenile Justice and Delinquency Prevention found that, based on 1994 data, American youths 10 to 17 years old had much higher arrest rates than Canadian youths for every category of violent and property crime. The lone exception was burglary, for which Canadian youths were one-third more likely to be involved.¹³ In cities such as Vancouver, home invasion burglaries aimed at elderly people have become endemic, and murders of the elderly during those burglaries all too frequent.¹⁴ Unfortunately, help from the government is not always available. In Quebec, the provincial police (Sûreté du Québec) are under orders from their commander to reduce arrests for burglary, because the jails are full.15

- 8. Freda Adler et al., Criminology 278 (2d cd. 1995).
- 9. U.S. Bureau of Justice Statistics, Household Burglary, BJS BULL. at 4 (1985).
- 10. See Lorne Gunter, Canadians Suffer As Much Crime As Americans, EDMONTON J., Mar. 31, 1998 (International Crime Victimization Survey).
- 11. See Irwin Waller & Norman Okhiro, Burglary: The Victim and the Public 31 (1978).
- 12. For American burglars and daytime entry, see George Rengert & John Wasilchick, Suburban Burglary: A Time and a Place for Everything 30, 62 (1985); John E. Conklin, Robbery and the Criminal Justice System 85 (1972).

A study of an unnamed "northern city" in Ontario for the years 1965-70 reported that 12.2% of burglaries were daytime, 69.5% were nighttime, and 18.3% were unknown. It is certain that no person was home for the "unknown burglaries," since if someone had been home, the time of entry would be known. A large percentage of the nighttime burglaries may have involved a person at home, since most people are at home at night. See Peter Chimbros, A Study of Breaking and Entering Offenses in "Northern City" Ontario, in CRIME IN CANADIAN SOCIETY 325-26 (Robert A. Silverman & James J. Teevan Jr. eds., 1975).

- 13. See Melissa Sickmund et al., Juvenile Offenders and Victims: 1997 Update on Violence 36 (1997).
- 14. See Peter Kennedy, B.C. Home Invasions Claim New Victim; Woman, 82, Slain, GLOBE & MAIL (Toronto), Nov. 15, 1999.
- 15. See Surete du Quebec Will Ignore Break-ins, JOURNAL DE MONTREAL, Jan. 9, 1997, at 15.

A 1982 British survey found fifty-nine percent of attempted burglaries involved an occupied home. ¹⁶ The Wall Street Journal reported:

Compared with London, New York is downright safe in one category: burglary. In London, where many homes have been burglarized half a dozen times, and where psychologists specialize in treating children traumatized by such thefts, the rate is nearly twice as high as in the Big Apple. And burglars here increasingly prefer striking when occupants are home, since alarms and locks tend to be disengaged and intruders have little to fear from unarmed residents.¹⁷

In Britain, seventy-seven percent of the population was afraid of burglary in 1994, compared to sixty percent in 1987. The London Sunday Times, pointing to Britain's soaring burglary rate, calls Britain "a nation of thieves." In the Netherlands, forty-eight percent of residential burglaries involved an occupied home. In the Republic of Ireland, criminologists report that burglars have little reluctance about attacking an occupied residence. In

Of course, differences in crime-reporting and crime-recording behavior between nations limit the precision of comparative criminal data. Nevertheless, the difference in home invasion burglary rates between the United States and other nations is so large that it is unlikely to be a mere artifact of crime data quirks.²²

^{16.} See PAT MAYHEW, RESIDENTIAL BURGLARY: A COMPARISON OF THE UNITED STATES, CANADA AND ENGLAND AND WALES (1987) (citing 1982 British crime survey).

^{17.} See Kevin Heilliker, Pistol-Whipped: As Gun Crimes Rise, Britain Is Considering Cutting Legal Arsenal, WALL St. J., Apr. 19, 1994, at A1. Many Americans might not find it intuitively obvious that New York City is a place where burglars need to fear armed residents. But the question is not whether New York City has a high rate of gun ownership compared to Texarkana (it does not), but whether New York City has a high rate of household gun ownership compared to London (it does). Although the New York City police licensing bureaucracy throws many obstacles in the way of a person who wants to own a handgun legally, it is relatively easy to obtain a permit to own a shotgun or rifle in New York City. In London, by contrast, legal ownership of any type of gun is very onerous. Moreover, New York City has a huge pool of unregistered firearms (up to three million by police estimates), most of which are potentially available to resist home invasions.

^{18.} See British Crime Fears Rise, WALL St. J., Mar. 22, 1994, at A11.

^{19.} See J. Ungoed-Thomas, A Nation of Thieves, SUNDAY TIMES, Jan. 11, 1998, at Features Sec., p. 1.

^{20.} See Richard Block, The Impact of Victimization, Rates and Patterns: A Comparison of the Netherlands and the United States, in VICTIMIZATION AND FEAR OF CRIME: WORLD PERSPECTIVES 26 tbl. 3-5 (Richard Block ed., 1984) (reporting data from 1977 Dutch National Crime Survey: 468 burglaries with someone home, 513 burglaries with no one home).

^{21.} See Claire Nee & Maxwell Taylor, Residential Burglary in the Republic of Ireland: Some Support of the Situational Approach, in WHOSE LAW AND ORDER? ASPECTS OF CRIME AND SOCIAL CONTROL IN IRISH SOCIETY 143 (Mike Tomlinson et al. eds., 1988).

^{22.} This Article does not suggest that differential rates of defensive gun ownership are the *only* explanation for the different hot burglary rates among various nations—only that they are a major factor. America, being wealthier than the other countries mentioned in this Article, may have a higher fraction of homes with anti-burglary

Why should American criminals display such a curious reluctance to perpetrate burglaries, particularly against occupied residences? The answer cannot be that the American criminal justice system is so much tougher than the systems in other nations. During the 1980s, the probability of arrest and the severity of sentences for ordinary crimes in Canada and Great Britain were at least as great as in the United States.²³ Could the answer be that American criminals are afraid of getting shot? The introductory American criminology textbook states, "Opportunities for burglary occur only when a dwelling is unguarded." Why is an axiomatic statement about American burglars so manifestly not true for burglars in other countries?

III. RISKS TO AMERICAN BURGLARS

A. Risks to Burglars from Victims

One out of thirty-one burglars has been shot during a burglary.²⁵ On the whole, when an American burglar strikes at an occupied residence, his chance of being shot is about equal to his chance of being sent to prison.²⁶ If we assume that the risk of prison provides some deterrence to burglary, it would seem reasonable to conclude that the equally large risk of being shot provides an equally large deterrent. In other words, private individuals with firearms in their homes double the deterrent effect that would exist if government-imposed punishment were the only deterrent.

How frequently are firearms actually used in burglary situations? The only comprehensive study of the subject was undertaken by five researchers from the Centers for Disease Control and Prevention ("CDC").²⁷ Although some CDC studies on firearms have been criticized for obvious technical errors and bias,²⁸ this particular study simply reported the facts as the researchers found them. In 1994, random-digit-dialing phone calls were made throughout the United States, resulting in 5,238 interviews.²⁹ The interviewees were asked about use of a firearm in a burglary situation during the last twelve months.

devices such as alarms or bars. It is possible that American prosecutors may treat nighttime burglaries (which are more likely to be hot burglaries), more severely than do prosecutors in other nations.

- 23. See Gary Kleck, Point Blank 140 (1991).
- 24. See ADLER ET AL., supra note 8, at 277.
- 25. See RENGERT & WASILCHICK, supra note 12, at 98.
- 26. See James Wright et al., Under the Gun: Weapons, Crime and Violence in America 139–40 (1983); Gary Kleck, Crime Control Through the Private Use of Armed Force, 35 Soc. Probs. 1, 12, 15–16 (1988).
- 27. See Robert M. Ikeda et al., Estiminating Intruder-Related Firearms Retrievals in U.S. Households, 1994, 12 VIOLENCE AND VICTIMS 363 (1997).
- 28. See, e.g., Don Kates et al., Guns and Public Health: Epidemic of Violence or Pandemic of Propaganda?, 62 TENN. L. REV. 513 (1995).
- 29. Random-digit dialing uses computers to generate the numbers to be dialed. In contrast to dialing the numbers listed in a telephone book, random-digit dialing allows pollsters to contact people with unlisted telephone numbers.

Thirty-four percent of the interviewees admitted to owning a firearm. This figure is low compared to dozens of other national studies of household firearms ownership.³⁰ Perhaps the telephone interviewers encountered an especially high number of people who were unwilling to disclose their ownership of a gun (and would therefore be unwilling to disclose, later in the interview, their use of that gun).³¹ Thus, the burglary researchers are more likely to have underestimated anti-burglar firearms use than to have over-estimated it.

The researchers found that six percent of the sample population had used a firearm in a burglary situation in the last twelve months. ³² Extrapolating the polling sample to the national population, the researchers estimated that in the last twelve months, there were approximately 1,896,842 incidents in which a householder retrieved a firearm but did not see an intruder. ³³ There were an estimated 503,481 incidents in which the armed householder *did* see the burglar, ³⁴ and 497,646 incidents in which the burglar was scared away by the firearm. ³⁵ In other words, half a million times every year, burglars were likely forced to flee a home because they encountered an armed victim.

A much more limited study about home invasion burglaries has achieved more notoriety than the national study discussed above. An article by Arthur Kellermann examined police reports of burglaries in Atlanta.³⁶ Out of 198 burglaries, Kellermann found only three cases in which the homeowner used a gun against the burglar, according to the police report. From this finding, Kellermann concluded that defensive gun use against burglars was rare.³⁷

Unfortunately, Kellermann's study could not have been better designed to produce a gross undercount. Kellermann relied on burglary report forms compiled by the Atlanta police. Those report forms, however, do not include any field for the police officer to report defensive gun use by the victim. Furthermore, Atlanta police officers are not trained to solicit information about defensive gun use from the victims.³⁸ Thus, the only time that a defensive gun use ("DGU") would be recorded on the offense report would be when an officer spontaneously decided to record it on the free-form section of the burglary offense report. In other words,

^{30.} See Gary Kleck, Targeting Guns 98-99 tbl. 3.2 (1997).

^{31.} See id. at 64-69 (noting that respondent non-disclosure is a problem in surveys of household gun ownership).

^{32.} See Ikeda et al., supra note 27, at 366.

^{33.} See id. at 367. The 95 percent confidence interval was a range between 1,480,647 and 2,313,035 such incidents—meaning that there is a 95 percent chance that the true national figure is somewhere in this range. See id.

^{34.} The 95 percent confidence interval was 305,093 to 701,870. See id.

^{35.} The 95 percent confidence interval was 266,060 to 729,231. See id.

^{36.} See Arthur L. Kellermann et al., Weapons Involvement in Home Invasion Crimes, 273 JAMA 1759 (1995).

^{37.} See id. at 1762.

^{38.} See Gary Kleck, Degrading Scientific Standards to Get the Defensive Gun Use Estimate Down, 11 J. FIREARMS & PUB. POL'Y 77, 79-80 (1999) (reporting Kleck's interview with Atlanta police official).

Kellermann used a data set (burglary offense reports) that was not designed to record DGUs, and on the basis of this data set he concluded that DGUs were rare.

Besides the obvious inadequacy of the burglary offense reports, the Kellermann study was further flawed by its failure to account for the large number of cases in which a burglary victim scares away a burglar but does not report the incident. Less than half of all burglaries are reported to the police. From the average homeowner's viewpoint, there would be little to gain in making such a report. While society as a whole might gain something from the report, the homeowner personally would not; the burglar, while still at large, would presumably focus on other homes not known to contain an armed occupant. By making the report, the citizen might perceive that he would take some risk of being charged with an offense (especially if he fired at the burglar) or of having his firearm confiscated. This perception might be particularly strong in Atlanta, where the Mayor and his police chiefs are well known as advocates of strict gun control. Even when reporting a burglary, a citizen might choose not to disclose his use of a firearm.

The 1994 national CDC survey, discussed above, avoided all of these problems. ⁴¹ By making phone calls to a national random sample, the CDC study had a better chance of receiving information from burglary victims who chose not to call the police. Because the burglary victims were talking to a pollster, rather than to a police officer from a notoriously anti-gun administration, the victims would be more likely to acknowledge defensive gun use. And because the CDC pollsters (unlike the Atlanta police) were actually asking all burglary victims about DGUs in burglaries, ⁴² the pollsters were much more likely to find out about DGUs. Accordingly, the CDC study's figure, approximately a half-million annual confrontations between armed citizens and home invasion burglars, is plausible (although perhaps low), while Kellermann's assertion that such incidents hardly ever occur is not.

The most thorough survey of citizen defensive gun use in general (not just in burglaries) found that in well over ninety percent of incidents, a shot is never fired; the mere display of the gun suffices to end the confrontation.⁴³ The CDC study did not specifically ask whether a gun was fired.⁴⁴ Accordingly, it is reasonable to infer that burglary DGU is similar to DGU in general, and that most incidents end with the burglar fleeing at the sight of the armed victim, rather than the victim shooting at the burglar.

^{39.} See Bureau of Justice Statistics, Criminal Victimization 1999 (Wash. 2000) (NCJ 182734), at 11.

^{40.} Indeed, the Atlanta police chief was a co-author of Kellermann's article. See Kellerman, supra note 36.

^{41.} See Ikeda, supra note 27.

^{42.} See id. at 364.

^{43.} See Kleck, Targeting Guns, supra note 30, at 162 (1993 survey).

^{44.} See Ikeda, supra note 27, at 366.

B. Risks to Burglars from the Judicial System

Only 13 percent of burglaries are ever cleared by an arrest.⁴⁵ (This means that in 13 of 100 burglaries, someone identified as the burglar is eventually arrested. One arrest can "clear" dozens of burglaries.⁴⁶) Many arrests, of course, do not lead to felony convictions. Of the felony convictions for burglary,⁴⁷ fifty-two percent lead to a prison sentence, twenty-three percent to jail time, and twenty-five percent to probation.⁴⁸ The median sentences are forty-eight months for prison, five months for jail, and thirty-six months for probation.⁴⁹ On the whole, state prisoners serve about thirty-five percent of the time to which they are actually sentenced.⁵⁰ The above figures represent felony convictions. Misdemeanor convictions resulting from a burglary result in significantly shorter sentences. Given the criminal justice system's focus on violent crimes and on drug crimes, burglary has become a relatively low priority.⁵¹

IV. TARGET SELECTION BY BURGLARS

A. General Principles of Target Selection

Scholars have long agreed that the physical characteristics of a potential target have an important effect on its likelihood of being victimized. For example, Oscar Newman's book *Defensible Space* looked at the importance of architectural design, emphasizing that good architectural design would help to create "strongly defined areas of influence" that would intimidate potential predators. In *Residential Crime*, Thomas Reppetto linked home burglary to a target's ease of access and visibility to surveillance. 53

^{45.} See Federal Bureau of Investigations, Uniform Crime Reports 1992, at 39.

^{46.} A study of adult burglars in prison found that most burglars reported committing many burglaries for which no charges were ever brought. Peter B. Greenwood & A. Abrahamse, Selective Incapacitation 43 (1982).

^{47.} In state courts in 1992, there were 114,630 total convictions for felony burglary. Of these, 16,649 were residential burglaries, 45,159 were nonresidential, and 52,822 were unspecified. See U.S. DEPT. OF JUSTICE, BUREAU OF JUSTICE STATISTICS, FELONY SENTENCES IN STATE COURTS, 1992 Bull. NCJ-151167 (Wash. 1995), at 2 tbl.1.

^{48.} See id. at 2 tbl.2.

^{49.} See id. at 3 tbl.3. The average maximum sentence is 76 months for prison, 8 months for jail, and 55 months for probation. See id.

^{50.} See BUREAU OF JUSTICE STATISTICS, FELONY SENTENCES IN THE UNITED STATES, 1990, NCJ-149077, at 8 (Wash. Dept. of Justice, 1994).

^{51.} See BRUCE BENSON & ERIC RASMUSSEN, THE ECONOMIC ANATOMY OF A DRUG WAR (1994) (describing how forfeiture laws led to a major shift in police resources towards obtaining drug forfeitures at the expense of enforcement of laws against property crimes, including burglary).

^{52.} OSCAR NEWMAN, DEFENSIBLE SPACE (1972).

^{53.} THOMAS J. REPPETTO, RESIDENTIAL CRIME (1974).

Increasing attention to the victims of crime has led criminologists to find that certain lifestyle choices can influence the risk of being victimized.⁵⁴ Among important lifestyle choices are whether the potential victim's routine activities offer "guardianship" of possible criminal targets.⁵⁵ For example, apartments with doormen have lower burglary rates.⁵⁶ All this supports the common-sense conclusion that burglary rates will be higher, other things being equal, where the opportunities to perpetrate a successful burglary are higher.

Thus, as the percentage of working women in the population has increased, leaving more homes unguarded during the daytime, the percentage of daytime burglaries has also increased.⁵⁷ According to the FBI Uniform Crime Reports, between twenty-one percent and twenty-three percent of American burglaries involve an entry into a residence at night.⁵⁸

B. Advance Planning by Burglars

American burglars tend to "work" at hours when persons are unlikely to be in the home. ⁵⁹ Consistent with the desire to avoid a personal confrontation, burglars prefer houses, such as those on corners, where the risks of being observed by a neighbor are reduced. ⁶⁰ Two hours are spent on the average suburban burglary; most of that time is spent "casing the joint" to ensure that no one is home.

One burglar told of watching a particular house and noting that the occupants all went to church for four to five hours on Sunday morning.⁶¹ Another explained, "You just knock on the door to see if they're there. You bang, you

^{54.} See MICHAEL J. HINDELANG ET AL., VICTIMS OF PERSONAL CRIME: AN EMPIRICAL FOUNDATION FOR A THEORY OF VICTIMIZATION (1978); J. Garofalo, Reassessing the Lifestyle Model of Criminal Victimization, in Positive Criminology 26 (M.R. Gottfredson & Travis Hirschi eds., 1987); M. Gottfredson, On the Etiology of Criminal Victimization, 72 J. CRIM. L. & CRIMINOLOGY 714 (1981).

^{55.} L.E. Cohen & M. Felson, Social Change and Crime Rates Trends: A Routine Activities Approach, 44 AMER. Soc. Rev. 588 (1979); L.E. Cohen et al., Social Inequality and Criminal Victimization, 46 AMER. Soc. Rev. 505 (1981).

^{56.} See Newman, supra note 52, at 23-24.

^{57.} Block, *supra* note 20, at 26 (citing Cohen & Felson, Social Change and Urban Crime Rate Trends: A Routine Activity Approach (1984).

^{58.} About a third of burglaries involve non-residences (such as offices or stores); between 25 percent and 29 percent involve burglaries of residences during the daytime, and 16 to 18 percent involve residential burglaries which took place at unknown times. See FBI Uniform Crime Reports for 1976–1993, in SOURCEBOOK OF CRIMINAL JUSTICE STATISTICS 1994, tbl. 3.133. The nighttime residential burglary rate is not the same as the "hot" burglary rate. Some hot burglaries take place in the daytime, and many nighttime burglaries involve houses where no one is home due to vacation or other reasons. See id.

^{59.} RENGERT & WASILCHICK, supra note 12, at 21–24.

^{60.} *Id.* at 84. Corner houses are also typically more affluent, and therefore more lucrative, targets.

^{61.} Scott Decker et al., A Woman's Place Is in the Home: Females and Residential Burglary, 10 JUSTICE Q. 156 (1993).

bang, you look through windows, nobody's in bed. I mean, you gotta make sure they're not home, make sure they're not home."62

C. In Homes and on the Street

Rengert and Wasilchick's book about how burglars work reveals that fear of armed homeowners played a major role in determining burglary targets. Burglars reported that they avoided late-night burglaries because, "That's the way to get shot." Some burglars said that they shun burglaries in neighborhoods with people of mostly a different race because, "You'll get shot if you're caught there."

The most thorough study of burglary patterns was a St. Louis survey of 105 currently active burglars.⁶⁵ The authors observed, "One of the most serious risks faced by residential burglars is the possibility of being injured or killed by occupants of a target. Many of the offenders we spoke to reported that this was far and away their greatest fear." Said one burglar: "I don't think about gettin' caught, I think about gettin' gunned down, shot or somethin'...' cause you get into some people's houses...quick as I come in there, boom, they hit you right there. That's what I think about."

Another burglar explained:

Hey, wouldn't you blow somebody away if someone broke into your house and you don't know them? You hear this noise and they come breakin' in the window tryin' to get into your house, they gon' want to kill you anyway. See, with the police, they gon' say, "Come out with your hands up and don't do nothing foolish!" Okay, you still alive, but you goin' to jail. But you alive. You sneak into somebody's house and they wait til you get in the house and then they shoot you....See what I'm sayin'? You can't explain nothin' to nobody; you layin' down in there dead!⁶⁷

In contrast, Missouri is one of only nine states which has no provision for citizens to be issued permits to carry handguns for protection. Thus, a criminal in St. Louis faces a very high risk that the target of a home invasion may have a lawful gun for protection, but minimal risk that the target of a street robbery will have a lawful firearm for defense. The same authors who studied active St. Louis burglars conducted another study of active St. Louis armed robbers. They found that "[s]ome of the offenders who favored armed robbery over other crimes

^{62.} Id. at 157.

^{63.} RENGERT & WASILCHICK, supra note 12, at 30.

^{64.} Id. at 62.

^{65.} RICHARD T. WRIGHT & SCOTT DECKER, BURGLARS ON THE JOB: STREETLIFE AND RESIDENTIAL BREAK-INS (1994).

^{66.} *Id.* at 112.

^{67.} Id. at 112-13.

^{68.} See Richard T. Wright & Scott H. Decker, Armed Robbers in Action 6 (1997).

maintained that the offense was also safer than burglary...."⁶⁹ As one armed robber put it: "My style is, like, [I] don't have to be up in nobody's house in case they come in; they might have a pistol in the house or something."⁷⁰

On the streets, many of the St. Louis robbers "routinely targeted law-abiding citizens," who, unlike their counterparts in most American states, were certain not to be carrying a gun for protection. Law-abiding citizens were chosen as robbery victims because, as one robber noted, "You don't want to pick somebody dangerous; they might have a gun themselves."

In addition to the St. Louis study, the Wright-Rossi National Institute of Justice surveyed felony prisoners in eleven state prison systems on the impact of victim firearms on burglar behavior.⁷³ In that survey, seventy-four percent of the convicts who had committed a burglary or violent crime agreed, "One reason burglars avoid houses when people are at home is that they fear being shot."⁷⁴

Surveys of prisoners may not be entirely representative of criminals as a whole, since prisoners comprise the subset of criminals who were caught and sentenced to prison.⁷⁵ Thus, non-prisoner criminals might be more "successful," perhaps because they are more skillful, more risk averse, or are in some other way better at burglarizing. To the extent that prisoner bias would influence the results of the burglary question, it might be expected that non-prisoner burglars would be even more averse than imprisoned burglars to occupied-residence burglaries. After all, criminals who are not prisoners stay out of prison by avoiding unnecessary risks.

Fortifying the widespread presence of home defense firearms in the United States is a legal culture which strongly supports armed home defense. Colorado, for example, specifically immunizes the use of deadly force against violent home intruders from criminal and civil liability, regardless of whether lesser force would suffice. The South Carolina Attorney General recently instructed all prosecutors to refrain from bringing charges against "citizens acting to defend their homes," including citizens who use firearms. Supplementing the additional factors may be the legal attitudes towards resistance to burglary. Although statistical evidence is hard to come by, it appears that homeowners who defend themselves against burglars in Canada and England face a substantial risk

^{69.} Id. at 52.

^{70.} Id.

^{71.} Id. at 72.

^{72.} Id.

^{73.} See James D. Wright & Peter Rossi, Armed and Considered Dangerous: A Survey of Felons and Their Firearms (1986).

^{74.} Id. at 146.

^{75.} GEORGE W. McCall, Observing the Law: Applications of Field Methods to the Study of the Criminal Justice System 31 (1978).

^{76.} See Colo. Rev. Stat. § 18-1-704.5 (1993).

^{77.} Jon Dougherty, Invade a Home and Invite a Bullet, WORLDNET DAILY (Jan. 26, 2001), available at http://www.worldnetdaily.com/news/article.asp?ARTICLE_ID= 21478>.

of criminal prosecution—even if the defense does not involve a firearm. A highly publicized 2001 English case involved the successful murder prosecution of a farmer who shot a pair of career burglars.⁷⁸

V. REAL-WORLD TESTS OF THE DETERRENCE MODEL

Thomas Jefferson wrote to George Washington, "One loves to possess arms, but one hopes never to have to use them." The mere fact that about half of all homes could use a firearm against burglars helps to reduce the number of families who actually have to confront a burglar. Measuring deterrence is often difficult; even the deterrent effects of the entire criminal justice system are hard to quantify. 80

It is possible to criticize the notion of armed deterrence to burglary (and, by implication, most other efforts to deter crime) by asserting that burglars are too irrational and impulsive to be deterred. But an English study of 309 burglars found that many burglars are careful and deliberate and that more than half of them perpetrate planned burglaries. Another study found that burglary and auto theft were the two crimes which were most deterred by the potential offender's perceived risk of arrest. Likewise, research on commercial burglars in the Netherlands found "more than eighty percent of the commercial burglars can be characterised as to some degree, rational." A smaller survey of fifteen active residential burglars in the Philadelphia and Wilmington region found "the residential burglars in our sample respond to the risks and rewards associated with committing a burglary in line with expectations from deterrence theory." **

Real-world experiments yield results consistent with burglars' reports of their desire to avoid confrontations with armed victims. In Orlando in 1967, the police responded to a rape epidemic by initiating a highly publicized program training women in firearms use. 85 While rape increased in the nation and in

^{78.} Andrew Pierce, Tories to Propose Action on Intruders, THE TIMES (London) (Jan. 1, 2001), available at http://www.thetimes.co.uk/article/0,,2-60623,00html (describing opposition party proposal to allow use of "reasonable force" against home invaders).

^{79.} Letter from Thomas Jefferson to George Washington (June 19, 1796), in WRITINGS OF THOMAS JEFFERSON (A. Bergh ed., 1907).

^{80.} Deterrence, in DETERRENCE AND INCAPACITATION: ESTIMATING THE EFFECTS OF CRIMINAL SANCTIONS ON CRIMES 19-63 (Alfred Blumstein et al. eds., 1978).

^{81.} Trevor Bennett & Richard Wright, Burglars on Burglary 47–48 (1986).

^{82.} See Julie Horney & Ineke Haen Marshall, Risk Perceptions Among Serious Offenders: The Role of Crime and Punishment, 30 CRIMINOLOGY 575, 582 (1992).

^{83.} Eric Wiersma, Commercial Burglars in the Netherlands: Reasoning Decision-Makers?, 1 INT'L. J. OF RISK, SECURITY AND CRIME PREVENTION (1997).

^{84.} Alex Piquero & George F. Rengert, Studying Deterrence with Active Residential Burglars, 16 JUSTICE Q. 451, 464 (1999).

^{85.} See KLECK, supra note 23, at 134; see also KLECK, supra note 30, at 181.

Florida over the next year, the rape rate fell eighty-eight percent in Orlando, and burglary dropped twenty-two percent.⁸⁶

The same year, rising rates of store robberies prompted a similar (but smaller-scale) program in Kansas City, Missouri, to train store owners in gun use.⁸⁷ The next year, while the robbery rate in Missouri and the United States continued to rise significantly, the rate fell in the Kansas City metro area. The trend of increasing burglary in the area also came to an abrupt end, contrary to state and national patterns.⁸⁸

In 1982, the town of Kennesaw, Georgia, passed an ordinance requiring every home to have a gun. Exceptions were made for conscientious objectors, people with criminal records, and for people in various other categories. In the seven months before the ordinance, there had been forty-five residential burglaries; in the seven months after the ordinance, residential burglaries declined eighty-nine percent. Over the next five years, the residential burglary rate in Kennesaw was eighty-five percent below the rate before the enactment of the ordinance.

The ordinance may not have actually changed gun ownership patterns much in Kennesaw. The mayor estimated that even before the ordinance, about

- 86. See KLECK, supra note 23, at 134.
- 87. See id.
- 88. See id. at 134-35.
- 89. See Code of Ordinances, City of Kennesaw, § 34-1(a): In order to provide for the emergency management of the city, and further in order to provide for and protect the safety, security and general welfare of the city and its inhabitants, every head of household residing in the city limits is required to maintain a firearm, together with ammunition therefor.

Id.

90. Code of Ordinances, City of Kennesaw, § 34-1(b): Exempt from the effect of this section are those heads of households who suffer a physical or mental disability which would prohibit them from using such a firearm. Further exempt from the effect of this section are those heads of households who are paupers or who conscientiously oppose maintaining firearms as a result of beliefs or religious doctrine, or persons convicted of a felony.

Id.

- 91. See KLECK, supra note 23, at 136-38.
- 92. Id. Follow-up work on Kleck's analysis of Orlando, Kennesaw, and Kansas City argues that the data, correctly interpreted, show no evidence of a deterrent effect from firearms. David McDowall et al., General Deterrence Through Civilian Gun Ownership, 29 CRIMINOLOGY 541 (1991). Kleck replies that the critique is flawed; for example, regarding Kennesaw, the Criminology article lumped residential and business burglaries together (even though the deterrent effect of home firearms would only apply to home burglaries, and burglars displaced from homes might attack unoccupied businesses), and used raw numbers instead of rates (the Kennesaw population rose 70 percent from 1980 to 1987, the years in question). See Gary Kleck, Has the Gun Deterrence Hypothesis Been Discredited? 10 J. FIREARMS & PUB. POL'Y 65 (1998).

five of every six Kennesaw homes contained a gun.⁹³ But the publicity surrounding the Kennesaw law may have served as a very powerful warning to persons contemplating a residential burglary in that town: any homeowner confronted during a burglary would almost certainly be armed.

Consistent with the hypothesis of the deterrent effect of home firearms, lower-income neighborhoods have higher burglary rates, 44 while lower income persons are less likely than the rest of the population to possess firearms. 55 Of course, there are likely other contributing explanations. Lower-income homes may be less likely to have sturdy locks. It is not unreasonable to expect that a combination of *all* the defensive weaknesses of lower income homes play some role in the higher burglary rates.

VI. CONFRONTATIONS INVOLVING BURGLARS

Some individuals may choose burglary because they dislike confrontations; however, not all burglars are non-confrontational by nature. According to the Wright-Rossi prisoner survey, sixty-two percent of burglars had also perpetrated robberies. The study of currently active burglars in St. Louis observed: "Most offenders in our sample...showed little concern for the well-being of their victims. In fact, several of them said they were prepared to use violence against anyone who got in their way during the commission of an offense."

A. Confrontations with Armed Victims

What happens if a burglar does confront a family, and the family is armed? Gun prohibition advocates warn that the burglar will probably take the gun away and use it against the family.⁹⁸ But "take-aways" occur in no more than one percent of defensive gun uses and are only possible if the gun owner is so

^{93.} See KLECK, supra note 23, at 136.

^{94.} See Garland F. White, Neighborhood Permeability and Burglary Rates, 7 JUST. Q. 64 (1990) (study controlling for effect of neighborhood instability and housing density).

^{95.} See KLECK, supra note 30, at 71.

^{96.} See KLECK, supra note 23, at 139.

^{97.} WRIGHT & DECKER, supra note 65, at 111. One burglar explained: When [the victims] come in there, they better have some boxin' gloves on cause I'm gon whip some ass or somethin' and I ain't lyin'. It's gon' be a fight up in there, partner. You ain't callin' nobody. You be callin' somebody, it be 911 for ambulance for your ass 'cause I'm gon' do you. I'm gon' hurt you, I ain't lyin'. Don't come in there and y'all catch me. Hey man, I'm for real.

Id.

^{98.} The "you aren't competent to use a gun" claim thrown at defensive gun owners is a species "reactionary rhetoric"—an argument that attempts to help a particular oppressed group (crime victims) will actually harm the group. See Albert O. Hirschman, Reactionary Rhetoric, The ATLANTIC, May 1989, at 63.

indecisive that he holds the gun far away from his body and fails to act as the burglar comes near.⁹⁹

More common is that the confrontation ends badly for the aggressor. Summaries of such incidents appear every month in the National Rifle Association's member magazines, supplied by newspapers with an apparently endless stream of such stories. The stories always include citations to the newspaper article and are not based on mere self-reports of gun owners. Below are some of a typical month's worth's of incidents, from the January 1996 issue of American Rifleman:

Plans to slay everyone in the Muskegon, Michigan, store and steal enough cash and jewelry to feed their "gnawing hunger for crack cocaine" fell apart for a band of would-be killers after one of their victims fought back. Store owner Clare Cooper was returning behind the counter after showing three of the four conspirators some jewelry, when one of the group pulled out a gun and shot him four times in the back. Stumbling for the safety of his bullet-proof, glassencased counter, Cooper managed to grab his shotgun and fire as the suspects fled. They were all later apprehended, and the three present during the shooting face life imprisonment. (The Chronicle, Muskegon, MI, 8/23/95).

It was only fifteen minutes after police visited his Wyoming, Minnesota, home to warn his family of two robbery suspects believed to be at large in the area, when Mike Stich discovered a man and woman hiding beneath a blanket in the bed of his pickup truck. With the police warning in mind, Stich had toted his wife's .25 cal. handgun with him when he went outside to move his truck. Noticing movement under a blanket in the truck's bed, Stich parked the truck, circled to its rear, and ordered the fugitive couple out of his truck at gunpoint. Stich commanded the suspects to stand against a tree while his son ran inside and had Stich's wife call police. (The Times, Forest Lake, MN, 9/21/95)

Lisa Woods' ex-boyfriend had already broken into her Anderson, South Carolina, apartment once that night, hitting her in the head before police arrived, scaring him away. Four hours later, the man returned, brazenly forced his way into the home, and sprayed a friend of Woods' with mace. When the homebreaker attempted the same treatment on Woods, she shot him once, mortally wounding him. The ex-boyfriend had already been put on trespass notice at the apartment complex where Woods lived because of prior harassment incidents. (The News, Greenville, SC, 8/25/95)

Joann Harrison decided to buy her first gun for protection after someone cut her telephone lines and slashed a window screen at her Anderson, South Carolina, home. Just three weeks later,

^{99.} KLECK, supra note 23, at 122 (citing National Crime Victimization Survey data).

Harrison was forced to fire that gun at an intruder who broke into her home after cutting power to the house. A single shot from her .22 cal. revolver sent the man fleeing to a nearby yard where he collapsed from a fatal bullet wound to the chest. (The Independent / Mail, Anderson, SC, 7/28/95)¹⁰⁰

The listing of these incidents is not meant to prove a statistical case. It is interesting to note, however, how rarely such incidents are reported by mainstream media outside the area where they occur. In contrast, gun accidents involving children, and gun homicides, are often national stories.

B. Confrontation with Unprotected Victims

When burglars do encounter victims who cannot protect themselves, the results can be tragic. In thirty percent of these cases, the victim is assaulted or threatened.¹⁰¹ In ten percent of these cases, the burglaries turn into rapes.¹⁰² Over the ten-year period of 1973–82, this meant 623,000 aggravated (felony) assaults and 281,000 rapes.¹⁰³ Overall, the victim rate of death from "hot" burglaries is six times the death rate from street muggings.¹⁰⁴

C. The Reduction in Assault from Hot Burglary Deterrence

Florida State University criminologist Gary Kleck, in his award-winning book *Point Blank: Guns and Violence in America*, explains the implications of these assault statistics. Suppose that the percentage of "hot" burglaries rose from current American levels (around twelve or thirteen percent¹⁰⁵) to the average rate of Canada, Great Britain, and the Netherlands (around forty-five percent).¹⁰⁶

- 100. The Armed Citizen, THE AMERICAN RIFLEMAN (Jan. 1996).
- 101. See Bureau of Justice Statistics, Household Burglary, NCJ-96021, at 4 tbl. 8 (1985).
 - 102. See id. at 4 tbl. 9.
 - 103. See id.

104. See Franklin E. Zimring & James Zuehl, Victim Injury and Death in Urban Robbery: A Chicago Study, 15 J. LEGAL Stud. 1 (1986); see also Franklin E. Zimring, Crime Is Not the Problem ch. 10 (1997). Zimring argues that American sentencing policy (such as California's three-strikes law) is misguided, because it treats burglary as harshly as robbery. Since burglary is much less likely to lead to victim death, Zimring argues, sentencing policies should encourages criminals to choose burglary over robbery. Zimring's point is valid as far as it goes, but it fails to distinguish hot burglaries from other burglaries. Replacing robberies with cold burglaries could save lives; replacing robberies with hot burglaries would cost lives. See David B. Kopel, Disarming the Victims, Chronicles, Apr. 1999, at 46 (reviewing Franklin E. Zimring, Crime Is Not the Problem (1997)).

105. See Bureau of Justice Statistics, Household Burglary, supra note 102, at 4 tbl. 8 (citing 12.7%).

106. See KLECK, supra note 23, at 140. The reduction in the rates of assault and rape would be diminished, however, to whatever degree that today's home invasion burglars are more violent than the burglars who avoid homes. More than half of home invasion burglars are relatives or acquaintances of the victim. See Philip Cook, The Technology of Personal Violence, in 14 CRIME AND JUSTICE: A REVIEW OF RESEARCH 56

Knowing how often a hot burglary turns into an assault, we can predict that an increase in hot burglaries to the levels of other nations would result in 545,713 more assaults every year. This by itself would raise the American violent crime rate 9.4 percent.¹⁰⁷

Put another way, the American violent crime rate is significantly lower than it would otherwise be, because American burglars are much less likely than Canadian burglars to enter an occupied home. Given that the average cost of an assault, in 1990 dollars, is \$13,490,¹⁰³ and the cost of rape \$56,419,¹⁰³ the annual cost savings from reduced assault amount to more than seven billion dollars (\$7,361,668,300). The savings from avoided rapes would be roughly similar.¹¹⁰

The seven billion dollar saving from reduced assaults is, by the way, much larger than the revenue of the every American firearms and ammunition manufacturer combined.¹¹¹

VII. GUNS COMPARED TO OTHER ANTI-BURGLARY DEVICES

Gun ownership for home protection is considerably more beneficial to the community than many other anti-burglary measures. Burglars do not know which of their potential victims may be armed. Until a confrontation with a homeowner, the potential burglar generally has no idea whether any given homeowner has a gun. Thus, careful burglars must (and most do) take care to avoid entering any home where a victim might be present. Because about half of all American homes contain a gun, burglars tend to avoid all occupied American homes. People who do not own guns—even people who belong to gun prohibition organizations—enjoy free rider safety benefits from America's armed homes. This free-rider

n.19 (Michael Tonry ed., 1991). If the rate of home invasion by burglars who are strangers rose, these strangers might not be so personally hostile to the occupants. Also, it is possible that current group of home invasion burglars (who invade despite the risk of being shot), may be temperamentally more aggressive than burglars as a whole. Thus, if more burglars began perpetrating home invasions, these burglars might be less inclined to assault or otherwise attack the victim.

^{107.} See KLECK, supra note 23.

^{108.} Simon Hakim et al., Estimation of Net Benefits of Residential Electronic Security, 13 JUST. Q. 153, 161 (1996).

^{109.} *Id*.

^{110.} John Berlau, Will Other Vices Be Targeted? INVESTOR'S BUS. DAILY, Feb. 12, 1998, at A1.

^{111.} Manufacturers are required to pay an 11% excise tax on the sale of ammunition and long guns, and a 10% tax on the sale of handguns. Based on 1999 excise tax collections, the gross sales of American companies were \$ 686 million for ammunition, \$ 677 million for long guns, and \$369 million for handguns. Letter from Larry Ference, National Shooting Sports Foundation, to David B. Kopel (Feb. 9, 2001) (on file with Author).

^{112.} See supra notes 10-11 and accompanying text.

problem is present in many cases of crime prevention which rely on changing the physical environment in which the criminal operates.¹¹³

In contrast to guns, burglar alarms appear to have no net community benefit. Burglar alarms have been shown to reduce burglaries for homes in which they are installed. ¹¹⁴ However, the presence of many burglar alarms in a neighborhood does not appear to affect the burglary rate of unalarmed homes. ¹¹⁵ In addition, false alarms (which account for ninety-four to ninety-eight percent of all burglar alarm activations) impose very large public safety costs through misappropriation of limited police resources. ¹¹⁶ False-alarm signals travel over 911 lines and may crowd out genuine emergencies. ¹¹⁷ Thus, alarms impose substantial external costs on other homes in the community. Guns, of course, lie inert until someone decides to use them; they do not go off because a cat jumped into a beam of light.

Gun prohibitionists make all sorts of claims about the risks of "a gun in the home." These claims have some validity if the gun is in the home of a violent felon, an alcoholic, or a person with suicidal tendencies. But in responsible hands, guns are no danger at all, since the gun will only shoot in the direction in which it is pointed and will not fire unless the trigger is pulled. Whatever the risks of a gun in the home, the risks are borne almost entirely by the people in that home. The non-gun owners in the community get the benefit of safety from home invasion burglars, while assuming no risks at all. (The most significant external danger of a gun in the home is if the gun is stolen by a criminal, a risk that also applies to any other device that could be stolen and used by a criminal, such as a car or a crowbar, or any valuables that could be sold and the profits used to buy crime tools.)

Guns stay quiet and unobtrusive until needed. They do not bark all night and wake up the neighborhood, as dogs often do. Nor do guns rush into the street to attack and sometimes kill innocent people, as some guard dogs do. In New Zealand, where defensive gun ownership is unlawful, a surge of home invasions has led to greatly increased sales of aggressive dog breeds. ¹²⁰ It is not clear that

^{113.} See Terance D. Miethe, Citizen-Based Crime Control Activity and Victimization Risks: An Examination of Displacement and Free-Rider Effects, 29 CRIMINOLOGY 419 (1991).

^{114.} *Id.* at 429 tbl. 1.

^{115.} Id.

^{116.} Hakim et al., supra note108, at 15760. An analysis of burglar alarms in a police district in Dade County (Miami) found that of 230 electronic alarms, only one was the result of a real burglary. Nine of the alarms were accidentally activated by the alarm owners, and the remaining 220 were the result of alarm defects. James J. Fyfe, Police/Citizen Violence Reduction Project, FBI L. ENFORCEMENT BULL., at 23 (May 1989).

^{117.} See Hakim et al., supra note 108, at 166.

^{118.} See, e.g., Handgun Control, Inc., Guns in the Home (visited Feb. 7, 2001) http://www.handguncontrol.org/facts/ib/gunhome.asp.

^{119.} See, e.g., Kates et al., supra note 28, at 579-84.

^{120.} See Invasions Prompt Inquiries for Guns, THE PRESS (N.Z.), Nov. 10, 1999.

New Zealand neighborhoods are better off with more Rottweilers (which may be owned without restrictions) and fewer shotguns.

Firearms, which are typically stored deep inside a home, do not make a neighborhood look ugly. Passive detterents, such as window bars, give a neighborhood the appearance of a prison and some can trap the occupants of a home during a fire.

Most people consider it rational for householders to have burglary insurance. Yet insurance premiums must (if the insurance company is to stay in business) be set at a level for which the cost of the premiums exceeds the probable payout by the insurance company over the long run. Insurance is, therefore, a bet on the wrong side of the odds for the insured. If it is reasonable for people to reduce the risks of burglary by buying insurance, it is also reasonable for people to reduce the risks of burglary by purchasing a gun for home protection. Over a tenyear period, the cost of insurance premiums far exceeds the cost of a good gun. The gun, unlike the insurance premium, can actually prevent a victim from being injured. And unlike insurance premiums, a gun helps benefit the entire community, since all American enjoy the 9.4 percent lower violent crime rate attributable to defensive gun ownership in the home. Is Insurance companies, which already subsidize various home protection systems such as burglar alarms, should begin giving substantial discounts to policy-holders who verify that they have a gun and have been trained in defensive gun use.

VIII. POLICY IMPLICATIONS

A. Undersupply of Firearms

The "diffusion of benefits" is good news for people who do not own guns. They get the full free rider benefit, while incurring none of the expense to buy a gun or the time to learn to use the gun, practice with it, and clean it. But when free riding of a good is possible, then the good will be undersupplied.

Consider a recent study of a device called LoJack, designed to prevent auto thefts.¹²³ The LoJack is a radio transponder hidden in a car. When the car's owner reports that the car has been stolen, law enforcement can activate the transponder via radio signal. The LoJack transponder then begins emitting a radio signal, making it easier for police to locate the stolen car.¹²⁴ Like guns in the home,

^{121.} If one presumes that the annual cost of thest insurance for a home is \$50 or more. The Beretta Model 3032 Tomcat Pistol carries a suggested retail price of \$333. See Gun Digest 2001, at 242 (Ken Ramage ed., 2001). The Taurus Model 85 Revolver is \$286. See id. at 283. The least expensive handgun listed in Gun Digest 2001 is the Lorcin L-25, at \$69. See id. at 257.

^{122.} See supra note 107 and accompanying text.

^{123.} See Ian Ayres & Steven Levitt, Measuring Positive Externalities from Unobservable Victim Precaution: An Empirical Analysis of Lojack, 113 Q.J. ECON. 43 (1998).

^{124.} See Shelly Feuer Domash, Keeping Track with LoJack, POLICE, June 1999, at 50.

LoJack is unobservable to a criminal considering potential targets. Thus, LoJack (like guns in the home) benefits the entire community equally, rather than conferring a benefit mainly on the owner. A one percent increase in LoJack installation in an area led to a twenty percent decline in car thefts in big cities, and a five percent decline statewide. The total benefits of LoJack were fifteen times greater than the costs. But less than ten percent of the total social benefits went to LoJack owners; the rest went to the free riders who did not install LoJack. As a result, LoJack was "dramatically undersupplied." The small insurance subsidies for LoJack installation were not sufficient to correct this problem.

With guns, the undersupply problem would not be as severe. Besides preventing burglaries, guns have various benefits that are available only to the user (such as use in the shooting sports). On the other hand, many jurisdictions, such as New York City, impose severe externalities (expensive taxes and fees, complex licensing systems) to discourage gun ownership. ¹²⁹ A few jurisdictions (Chicago and Washington, D.C.) totally forbid possession of handguns, the gun most useful for defense in confined urban settings. ¹³⁰

Consider the scenario faced by burglars if the possibility that a victim would be armed were to increase to nearly 100 percent, that is, if almost every home had a gun that was readily deployable for home defense. It is not unreasonable to expect that the home invasion rate would drop to near zero. As noted above, as long as gun ownership did not increase among the small percentage of the population uniquely likely to abuse firearms (self-destructive substance abusers and violent criminals), an increase in defensive home gun ownership would have large social benefits and few social costs.

Thus, jurisdictions with prohibitory or repressive gun licensing laws should consider whether those laws, by depressing the rate of defensive gun ownership, may be imposing high costs on everyone in the jurisdiction. While a safer society is generally considered good, some firearms policy lobbyists morally oppose gun ownership for defensive purposes. As Mrs. Sarah Brady explains, "To me, the only reason for guns in civilian hands is for sporting purposes." The

^{125.} See Ayres & Levitt, supra note 123, at 53, 58.

^{126.} See id. at 75.

^{127.} *Id.* at 47.

^{128.} See id. at 75.

^{129.} See, e.g., Admin. Code of the City of N.Y., §§ 10-131, 10-301-306.

^{130.} See, e.g., D.C. CODE ANN. §§ 6-2312(a)(4) (1981). Shotguns and rifles can also be used for home defense, but their greater length makes them harder to maneuver in confined settings and easier for an attacker to take away. Some rifle rounds create a serious risk of overpenetration—of entering and exiting the target burglar's body and continuing forward to pass through a wall, perhaps killing someone in the next room. In Washington, D.C., use of a long gun from home defense is technically legal, but in effect impossible, since long guns must be kept unloaded and must also be locked up or disassembled.

^{131.} Tom Jackson, Keeping the Battle Alive, TAMPA TRIB., Oct. 21, 1993; see also In Step With: James Brady, PARADE MAG., June 26, 1994, at 18 (reporting that when he was asked if handgun ownership was defensible, Mr. Brady replied, "For target shooting, that's

anti-defense view underlies a wide variety of gun control proposals, such as following Canada's lead by requiring that guns in the home be locked and stored so "safely" as to be inaccessible for defensive deployment during a break-in. 132

B. Network Effects

In economics, an externality can be found where "an agent does not bear the full cost of his actions." Although the concept of externality is most often used in cases where the agent inflicts costs on others (e.g., the agent's pollution falls on someone else's land), the concept can also be used when the agent reaps only part of the benefits of his actions. Firearms in the home appear to be this latter type of case.

A network effect may be found when "the utility that a user derives from consumption of a good increases with the number of agents consuming the good," or when "one consumer's value for a good increases when another consumer has a compatible good." The intensity of network effects varies along a continuum. At the highest end are actual communications networks. For example, a telephone would be of little use unless many other people were on the same telephone system. "At the other end of the continuum are a variety of phenomena in which provision of a good for service positively relates to some level of scale, but in which the scale economies themselves create the value rather than interactions among users of the good."

In the context of home invasion burglary deterrence, firearms appear to be associated with network effects at the lower end of the continuum: the more homes with firearms, the greater the burglary deterrence. Thus, if one person in London were granted an exemption from English gun laws and were allowed to possess a firearm for home protection, there would be no improvements in burglary deterrence. From the burglar's point of view, over 99.999% of London homes would still be unprotected. Conversely, extra gun density in Kennesaw benefited the existing home owners with guns. If burglars see Kennesaw as an extraordinarily well armed community, then burglary deterrence increases.

okay. Get a license and go to the range. For defense of the home, that's why we have police departments.")

^{132.} See Department of Justice Canada, Storage of Firearms by Individuals, CANADIAN FIREARMS MANUAL, available at http://www.canadianfirearms.com/cfm/english/topics/14storag/1410300d.htm (visited Feb. 23, 2001).

^{133.} Dennis W. Carlton & J. Mark Klamer, The Need for Coordination Among Firms, with Special Reference to Network Industries, 50 U. CHI. L. REV. 446, 450 n.15 (1983).

^{134.} Michael L. Katz & Carl Shapiro, Network Externalities, Competition, and Compatibility, 75 AM. ECON. REV. 424, 424 (1985).

^{135.} Joseph Farrell & Garth Saloner, Standardization, Compatibility, and Innovation, 16 RAND J. ECON. 70, 70 (1985).

^{136.} Mark Lemley & David McGowan, Legal Implications of Network Economic Effects 86 CALIF. L. REV. 479, 609 (1998).

One of the strengths of a free society is the potential for non-hierarchical coordination. Sophisticated social tools can be created without central planning. For example, "Millions of people have incrementally helped shape the English language into an enormously ornate and valuable institution. Those who have contributed to this achievement have acted without the help of the state or any other hierarchical coordinator." ¹³⁷

Public security via private firearms ownership in the United States has likewise evolved through non-hierarchical coordination. Yet even though an armed citizenry may in some situations make society safer, the very notion that citizens can use force (or threaten to use force) against criminals is an offensive notion to some people. These people believe that public security *must* be ordered only by the government, and failure to rely exclusively on the government is an unbearable insult to the government. For example, in 1953, when the British Parliament was outlawing the carrying of sharp objects, such as knives, for defensive purposes, some M.P.'s pointed out that an elderly woman who worked for Parliament carried a knitting needle for protection on her walk home. Advocates of the new law replied indignantly that such carrying implied that the government could not keep the peace. Apparently, preserving the government's self-esteem was more important than allowing the woman to protect herself from criminals.

That firearms in the home appear to display network effects reinforces the importance of the effect of firearms laws at the margin. Consider a hypothetical that a given firearms law has no actual public safety benefit but does provide emotional satisfaction to some people. Gun "buy-backs" appear to be such a law. Many people who are skeptical of gun surrender programs consider them harmless, since they do not disarm any person involuntarily. But the presence of network effects in home invasion deterrence suggests that any program which disarms non-criminal elements of the population (even voluntarily) may harm the entire population. If a citizen disarmament program reduces household gun density in a city from 43.5 percent to 43 percent, then the network effect of burglary deterrence are weakened.

C. Courts and the Costs and Benefits of Firearms

Evaluating the total costs and benefits that firearms create is difficult. The fact that firearms ownership is protected by the U.S. Constitution and forty-four state constitutions suggests that firearms ownership (like the free exercise of

^{137.} ROBERT C. ELLICKSON, ORDER WITHOUT LAW 5 (1991).

^{138.} See text at notes 132-33.

^{139.} Joyce Lee Malcolm, Of Guns and Knitting Needles, WASH. TIMES, Jan. 14, 1999, at A17.

^{140.} *Id*

^{141.} See generally UNDER FIRE: GUN BUY-BACKS, EXCHANGES, AND AMNESTY PROGRAMS (Martha R. Plotkin ed., 1996) (Police Executive Research Forum). Properly speaking, government purchases of civilian guns are not "buy-backs," because the government never owned the guns in the first place.

religion, or freedom of the press, or other constitutionally protected acts) has already been set above the standards of cost/benefit analysis. Security in the home, like attending the church of one's choice, has a value that cannot be quantified and is immune from any attempts at constriction based on a cost/benefit analysis.

Firearms also appear to provide protection from an extremely costly, but rare event: genocide. Every government in the twentieth century which has perpetrated genocide has first disarmed the victims. (Of course the reverse is not true; only some cases of disarmament are followed by genocide.) The cost of one incident of genocide is vastly greater than the cost of all the crimes perpetrated by criminals with guns in the entire history of the United States. How to precisely value the protective value of firearms in an American context is a complex question. Whether one thinks that the risk of genocide in the United States rises to, say, the one percent possibility over a 50 or 100 or 200-year future projection depends in part on how one views past actions towards minorities (e.g., blacks, American Indians) in the U.S., and to what degree one thinks that the U.S. is susceptible to the evils of human nature which have plagued other countries.

In a more mundane context, the economic benefits of firearms are just being discovered. John Lott's research has gone a long way toward identifying societal benefits that accrue from laws allowing licensed citizens to carry firearms for protection in public.¹⁴³ But very little has been done on the quantifiable benefits of firearms in many other contexts—such as protecting store proprietors from robbers, or protecting domestic violence victims from stalkers and similar predators. Criminologists and other social scientists will continue to study these topics, and legislatures will continue to make firearms laws based in part on this social science.

It seems doubtful that the function of making determinations based on criminology and econometrics should be transferred from legislatures to judges and juries. 144 Figuring out aggregate costs and benefits becomes especially difficult for juries when the beneficiaries are not before the court—and may not even know they are beneficiaries. This is the case with home invasion burglary deterrence, in which most non-gun-owning households are not even aware that they are beneficiaries. While readers may agree or disagree about the exact degree to which U.S. firearms density deters hot burglaries, the very inability to come up with a precise answer suggests that resolution of the firearms cost/benefit issue is not appropriate for the judicial system.

^{142.} See David B. Kopel, Book Review, 15 N.Y. L. SCH. J. OF INT'L & COMP. L. 355 (1995) (reviewing AARON ZELMAN ET AL., LETHAL LAWS (1994)).

^{143.} See John Lott, More Guns, Less Crime (2d ed. 2000).

^{144.} There may be exceptions to this principle when a statute invites judges and juries to undertake this kind of analysis—as the U.S. antitrust statutes seem to do. For a critique of the open-ended nature of antitrust law, see generally DAVID B. KOPEL, ANTITRUST AFTER MICROSOFT (2001).

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