# AUTO CHOICE: IMPACT ON CITIES AND THE POOR

### A JOINT ECONOMIC COMMITTEE STUDY



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#### **March 1998**

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#### **EXECUTIVE SUMMARY**

The current system of paying for auto injuries suffers from two fundamental problems: premiums are too high and victims with serious injuries rarely receive full compensation. Of particular concern is how the shortcomings of the present tort liability system adversely impact low-income and urban households. This paper reviews the causes and consequences of a costly and inefficient auto insurance system, and discusses the benefits and savings that the Auto Choice reform would produce.

#### **Shortcomings of the Current Auto Insurance System**

- Excessive and unnecessary fraud, litigation, and injury claims have pushed the average insurance premium to over \$774 in 1996, and the cost to insure an automobile is rising faster than the rates of inflation for food, energy, housing, and medical care.
- The current tort system fails to fully compensate serious injuries. On average, victims with losses between \$25,000 and \$100,000 recover only about one-half (56 percent) of their losses, while those with losses over \$100,000 recoup just 9 percent of their losses.
- The perverse incentives of the tort system result in widespread fraud and abuse. According to the RAND Institute for Civil Justice, upwards of 35 percent of injury claims are unnecessary.

#### **Problems for Urban Drivers**

- Auto insurance in inner cities is prohibitively expensive. The average premium for a 38-year-old female with a clean driving record in central Los Angeles is nearly \$3,500 per year.
- All of the problems that plague the tort liability system fraud and abuse, excessive litigation and uninsured motorists are worse in inner cities. As a result, it costs 47 to 57 percent more to pay injury claims in cities than in other areas.
- Uninsured motorists are a widespread problem for many cities. Some areas in Los Angeles and San Diego are estimated to have uninsured motorists rates over 90 percent.
- Since the cost to provide insurance in urban areas is so much greater, there are often large disparities in premiums between inner cities and suburbs, frequently exceeding \$1,000.
- Although accidents in cities are less severe than accidents elsewhere, they are much more likely to result in an injury claim. For example, for every 100 accidents in Los Angeles, there are roughly 99 bodily injury claims, over twice the average for the rest of California.
- Because high premiums make it more difficult to own a car, many low-income, inner-city workers are unable to access better-paying suburban jobs.

#### **Problems for Low-Income Families**

• When families in the bottom income quintile buy auto insurance, they spend seven times the percentage of their household income on auto insurance as do families in the top quintile.

- Families earning less than half of the poverty line spend an average of one-third (31.6 percent) of their income on premiums when they buy auto insurance. Moreover, half of all families making less than twice the poverty line have to put off paying for other major expenses such as food, rent or mortgage payment in order to pay their auto premium.
- The problem of costly auto insurance is exacerbated for many poor families because they reside in large cities where liability premiums are already excessively high.
- High premiums add to the transportation obstacles that impede welfare reform. Research indicates that owning a car makes it 12 percent more likely that a welfare recipient will work.
- The regressivity of the current system is heightened by that fact that the typical low-income household spends more on auto insurance in two years than the value of their car.

#### **Problems for State and Local Governments**

- Automobile cases are the most common type of tort litigation brought against government, accounting for 44 percent of all tort cases where the government is the primary defendant.
- Government agencies are the defendant in 29 percent of jury verdicts in excess of \$1 million, even though they represent less than 8 percent of all such jury verdicts.
- Nationwide, local governments spent approximately \$8.5 billion on all forms of litigation in 1991, and for roughly one in five such costs grew by over 30 percent during 1991 and 1992.
- State Medicaid programs pay for close to 10 percent of all medical costs resulting from auto accidents, totaling \$1.7 billion in 1994 alone.

#### **Benefits of Auto Choice**

- Auto Choice would reduce overall premiums by 24 percent nationwide, averaging \$184 per car. For a low-income household, these savings are the equivalent of five weeks of free groceries or nearly four months of electric bills.
- Auto Choice would make over \$35 billion in savings available to consumers in 1998, and up to \$193 billion over 1998-2002.
- Since low-income families often forgo the optional collision and comprehensive property damage coverage, their personal injury savings represent a larger share of their overall premium – 36 percent on average.
- Auto Choice would increase the amount of compensation available to many seriously-injured victims. The additional health coverage is of greatest value to low-income households who lack sufficient private health insurance.
- City governments would benefit from a dramatic reduction in lawsuits, since they would no longer be a "deep pocket" for pain and suffering lawsuits that involve city buses and cars.
- Lower auto insurance premiums will make owning a car more affordable for the poor, thereby allowing them to find and hold down better-paying jobs that require a longer commute.
- Auto Choice promises to greatly reduce the disparity in premiums between cities and suburbs, which would both encourage some city residents not to move elsewhere as well as to reduce the pressure to force suburban drivers to subsidize urban drivers.

# **AUTO CHOICE:**

# IMPACT ON CITIES AND THE POOR

#### I. INTRODUCTION

The current auto insurance system suffers from numerous shortcomings, and these problems are painfully felt by virtually everyone who buys auto insurance. Excessive and unnecessary fraud, litigation and injury claims have pushed the average insurance premium to more than \$774 in 1996. The cost to insure an automobile is rising one-and-one-half times faster than the rate of inflation, outpacing the growth in costs for food, energy, housing, and even medical care. Despite more money being paid into the system, however, accident victims with serious injuries are not being fully compensated for their losses. The current system of compensating people through a third-party tort liability system, therefore, results in the worst possible combination: high costs and low benefits.

The problems of cost and compensation are felt by everyone who purchases auto insurance, but some of the biggest losers are low-income families and inner-city residents. For these consumers, the way the current system operates often appears extremely inequitable. The intensity of feelings on auto insurance is reflected in an editorial from the African-American newspaper *The Philadelphia Tribune*:

There is one issue that impacts more Philadelphians than all of the crimes committed in any given month and that is the (criminal) auto insurance rates Philadelphians are FORCED to pay simply because they live within the city.

Because state law mandates that all motor vehicle owners must have insurance to drive those vehicles and because many Philadelphians are required to pay auto insurance rates far in excess of the value of the vehicles they drive, many Philadelphians are committing a crime because they are driving without the legally required auto insurance.

Curiously, none of these tough on crime candidates is addressing the issue of usurious auto insurance rates which has turned thousands of otherwise law abiding Philadelphians into criminals. Many city residents see a better option in becoming petty criminals than impoverishing themselves by paying the highest auto insurance rates in the nation.<sup>2</sup>

<sup>&</sup>lt;sup>1</sup> National Association of Insurance Commissioners, *State Average Expenditures & Premiums for Personal Automobile Insurance in 1996* (Kansas City, MO: National Association of Insurance Commissioners, 1998), Table 3; and U.S. Department of Labor, Bureau of Labor Statistics, "Consumer Prices Indexes" (1998), online at http://stats.bls.gov/cpihome.htm.

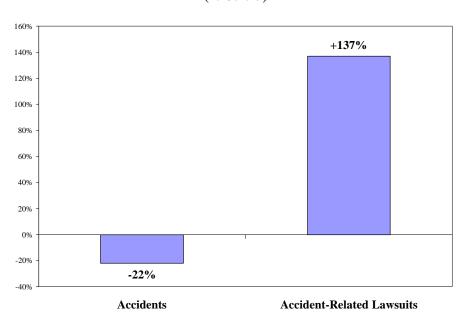
<sup>&</sup>lt;sup>2</sup> Editorial, *The Philadelphia Tribune*, 10/21/94. Capitalization in original.

The fact that insurance costs, and as a result premiums, are higher in inner cities adds to a perception that the system is corrupt and unfair. Since inner cities are disproportionately poor and nonwhite, some critics have described the problem as a "black tax" or a "poor tax." The problem, however, results not so much from who the policyholders are as from the flawed tort liability system that pushes up costs. Unfair or not, premiums are set to reflect the expected costs of paying claims under a liability system that encourages fraud, abuse and litigation. As this paper documents, all of these problems are worse in urban areas. Inner-city residents are therefore beset by what is best termed a "tort tax."

The problem of high rates paid by inner-city residents often is exacerbated by large disparities in premiums between cities and suburbs. In Philadelphia, for example, a relatively limited insurance policy for a married adult male with no accidents or traffic violations costs approximately \$1,800 each year. Moving to one of the nearby suburbs, however, could cut that amount by more than half – a savings of over \$900 just by moving out of Philadelphia County.<sup>4</sup>

The plight of cities is illustrated by the experience of Washington, D.C. Between 1985 and 1994, the number of auto accidents in the District of Columbia fell by 22 percent (Figure 1). Over roughly the same time period (1985-95), however, the number of accident-related lawsuits increased by 137 percent.<sup>5</sup> Clearly, there is a problem with the insurance system when the number (as well as the severity) of accidents is declining, while the number of lawsuits is climbing rapidly.

Figure 1. Accidents and Related Lawsuits in Washington, D.C. (1985-95)



Source: The Washington Post, 6/23/96.

<sup>5</sup> The Washington Post, 6/23/96.

<sup>&</sup>lt;sup>3</sup> See, for example, Mary A. Mitchell op-ed, *The Chicago Sun-Times*, 7/21/96.

<sup>&</sup>lt;sup>4</sup> Pennsylvania Department of Insurance (Harrisburg, PA: 1995), cited in Insurance News Network, "Pennsylvania Auto Insurance Premiums" (1997), online at http://www.insure.com/states/pa/auto/premiums/.

The pinch of higher premiums is perhaps felt most keenly by low-income families. Data from the Bureau of Labor Statistics indicate that when families in the bottom income quintile (bottom 20 percent) buy auto insurance, they spend seven times the percentage of their household income on auto insurance as do families in the top quintile. The problem is even worse for the very poor. A study of families earning less than half of the poverty line found that when such families buy auto insurance, they spend an average of one-third (31.6 percent) of their family income. Moreover, the study revealed that half of all families making less than twice the poverty line had to put off paying for other major expenses such as food, rent or a mortgage payment in order to pay their auto premium. Not surprisingly, when faced with having to make such sacrifices, some drivers choose instead to enter outlaw status as an uninsured driver.

The problems are not just isolated to low-income and urban drivers. Suburban and middle-class families also suffer from the same problems in terms of cost and compensation. The financial burden of auto insurance is magnified for these families by the fact that the average middle-income household owns two vehicles. Excessively high premiums take money from the family budget that could be better spent on items such as education, health care or a home mortgage. For example, middle-income families on average spent two-and-one-half times more on vehicle insurance in 1995 than on education. In addition, high premiums in urban areas result in a large number of uninsured motorists. Suburban residents not only pay higher premiums as a result but also are threatened with financial hardship if they are seriously injured by an uninsured motorist. Finally, the perverse incentives of the tort system put all drivers at risk of being the target of a frivolous lawsuit or being victimized by a criminal fraud ring.

The root cause of many of the problems associated with auto insurance is the perverse incentives embedded in the tort liability system. These incentives encourage claimants to inflate actual losses in order to recover larger damage awards, mainly in the form of pain and suffering damages. Legal scholar Charles Wolfram notes that "[p]ain and suffering and similar nonmonetary damages probably average three times the monetary damages in personal injury claims." Since pain and suffering awards are calculated as three times medical and wage loss, there is a powerful incentive to inflate one's claimed economic damages and pursue legal action.

The incentive of pain and suffering awards is clearly seen in the experience of state reforms. In an effort to reduce unnecessary litigation, some states have enacted tort "thresholds" that set a minimum amount of economic loss that must be sustained before litigation can occur. In many cases, the outcome of such reforms is that the threshold becomes a target for claimants who simply inflate their medical claims through additional and often unnecessary visits to the doctor in order to reach the threshold. After Massachusetts raised its threshold from \$500 to \$2,000 in

<sup>7</sup> Robert Lee Maril, "The Impact of Mandatory Auto Insurance Upon Low Income Residents of Maricopa County, Arizona" (Unpublished manuscript, 1993), 17.

<sup>&</sup>lt;sup>6</sup> See *infra* note 112 and accompanying text.

<sup>&</sup>lt;sup>8</sup> U.S. Department of Labor, Bureau of Labor Statistics, "1995 Consumer Expenditure Survey" (1997), online at http://stats.bls.gov/blshome.html.

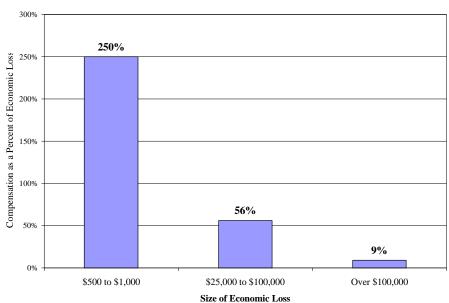
<sup>&</sup>lt;sup>9</sup> *Ibid.* Does not include educational expenses funded through tax payments.

<sup>&</sup>lt;sup>10</sup> Charles W. Wolfram, *Modern Legal Ethics* (St. Paul, MN: West Publishing Co., 1986), 528 at note 21.

1988, the median number of doctor visits rose from 13 to 30 per auto injury claim. <sup>11</sup> In Hawaii, where the threshold was \$7,000 in 1990, the median number of visits for claimants who went to chiropractors was 58 per claimed injury. <sup>12</sup> Overall, the RAND Institute for Civil Justice estimates that between 35 and 42 percent of all medical claims occur in response to the incentives of the tort liability system, resulting in \$13 to \$18 billion in higher premiums in 1993. <sup>13</sup>

The tort liability system is also extremely inefficient at compensating accident victims. According to the RAND Institute for Civil Justice, accident victims with relatively minor injuries (under \$5,000 in economic loss) generally receive compensation worth two to three times the size of their damages. In contrast, victims with economic losses between \$25,000 and \$100,000

Figure 2. Compensation of Economic Loss under the Tort System



are compensated for roughly one-half (56 percent) of their losses on average, and those with damages over \$100,000 can expect to recoup just 9 percent of their losses (see Figure 2).<sup>14</sup> As consumer advocate **Andrew Tobias** described it, "It's like homeowner's insurance that pays triple if your stereo's stolen (or you say it was) but only 9 percent if the house burns down."15

Source: Carroll, et. al.

One reason for

this failure is that only a small portion of each premium dollar paid for bodily injury liability actually ends up as compensation for real injuries. Based on data from the Insurance Information Institute, less than 15 percent of each premium dollar paid for bodily injury (BI) liability actually

Andrew Tobias, "Ralph Nader is a Big Fat Idiot," Worth (October 1996), 102.

<sup>&</sup>lt;sup>11</sup> Sarah S. Marter and Herbert I. Weisberg, "Medical Expenses and the Massachusetts Automobile Tort Reform Law: A First Review of 1989 Bodily Injury Liability Claims," *Journal of Insurance Regulation* 10, no. 4 (Summer 1992): 512.

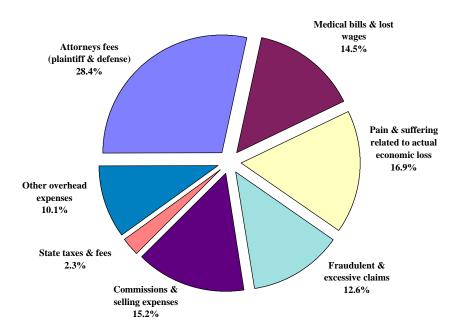
<sup>&</sup>lt;sup>12</sup> Insurance Research Council, *Automobile Injury Claims in Hawaii* (Oak Brook, IL: Insurance Research Council, 1991), 26.

<sup>&</sup>lt;sup>13</sup> Stephen Carroll, Allan Abrahamse, and Mary Vaiana, *The Costs of Excess Medical Claims for Automobile Personal Injuries* (Santa Monica, CA: RAND, 1995), 23.

<sup>&</sup>lt;sup>14</sup> Stephen J. Carroll, James S. Kakalik, Nicholas M. Pace, and John L. Adams, *No-Fault Approaches to Compensating People Injured in Automobile Accidents* (Santa Monica, CA: RAND, 1991), 187.

goes to cover legitimate medical costs and wage loss (see Figure 3). 16 The pain and suffering awards associated with these claims net claimants an additional 16.9 percent of the premium dollar. Payments made for fraudulent and excessive claims account for at least 12.6 percent of the premium. More than 28 percent of the BI premium dollar goes towards lawyers' fees (both plaintiffs and defendants). The remaining premium

Figure 3. Distribution of Bodily Injury Premiums



Source: Joint Economic Committee calculations and Insurance Information Institute data.

is consumed by state taxes and license fees (2.3 percent), commissions and costs associated with selling policies (15.2 percent), and other overhead expenses (10.1 percent). Overall, the tort liability system spends close to \$6 on other expenses for each \$1 it covers in actual medical and wage loss resulting from auto accidents.

#### Auto Choice Reform

One reform that would help address these problems is Auto Choice, a proposal developed by Jeffrey O'Connell of the University of Virginia School of Law, and Michael Horowitz of the Hudson Institute.<sup>17</sup> Auto Choice gives consumers the option of exiting the current third-party liability system in favor of a primarily first-party insurance system that costs less and provides quicker and more complete compensation for all economic losses.<sup>18</sup> In effect, Auto Choice

<sup>&</sup>lt;sup>16</sup> The basic breakout of the BI premium is from the Insurance Information Institute (New York, NY: 4/30/97) This analysis uses RAND's lower bound estimate of excessive claiming behavior to identify the component of the BI premium attributable to fraudulent and excessive claiming.

<sup>17</sup> The proposal is more fully described in Jeffrey O'Connell, Stephen Carroll, Michael Horowitz, Allan Abrahamse,

<sup>&</sup>lt;sup>17</sup> The proposal is more fully described in Jeffrey O'Connell, Stephen Carroll, Michael Horowitz, Allan Abrahamse and Paul Jamieson, "The Comparative Costs of Allowing Consumer Choice for Auto Insurance in All Fifty States," *Maryland Law Review*, 55, no. 1 (1996): 160-222. See also O'Connell et al. (1995) and O'Connell et al. (1993). <sup>18</sup> Economic damages refer to direct measurable losses such as medical expenses, lost wages and income, and

funeral costs. The term "pain and suffering" is loosely used to refer to all non-economic damages, including physical and emotional pain, stress, and other psychic damages.

would make insurance coverage for pain and suffering optional. Drivers who wish to remain with their state's current insurance system could do so at essentially no extra cost. <sup>19</sup>

Individuals who want to exit the liability system's pain and suffering regime would do so by purchasing Personal Protection Insurance (PPI). Rather than suing other drivers or their insurance companies, drivers who elect PPI would automatically be compensated for all economic losses up to policy limits by their own insurance company, without regard to fault. PPI drivers retain the right to sue under existing state negligence laws for economic losses above policy limits. Since PPI provides insurance coverage for economic damages only, PPI drivers could neither sue nor be sued for non-economic losses, with the important exceptions of injuries inflicted intentionally or as the result of drug or alcohol use.

Alternatively, individuals could opt to retain the same basic rights they now have under existing state law by purchasing tort maintenance coverage (TMC) to cover accidents involving PPI drivers. Compensation for accidents involving drivers who stay with the current system would be unaffected by this reform. For accidents involving PPI drivers, TMC policies allow recovery of both economic and non-economic losses, much as existing uninsured motorist (UM) policies currently provide first-party coverage for such accidents. Thus, the limit on recovery for pain and suffering losses caused by a PPI driver is chosen by the TMC driver.<sup>21</sup> If economic losses exceed TMC policy limits, TMC drivers can sue negligent PPI drivers for all of the remaining economic loss.<sup>22</sup>

Auto Choice seeks to preserve the traditional state role in regulating auto insurance. First, state laws defining negligence and other legal concepts are left largely intact. Second, state insurance commissioners can block the reform if they determine that their state would not experience a specified minimum amount of savings in premiums for bodily injury liability. Finally, and most importantly, the Auto Choice proposal allows states to repeal the federal reform altogether or to modify it to suit their state's needs. New Jersey Governor Christine Todd Whitman has called the federal Auto Choice legislation "a model of federalism in that federal law would represent the first word, rather than the last word, on the subject." 23

#### II. INSURANCE COST FACTORS IN URBAN AREAS

The most glaring problem with auto insurance in cities is that premiums are too high. However, the fundamental reason that premiums are higher in cities is that the costs to provide insurance are also higher. A review of the empirical research on the subject of urban auto

<sup>20</sup> Fault would no longer matter with respect to injury compensation only. State-based rate regulations would continue to penalize negligent drivers with higher premiums.

<sup>&</sup>lt;sup>19</sup> See sources indicated in *infra* note 122.

<sup>&</sup>lt;sup>21</sup> Under the current tort system, the limit on pain and suffering recovery is often set by the negligent driver's insurance policy, or set at zero in the case of uninsured drivers.

<sup>&</sup>lt;sup>22</sup> The version of Auto Choice examined here requires PPI drivers to also purchase supplementary liability insurance to provide additional coverage for certain situations, such as injuries to pedestrians and excess economic losses.

<sup>&</sup>lt;sup>23</sup> Christine Todd Whitman, Governor of New Jersey, Testimony to the Joint Economic Committee, Congress of the United States, 3/19/97.

insurance reveals five factors that are primarily responsible for higher liability insurance costs in inner cities:<sup>24</sup>

- frequency of injury claims
- average injury cost per insured vehicle
- fraud and claims buildup
- transaction costs and litigation
- uninsured motorists

This section of the paper reviews some of the existing empirical research on these factors. Not all urban areas are alike. Some cities have greater problems than others do, even within the same state. Philadelphia, for example, has more serious problems with auto insurance than does Pittsburgh. Similarly, Los Angeles is worse off than San Diego. There are also important territorial distinctions to keep in mind. For instance, one report may compare a city with the rest of the state, whereas another study will compare a city to the surrounding suburbs. Additionally, results may differ from study to study depending on the cities included, the time period examined, or the data used in the analysis.

#### Claiming Frequency, Injury Severity and Loss Costs

The underlying cause of higher insurance costs in urban areas is the higher frequency of injury claims per accident. Even though car crashes in urban areas are generally less severe (because they occur at a lower rate of speed), accidents in urban areas are more likely to result in an injury claim being filed with an insurance company. As a result, the average loss per insured vehicle (or average loss cost) is also higher.

To illustrate the magnitude of such differences in claiming behavior, Table 1 presents data for 10 cities and states on the number of bodily injury claims per 100 accidents (measured here as the number of property damage claims). In the state of California (excluding Los Angeles), there are close to 45 claims of bodily injury for every 100 accidents. In Los Angeles, the claimed injury rate is more than double the rest of the state: for every 100 property damage claims, there are approximately 99 bodily injury claims. In Philadelphia, the claimed injury rate is three and one-half times the average for the rest of the state – more than 78 injury claims per 100 accidents.

<sup>&</sup>lt;sup>24</sup> Property damage and auto thefts are also much higher in cities but are not considered here because they would not be affected by the Auto Choice reform.

	<b>Bodily Injury Claims per 100 Property Damage Claims</b>						
City and State	City	Rest of State	Ratio				
Los Angeles, CA	98.8	44.5	2.22				
Newark, NJ	79.6	32.8	2.42				
Philadelphia, PA	78.5	22.4	3.50				
Baltimore, MD	62.1	36.6	1.69				
Charlotte, NC	58.1	41.8	1.39				
Milwaukee, WI	43.9	29.4	1.49				
Cleveland, OH	40.8	28.5	1.43				
Memphis, TN	35.7	25.3	1.41				
Miami, FL	29.4	18.2	1.62				
New York, NY	27.6	10.3	2.67				

Table 1. Number of Bodily Injury Claims per 100 Property Damage Claims

Source: Joint Economic Committee calculations and Insurance Research Council, *Trends in Auto Injury Claims*.

Because each city listed in Table 1 and Table 2 is unique in terms of its state's legal and insurance system, population and vehicle density, overall crime rates, and geographic size, it is sometimes difficult to estimate precise relationships that hold for all cities. Nonetheless, a review of the empirical research reveals a consistent pattern: claiming frequency and insurance costs are higher in cities than they are in other parts of the same state, even though injury severity tends to be the same or lower.<sup>25</sup>

#### Survey of 49 Cities

To supplement and build on the existing research, this paper examined insurance data for 49 cities in the United States. The results of this analysis, presented in Table 2, confirm the findings of earlier research. Figures for each city represent the percentage difference between the city territory and the rest of the state for that indicator. The two primary types of coverage considered here are bodily injury (BI) liability and personal injury protection (PIP) policies. Figures were calculated based on territorial definitions and 1989-1991 claims data published by the Insurance Research Council (IRC). <sup>27</sup>

<sup>&</sup>lt;sup>25</sup> See sources listed at *infra* notes 35, 59, 104, and Highway Loss Data Institute, *Atlas of Automobile Injury and Collision Losses In Large Metropolitan Areas* (Arlington, VA: Highway Loss Data Institute, 1995).

According to data from the National Association of Independent Insurers, these two coverages accounted for 80 percent of all personal injury auto insurance payments in 1994.
 Insurance Research Council, *Trends in Auto Injury Claims*, 2<sup>nd</sup> ed. (Wheaton, IL: Insurance Research Council,

Insurance Research Council, *Trends in Auto Injury Claims*, 2<sup>nd</sup> ed. (Wheaton, IL: Insurance Research Council, 1995), Appendix B; and unpublished data from the Insurance Research Council. Criteria for city selection include 1992 population of at least 50,000; a population density of at least 1,000 persons per square mile; and an IRC territorial definition that approximates the city being compared. Territorial definitions do not always match official city limits. For example, figures for Birmingham are actually for Jefferson County.

Table 2. Differences in Claiming Behavior between Cities and the Rest of the State

			Bodily 1	Injury (BI)	Personal Injury Protection (PIP)			
State	City	Frequency	Severity	Average Loss Cost	BI-to-PD Ratio	Frequency	Severity	Average Loss Cost
AL	Birmingham	+10%	0%	+9%	-6%	1 .		
ΑZ	Phoenix	+34%	-8%	+24%	+15%			
AR	Little Rock	+55%	-7%	+44%	+16%			
CA	Los Angeles	+144%	-22%	+90%	+122%			
CO	Denver	+35%	-13%	+19%	+9%	+31%	+3%	+35%
CT	Hartford	+161%	-28%	+88%	+23%	+171%	-7%	+151%
DE	Wilmington	+59%	-11%	+41%	+12%	+74%	-10%	+56%
DC	DC Suburbs	+39%	+6%	+47%	+22%			
FL	Miami	+83%	-32%	+24%	+62%	+2%	+25%	+27%
GA	Atlanta	+52%	-14%	+31%	+21%	+47%	+10%	+61%
HI	Honolulu	+61%	-29%	+16%	+17%	+31%	-24%	-1%
ID	Boise	+21%	-11%	+8%	+4%			
IL	Chicago	+53%	-20%	+23%	+32%			
IN	Indianapolis	+32%	-3%	+27%	+13%			
IA	Des Moines	+51%	-2%	+49%	+9%			
KS	Wichita	+10%	-4%	+6%	-14%	+18%	-3%	+15%
KY	Louisville	+20%	-8%	+10%	-5%	+9%	-6%	+2%
LA	New Orleans	+49%	+4%	+55%	+34%			
ME	Portland	+29%	-8%	+18%	-2%			
MD	Baltimore	+121%	-6%	+106%	+69%	+140%	+14%	+173%
MA	Boston	+93%	+10%	+112%	+28%	+97%	+16%	+129%
MI	Detroit	+27%	-18%	+6%	NA	+23%	-45%	-33%
MN	Minneapolis	+63%	-3%	+59%	+27%	+24%	+15%	+43%
MS	Jackson	-9%	-16%	-24%	-13%			
MO	Kansas City	+34%	-16%	+13%	+15%			
MT	Billings	+85%	-13%	+62%	+21%			
NE	Omaha	+100%	-21%	+58%	+36%			
NV	Las Vegas	+47%	+7%	+57%	+19%			
NH	Manchester	+50%	0%	+49%	+7%			
NJ	Newark	+244%	-18%	+182%	+142%	+119%	+13%	+148%
NM	Albuquerque	+43%	-3%	+39%	+14%			
NY	New York City	+234%	-29%	+140%	+167%	+37%	+36%	+86%
NC	Charlotte	+111%	-18%	+ <b>74%</b>	+39%			
ND	Fargo	+51%	+15%	+72%	-1%	+52%	+3%	+56%
OH	Cleveland	+40%	+4%	+46%	+43%			
OK	Tulsa	+34%	+10%	+47%	+2%			
OR	Portland	+53%	-4%	+46%	+14%	+68%	-19%	+37%
PA	Philadelphia	+226%	-13%	+184%	+250%			
RI	Providence	+48%	-13%	+28%	+33%			
SC	Charleston	+50%	-7%	+40%	+1%			
SD	Sioux Falls	+73%	-25%	+30%	+19%			
TN	Memphis	+66%	-25%	+24%	+41%			
TX	Houston	+42%	+3%	+46%	+21%	+41%	+14%	+60%

		Bodily Injury (BI)				Personal Injury Protection (PIP)		
State	City	Frequency	Severity	Average Loss Cost	BI-to-PD Ratio	Frequency	Severity	Average Loss Cost
UT	Salt Lake City	+40%	-2%	+36%	+11%	+30%	+2%	+33%
VA	Norfolk & Area	+47%	-17%	+23%	+23%			
WA	Seattle	+18%	+8%	+28%	-10%	-3%	+17%	+13%
WV	Charleston	+3%	-6%	-3%	-8%			
WI	Milwaukee	+95%	-16%	+64%	+49%			
Average	All states	+65%	-9%	+47%	+31%	+53%	+3%	+57%
	Tort states	+57%	-8%	+43%	+28%			
	No-fault states							
	Strict Verbal					+20%	+5%	+27%
	Dollar/Weak	Verbal				+57%	+2%	+61%

Table 2. Differences in Claiming Behavior between Cities and the Rest of the State, cont.

Source: Joint Economic Committee calculations and Insurance Research Council, Trends in Auto Injury Claims.

This analysis examines three types of insurance systems: traditional tort, no-fault with a dollar or weak verbal threshold, and no-fault with a strict verbal threshold. Under traditional tort systems, there are no restrictions on the right to sue, and accident victims recover damages primarily from the negligent driver's liability policy. No-fault systems with a dollar or weak verbal threshold allow lawsuits only when a certain amount of medical bills have accumulated (dollar threshold) or when the injuries meet broad descriptive criteria (weak verbal threshold). Drivers in no-fault states with a strict verbal threshold can bring a lawsuit only in cases where the injuries meet specific descriptive criteria (strict verbal threshold). Averages for the primary coverage (BI in tort states and PIP in no-fault states) in each system are presented at the end of Table 2.

For the 49 cities examined here, the average BI claim frequency was 65 percent higher than the rest of the state. The pattern for PIP claims was similar, with cities averaging 53 percent more claims per 100 insured cars. Unadjusted BI claiming rates, however, are not perfect indicators of claiming behavior, since urban areas tend to have more accidents. As noted in Table 1 above, an alternative measure of claiming rates is the ratio of BI claims to property damage (PD) claims (called the BI-to-PD ratio), in which the number of PD claims serves as a proxy for the number of accidents. As might be expected, when the different accident rate is accounted for, the discrepancy in claiming frequency between cities and other areas is reduced. Nonetheless, the difference in BI claiming frequencies is startlingly higher – 31 percent higher on average (see the bottom of column 4 in Table 2).

<sup>28</sup> In this analysis, tort states include both traditional tort states and "add-on" tort states. First-party health insurance coverage for auto injuries is available through medical payments (MP) policies in traditional tort states and through personal injury protection (PIP) policies in "add-on" tort states.

<sup>29</sup> Although Florida is listed here as having a strict verbal threshold, its descriptive criteria are considerably broader

Although Florida is listed here as having a strict verbal threshold, its descriptive criteria are considerably broader than those in Michigan and New York. Even in Michigan, which has the strictest verbal threshold in the country, increasing numbers of cases are being judged eligible for litigation.

Although injury claims are more frequent in cities, the injuries caused by auto accidents tend to be less severe. The fatality rate for accidents on urban roads is less than half that for rural roads. Even among crashes with at least one fatality, urban accidents are generally less severe, with 42 percent of survivors reporting no injury compared to 28 percent for rural accidents. Conversely, 25 percent of survivors of fatal accidents in urban areas suffer an incapacitating injury, versus 37 percent for rural accidents. Reflecting these facts, the average BI claim in cities was 9 percent smaller than elsewhere in the same state, while PIP claims were just 3 percent larger. PIP claims were just 3 percent larger.

The final point of comparison, average loss cost, is perhaps the most important in determining the actual premium charged by insurance companies. Average loss cost is simply the total amount of injury payments made by insurers divided by the number of insured cars. It is, in other words, each policyholder's share of the direct cost of paying injury claims, not counting expenses such as administrative, personnel, or legal defense costs. The average loss cost, or pure premium, is the base from which total premiums are determined.<sup>33</sup> Any effort to reduce premiums must, ultimately, reduce average loss costs. As with claiming rates, the data in Table 2 indicate that loss costs in cities are substantially higher than elsewhere in the state. The average cost per insured driver to pay bodily injury claims is 47 percent higher in cities compared to other parts of the state. For PIP claims, the figure is 57 percent.

It is worth noting, however, that for the three states with strict verbal thresholds (Florida, Michigan and New York), the city-suburb disparity in average PIP loss costs is just 27 percent, less than one-half the 61 percent average for the other no-fault states.<sup>34</sup> Michigan, with the toughest verbal threshold in the country, is the only no-fault state where the average loss cost of PIP claims is significantly lower in the city than elsewhere. Since average loss cost represents the base used to determine overall premiums, these figures can be interpreted as a rough measure of the differences in BI and PIP premiums paid by residents of the different territories.<sup>35</sup>

One remarkable observation that comes from the data in Table 2 is that auto insurance problems are not just limited to major metropolises like Philadelphia and Los Angeles. Even cities such as Billings, Montana, and Charlotte, North Carolina, have average loss costs that

<sup>&</sup>lt;sup>30</sup> These data also indicate that there is only a negligible difference in the number of people injured or killed per accident. U.S. Department of Transportation, Federal Highway Administration, *Highway Statistics 1995* (Washington, DC: Government Printing Office, 1996), V-104.

<sup>&</sup>lt;sup>31</sup> U.S. Department of Transportation, National Highway Traffic Safety Administration, *Rural and Urban Crashes: A Comparative Analysis*, DOT HS 808-450 (Washington, DC: National Highway Traffic Safety Administration, 1996), 75.

<sup>&</sup>lt;sup>32</sup> Injury severity is measured here as the size of the injury claim. Claim size, however, is an imperfect measure of the actual damage because the size of the claim is often a function of tort incentives presented to the claimant. See *supra* notes 11, 12, and 13, and accompanying text.

<sup>&</sup>lt;sup>33</sup> See S.S. Huebner, Kenneth Black, Jr., and Bernard L. Webb, *Property and Liability Insurance*, 4<sup>th</sup> ed. (Upper Saddle River, NJ: Prentice Hall, 1996), 623-628.

<sup>&</sup>lt;sup>34</sup> For further discussion, see text accompanying *infra* note 133.

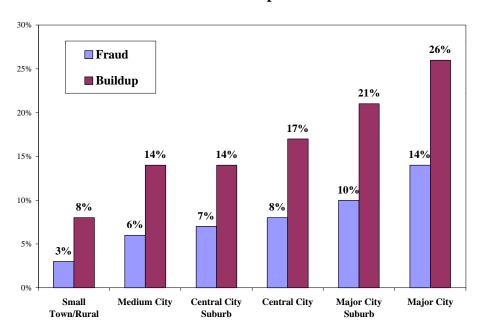
<sup>&</sup>lt;sup>35</sup> This interpretation assumes that the markup from pure premium is uniform within a state. Although this generally appears to be the case (as indicated in Lamberty), the correlation between loss costs and premiums is weakened to the degree that state insurance regulations limit the use of location as a determinant of premiums. Steve Lamberty, "Urban and Non-Urban Auto Insurance Comparisons," *NAIC Research Quarterly* 1, no. 4 (October 1995): 17.

exceed 60 percent of the average for the rest of the state. Bigger cities, in other words, are frequently the most expensive areas for insurance, even within otherwise "low cost" states. These figures underscore the importance of auto insurance reform for all urban centers.

#### Fraud and Claims Buildup

Another factor that increases the cost of auto insurance in cities is fraud and other abuse of the insurance system. The available data indicate that fraud and abuse are more common in large urban areas. The insurance system suffers from two types of abuse. The first type involves explicit fraud, including staged accidents, orchestrated visits to doctors' offices, and organized

Figure 4. Claims with a High Degree of Suspicion of Fraud or Buildup



Source: Insurance Research Council, Fraud and Buildup.

crime. The second type includes opportunistic claims buildup that results when individuals inflate their insurance claims for injuries that either are not real, are less severe than claimed, or are not even related to the auto accident in question.

The most comprehensive study of fraud by accident location is the 1996 report *Fraud and Buildup in Auto Injury Claims* by the Insurance Research Council (IRC).<sup>36</sup> The report examined over 15,000 actual insurance claims from 1992, each of which had notes from claims adjusters identifying elements that suggested the presence of fraud and buildup. The IRC study included data for nine major cities (population of at least one million) and their surrounding suburbs, as well as other large central cities (population 100,000 to one million) and their suburbs, medium cities, and small town/rural cities. Figure 4 presents the percent of cases in each location where there was a high degree of suspicion of fraud and buildup. A similar pattern is evident for both types of abuse: the greater the degree of urbanization, the more likely an injury claim will be fraudulent or include buildup. In major cities, for example, 14 percent of claims had a high

<sup>&</sup>lt;sup>36</sup> Insurance Research Council, *Fraud and Buildup in Auto Injury Claims* (Wheaton, IL: Insurance Research Council, 1996).

degree of suspicion of fraud, and 26 percent had a high degree of suspicion of buildup. Rates for all other areas were progressively lower.

100% 100% Non-Sprain/Strain Only 90% 90% 80% 80% Sprain or Strain Plus 70% 70% Non-Sprain/Strain 60% 60% 50% 50% 40% 40% 30% 30% **Sprain or Strain Only** 20% 20% 10% 10% 0% **Small Town Central City** Rural **Medium City** Suburbs

Figure 5. Types of Bodily Injury Claims by City Size

Source: Insurance Research Council, Claiming Behavior.

A more indirect indicator of fraud and buildup is the frequency of soft tissue injuries. Soft tissue injuries, such as sprains or strains, are real injuries, but because there is no way to medically verify their existence, they make ideal candidates for fraud and buildup. Figure 5 presents data on the distribution of injury types by accident location. In rural accidents. 40 percent of injury claims involve only sprains or strains.

By comparison, nearly two-thirds (64 percent) of injury claims in central cities are non-verifiable.<sup>37</sup>

As noted above, the different forms of fraud and other abuse vary widely, ranging from opportunistic claims buildup committed by individuals to multi-million dollar fraud rings orchestrated by organized crime. Organized fraud and criminal rings are more common in inner cities. Dense urban centers generally have all the elements necessary for such crime rings to prosper: frequent accidents that can result in easily-faked injuries; an abundance of professionals capable of taking advantage of the system; and a supply of often needy, low-income individuals who may be enticed into breaking the law.

One common type of fraud is "ghost riders," individuals who file insurance claims for accidents that either did not happen or did not involve them. In a 1993 New Jersey investigation of ghost riders, police staged a low-speed accident with a city bus, and 17 people climbed onto the bus *after* the accident and later filed insurance claims for their "injuries." In a separate case, a bus driver witnessed an accident between two other vehicles and stopped to see if anyone

<sup>&</sup>lt;sup>37</sup> Insurance Research Council, *Auto Injuries: Claiming Behavior and Its Impact on Insurance Costs* (Oak Brook, IL: Insurance Research Council, 1994), 20.

<sup>&</sup>lt;sup>38</sup> The New York Times, 8/18/93.

needed help. Having heard the sound of a crash and seeing the bus driver get off the bus, 27 of the bus passengers assumed that their bus had crashed and filed insurance claims.<sup>39</sup>

Another type of abuse comes in the form of schemes that coordinate staged accidents, visits to doctors' offices, legal representation, and insurance claims. For example, a Boston chiropractor who was convicted of insurance fraud required that all patients to his clinics make at least 25 visits and receive at least \$2,000 worth of medical treatments. Another common technique is for fraud rings to utilize "runners" who use radio scanners to arrive at accident scenes ahead of police or emergency personnel, and then encourage individuals to file claims for non-existent injuries. Other schemes involve lawyers and doctors who work in conjunction with each other to inflate the size of bills charged to the insurance company. It is not uncommon for organized crime be involved. Federal law enforcement agents recently disrupted such a ring run by the Russian Mafia in Louisiana, Texas, Florida, Oregon, and California. Another ring based in Pittsburgh has also been linked to Russian organized crime.

Organized fraud rings frequently file claims based on staged accidents. In such cases, two or more cars are loaded up with passengers and then "accidentally" collide. Participants are then paid a fixed amount, such as \$50 or \$100 per accident, to file false injury claims. Innocent drivers are frequently unwitting participants. A common technique is the "swoop and squat," where one car pulls in front of a truck or other vehicle that appears well insured. A second car then "swoops" in front the first car and slams on the breaks, giving the first car a plausible excuse to do likewise, thus causing the unknowing driver to collide into the schemer from behind.

Investigators often note that ethnic groups are targeted to serve as "stuffers," the persons who ride in the cars and cause the accidents. In southern California and Texas, for instance, low-income Hispanic immigrants are routinely used as the "victims" in staged accidents. Other staged-accident rings have involved African-American, Filipino, Armenian and Korean groups in Los Angeles; Vietnamese in Orange County, California; Russian-Jews and Eastern Europeans in Pittsburgh and New York; and Haitians and Jamaicans in Florida. Although the injuries that stuffers are instructed to claim are supposed to be fake, staged accidents have resulted in death or serious injury to stuffers and innocent drivers alike. Ironically, these low-income stuffers are paid as little as \$50 or \$100 to risk their lives, even as the lawyers and doctors involved can bring in tens of thousands of dollars per accident.

<sup>40</sup> *The Boston Globe*, 4/19/95. Not coincidentally, Massachusetts's law requires that injury claimants have at least \$2,000 in medical bills before they can sue for pain and suffering.

<sup>&</sup>lt;sup>39</sup> Ibid.

<sup>&</sup>lt;sup>41</sup> *U.P.I.*, 8/1/97.

<sup>&</sup>lt;sup>42</sup> The Pittsburgh Post-Gazette, 1/4/97.

<sup>&</sup>lt;sup>43</sup> The San Francisco Chronicle, 10/31/93; The Los Angeles Times, 7/13/92; and The Pittsburgh Post-Gazette, 3/12/97.

<sup>&</sup>lt;sup>44</sup> The Los Angeles Times, 7/13/92.

<sup>&</sup>lt;sup>45</sup> For a comprehensive account of the long history of abuses by claimants and organized fraud rings, see Ken Dornstein, *Accidentally, on Purpose: The Making of a Personal Injury Underworld in America* (New York, NY: St. Martin's Press, 1996).

The problems of fraud and abuse of the insurance system are of real concern to low-income, inner-city residents. Indeed, such persons suffer from both ends of the system. Not only do they have to pay high premiums because they live in high-cost territories, but they also are targets of organized crime rings that try to lure them into staged accident schemes. As Sean Mooney of the Insurance Information Institute put it:

Residents of inner cities suffer from a number of social ills – low income, poor education, and reduced employment opportunities. In addition, inner-city residents are prey to drug dealers, thieves, and other criminals. It is now increasingly apparent that inner-city residents are also the prey of a newer parasite - the profiteers of hard-core insurance fraud. These profiteers recruit inner-city residents as their pawns in multi-million dollar insurance fraud rings. To some extent insurance companies pay for these claims out of profits. But the real victims are the inner city residents themselves who pay for the costs of insurance fraud and abuse through higher insurance premiums.<sup>46</sup>

Another detrimental consequence of greater fraud in inner cities is the potential for slower payment for real injuries. Fraud prevention efforts necessarily require that insurance companies investigate injury claims that appear to have elements of fraud or buildup before the claims are paid. Since inner-city injury claims are more likely to exhibit signs of fraud or buildup, payments to claimants for legitimate injuries can be delayed while insurance companies investigate suspicious cases.

The magnitude of the organized fraud schemes is often quite large. A fraud ring in southcentral Los Angeles, for example, bilked insurers out of more than \$20 million in medical and legal bills. 47 In Passaic County, New Jersey, hundreds of individuals have been charged with manufacturing over \$75 million in bogus claims.<sup>48</sup> A chain of clinics run by two chiropractors in northern New Jersey has been charged with filing \$52 million in bogus insurance claims.<sup>49</sup>

Consumers ultimately bear the cost of fraud and claims buildup through higher premiums. According to FBI Director Louis Freeh, "Every American household is burdened with over \$200 annually in additional premiums to make up for this type of [insurance] fraud."<sup>50</sup> As previously noted, research by the RAND Institute for Civil Justice indicates that between 35 and 42 percent of injury claims occur as a result of the incentives of the tort system, totaling between \$13 and \$18 billion in higher premiums in 1993.<sup>51</sup>

<sup>50</sup> U.S. Department of Justice, Federal Bureau of Investigation, Press Release (Washington, DC: Federal Bureau of Investigation, 5/24/95).

<sup>&</sup>lt;sup>46</sup> Sean F. Mooney, "The Cost of Urban Auto Insurance" (New York, NY: Insurance Information Institute, 1992), 22.

47 California Department of Insurance, Fraud Division, *The Investigator* (Spring 1996).

<sup>&</sup>lt;sup>48</sup> Business Week, 6/30/97; and The (Bergen, N.J.) Record, 6/11/97.

<sup>&</sup>lt;sup>49</sup> *The New York Times*, 4/22/97.

<sup>&</sup>lt;sup>51</sup> Carroll, Abrahamse, and Vaiana, 23.

#### **Transaction Costs and Litigation**

As in any industry, consumers suffer when transaction costs are too high. In the case of auto insurance, one of the biggest transaction costs is legal expenses. Clearly, lawyers play an important and necessary role in obtaining compensation for injured drivers in today's system. However, in many cases pain and suffering damages are awarded not to compensate the injured victims, but to pay for legal costs. According to Wolfram, "inflated elements of general damages, such as pain and suffering, are tolerated by courts as a rough measure of the plaintiff's attorney fees."52

Quite simply, attorney services are expensive, and consequently, high lawyer involvement can increase the cost of providing auto insurance. For personal injury lawsuits, the plaintiff's attorney generally takes 33 to 40 percent of the final award, regardless of how much time and effort are required to win the case. According to one study, attorney representation is associated with a 64 percent increase in the size of the insurance claim, even after controlling for environmental variables and injury type.<sup>53</sup> Defense attorneys are also highly paid (though on an hourly basis) and often seek to drag cases out as long as possible, hoping to force the plaintiff to accept a smaller award as well as to increase their own fees.

Table 3. Attorney Representation for BI and PIP Claims in Selected Cities

	BI Claims			_	PIP Claims			
_	City	Suburb	Ratio	·	City	Suburb	Ratio	
Baltimore	89%	78%	1.14		80%	68%	1.18	
Los Angeles	92%	78%	1.18		NA	NA	NA	
Houston	72%	49%	1.47		52%	42%	1.24	
Washington, D.C.	76%	63%	1.21		56%	50%	1.12	
San Francisco	70%	55%	1.27		NA	NA	NA	
Chicago	61%	47%	1.30		NA	NA	NA	
Dallas/Ft. Worth	53%	48%	1.10		47%	27%	1.74	
Seattle	51%	39%	1.31		23%	29%	0.79	
Phoenix	50%	38%	1.32		NA	NA	NA	
Philadelphia	NA	NA	NA		77%	56%	1.38	
New York	NA	NA	NA		64%	40%	1.60	
Detroit	NA	NA	NA		36%	16%	2.25	
Average	68%	55%	1.24		54%	41%	1.33	

Source: Insurance Research Council, Claiming Behavior.

The available data indicate that attorney involvement is significantly higher in large cities relative to suburbs (Table 3). In both Baltimore and Los Angeles, approximately nine out of every 10 bodily injury claimants hired an attorney in 1992.<sup>54</sup> While attorney representation in

<sup>53</sup> Mark J. Browne and Robert Puelz, "Statutory Rules, Attorney Involvement, and Automobile Liability Claims," Journal of Risk and Insurance 63, no. 1 (March 1996): 79. <sup>54</sup> Insurance Research Council, Claiming Behavior, 48.

<sup>&</sup>lt;sup>52</sup> Wolfram, 528 at note 21.

the suburbs of these cities was still high (78 percent), it was nonetheless significantly lower than the rate in the central city. The city-suburb differential was even greater in other cities. The attorney representation rate for PIP claimants in New York City, for example, was 60 percent higher than in the suburbs, and PIP claimants in Dallas/Ft. Worth were 74 percent more likely to hire an attorney than claimants in the suburbs. The average rate of attorney representation in these selected cities relative to their suburbs was 24 percent higher for BI claimants and 33 percent higher for PIP claimants.

If the tort liability system were successful at compensating individuals, then the higher cost might be worth paying. The available data, however, suggest that having an attorney does not improve the speed of compensation for injured victims. For example, among small bodily injury claims (\$500 or less), just 9 percent of claimants with an attorney received their final payment from the insurance company within 30 days, compared to 63 percent for non-represented claimants. For more serious injuries (over \$2,500), three times as many attorney-represented claimants (45 percent) had to wait over a year for final payment compared to non-represented claimants (15 percent).<sup>55</sup>

Moreover, as previously indicated, the system performs badly with respect to the amount of compensation. A 1991 study by the RAND Institute for Civil Justice found that accident victims with less than \$5,000 in economic losses receive compensation that is on average worth two to three times the amount of their losses. The seriously injured, such as those with permanent or total disability, do not fare nearly as well. Such victims are often denied full recovery for their economic losses, and what they do receive can be delayed for years. According to RAND, persons with economic losses of \$25,000 to \$100,000 are compensated for just over one-half (56 percent) of their losses on average. The very seriously injured (economic losses over \$100,000) receive compensation worth just 9 percent of their damages.

#### **Uninsured Drivers**

A major problem that contributes to higher premiums in urban areas is the number of uninsured motorists. All states require drivers to carry a minimum amount of liability insurance or to meet certain financial responsibility levels. Nonetheless, uninsured motorists are a widespread and costly problem in urban areas, where the concentration of low-income households places many families in the difficult position of choosing between purchasing basic necessities or complying with the law. As City Councilman Mark Ridley, who represents South Central Los Angeles, put it: "It's a function of putting food on the table versus paying for car insurance. It's really obvious what one does." 58

<sup>56</sup> Carroll, Kakalik, Pace, and Adams, 187.

<sup>&</sup>lt;sup>55</sup> *Ibid.*, 72.

<sup>&</sup>lt;sup>57</sup> In many cases, the seriously injured are undercompensated even though they receive maximum compensation from the applicable insurance policy. That amount, however, is often capped at the limits chosen by those who injure them.

<sup>&</sup>lt;sup>58</sup> The Los Angeles Times, 3/2/95.

The problem of uninsured motorists is particularly severe in inner cities. According to one survey of 17 large cities, the average rate of uninsured motorist (UM) claims (per 100 property damage claims) is over three times higher in cities than in other areas of the same states.<sup>59</sup> Other

insurance claims data also indicate that uninsured motorists are more frequent in central cities. As can be seen in Figure 6, 44 percent of all uninsured motorist claims resulted from accidents that took place in central cities, even though such accidents accounted for just 36 percent of all bodily injury (BI) claims.<sup>60</sup>

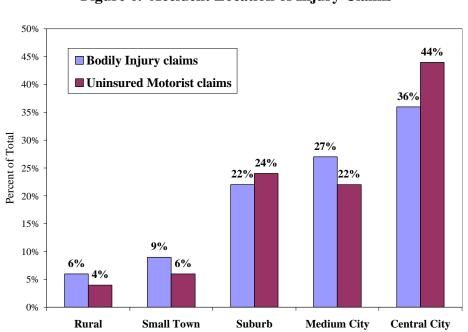


Figure 6. Accident Location of Injury Claims

Source: Insurance Research Council, Claiming Behavior.

The problem of uninsured motorists is well documented in California. A 1995 zip code level survey by the California Department of Insurance found that 28 percent of drivers in that state were uninsured, totaling roughly 5.8 million vehicles statewide. In Los Angeles County, the figure was 37 percent, and in San Francisco it was nearly 33 percent. Certain zip codes had exceptionally high-uninsured motorist rates. Some areas of Oakland and south central Los Angeles, for instance, had an uninsured motorist rate over 60 percent, while other zip codes in Los Angeles and San Diego had rates in excess of 90 percent.

The consequences of high rates of uninsured motorists are significant. The California study revealed that the state's insured drivers pay more than \$1 billion a year in added premiums to protect themselves from uninsured motorists. The overall premium effect of uninsured motorists, however, is significantly greater than just the cost of UM policies. As Eric Smith and Randall Wright explain in their 1992 *American Economic Review* article, "although the entire [insurance] package may be actuarially fair, the individual components are not." In other

<sup>&</sup>lt;sup>59</sup> Insurance Services Office, Inc. and National Association of Independent Insurers, "Factors Affecting Urban Auto Insurance Costs" (New York, NY: Insurance Services Office, Inc., 1988), 15.

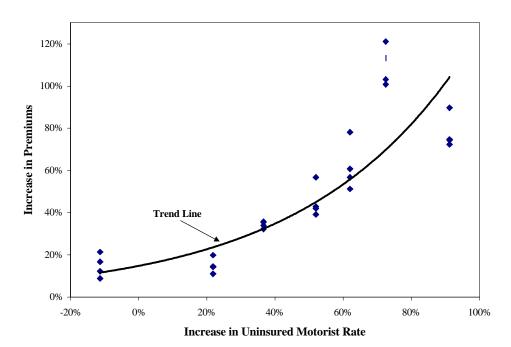
<sup>&</sup>lt;sup>60</sup> Insurance Research Council, Claiming Behavior, 14.

<sup>&</sup>lt;sup>61</sup> The Los Angeles Times, 3/2/95; The San Francisco Chronicle, 3/2/95; and The San Diego Union-Tribune, 3/3/95. <sup>62</sup> The San Francisco Chronicle, 3/2/95.

<sup>&</sup>lt;sup>63</sup> Eric Smith and Randall Wright, "Why Is Automobile Insurance in Philadelphia So Damn Expensive?" *American Economic Review* 82, no. 4 (September 1992): 759 at note 5.

words, insurance policies other than UM may end up paying for damages caused by uninsured motorists. For example, first-party health coverage through medical payments (MP) or personal insurance protection (PIP) policies may foot the bill for injuries caused by negligent uninsured drivers. Such costs are ultimately passed on to the consumer in the form of higher MP or PIP premiums. According to the California Department of Insurance, other non-UM premium costs caused by uninsured motorists create an additional \$1 billion burden to that state's consumers.

Figure 7. Correlation between Uninsured Motorists and Premiums



Source: Joint Economic Committee calculations and Smith and Wright data.

Unfortunately, the problem of uninsured motorists is one that feeds upon itself. Innercity drivers pay high insurance premiums because there are so many uninsured drivers. At the same time, however, the very reason there are so many uninsured drivers is that premiums are high. This correlation between uninsured motorists and premiums is apparent in research by Smith and

Wright, who present uninsured motorist data for seven cities and their surrounding suburbs, plus four sample premiums for each territory. When calculated as differentials between city and suburb, there are four points of comparison for each city, yielding a total of 28 data points (Figure 7). With these data, it is possible to compare the change in premiums with the change in uninsured motorists. As the trend line indicates, the greater the increase in uninsured motorists, the greater the increase in premiums. This pattern helps to confirm the contention that premium reductions would be effective in reducing the number of uninsured drivers.

<sup>&</sup>lt;sup>64</sup> The same principle holds for property damage as well.

<sup>65</sup> The Sacramento Bee, 3/19/95.

<sup>&</sup>lt;sup>66</sup> Smith and Wright, 757.

#### III. CONSEQUENCES OF HIGHER INSURANCE COSTS FOR URBAN AREAS

A number of adverse outcomes result from all of the problems that increase insurance costs in urban areas. First, by reducing the transportation options available to low-income workers, high urban premiums can reduce labor market efficiency and depress wages for low-skilled, inner-city residents. Second, there is the burden on taxpayers in the form of higher government expenses and lower tax receipts. Third, distrust towards the auto insurance system eventually can lead to a more generalized lack of respect for the law. Finally, large premium disparities arise between cities and suburbs. Such disparities underscore the higher cost of living in many cities and encourage middle-class families to move to the suburbs. Each of these outcomes is explored in greater detail below.

#### **Inner-City Jobs**

An important consequence of excessively high premiums for low-income urban residents is the lack of job access and job mobility. It is often noted that the "good" jobs are located in the suburbs of large cities. <sup>67</sup> In fact, there is evidence that suburban jobs pay more than inner-city jobs, even for the same type and skill level of work. For example, a 1989 survey of fast food restaurants in Atlanta found that the average entry-level wage was \$3.79 in restaurants closest to the city's center, compared to an average \$4.61 for restaurants farthest out, a 22 percent difference. <sup>68</sup> A related concern is the exodus of entry-level jobs from central cities, a trend evident in the finding of one study that by 1990 employment in suburban areas was actually greater than central-city employment in virtually all industrial sectors. In the manufacturing and retail trade sectors, which employ large numbers of low-skill workers, roughly 70 percent of jobs were located in suburban areas by 1990. <sup>69</sup>

A number of different explanations have been offered to explain this disparity, one of which is the spatial mismatch hypothesis. The central component of the spatial mismatch hypothesis is that there is a relative shortage of low-skill labor in suburbs, while inner cities have a surplus of such labor. Residents of suburbs tend to have greater amounts of education and training, and as a result there are fewer suburban residents to fill the demand for low-skill jobs. In order to attract workers to such positions, the market pushes up the average wage for such jobs. Inner cities, in contrast, face the opposite problem: there is a surplus of low-skill labor for local jobs, which exerts downward pressure on wages. Access to the better-paying suburban jobs is limited for inner-city residents because of their higher travel costs, which either make finding a job more difficult or discourage inner-city residents from seeking suburban employment altogether.

<sup>&</sup>lt;sup>67</sup> For example, see Jane Gross, "Poor Without Cars Find Trek to Work Is Now a Job," *New York Times*, 11/18/97; Lorraine Woellert, "D.C. Students 'Go Where the Money Is'; Turn to Suburbs for Summer Jobs," *The Washington Times*, 6/24/95; and William Julius Wilson, *When Work Disappears* (New York: Vintage Books, 1996), 39-42.
<sup>68</sup> Keith R. Ihlanfeldt and Madelyn V. Young, "The Spatial Distribution of Black Employment Between the Central City and the Suburbs," *Economic Inquiry* 34, no. 4 (October 1996): 693-707.

<sup>&</sup>lt;sup>69</sup> John D. Kasarda, "Industrial Restructuring and the Changing Location of Jobs," *in State of the Union: America in the 1990s. Volume I: Economic Trends*, ed. Reynolds Farley (New York, NY: Russell Sage Foundation, 1995), 235, 262.

This problem first became apparent in the aftermath of the 1965 Watts riots in Los Angeles. California Governor Edmund Brown appointed the McCone Commission to investigate the factors that led up to the outbreak of violence. The Commission identified inner-city employment as the "most serious immediate problem" and reported that transportation obstacles were an important element of the jobs problem:

Our investigation has brought into clear focus the fact that the inadequate and costly public transportation currently existing throughout the Los Angeles area seriously restricts the residents of the disadvantaged areas such as south central Los Angeles. This lack of adequate transportation handicaps them in seeking and holding jobs, attending schools, shopping, and in fulfilling other needs. It has had a major influence in creating a sense of isolation, with its resultant frustrations, among the residents of south central Los Angeles, particularly the Watts area.<sup>70</sup>

The first formal research on the subject was published by John Kain of Harvard University. In his widely-cited 1968 article, Kain identified the transportation problem faced by low-income and racial minorities who live in central cities.

Frequently ghetto Negroes may be forced to choose between buying a private automobile and thus spending a disproportionate share of their low incomes on transportation, making a very long and circuitous trip by public transit (if any service is available at all), or foregoing the job altogether. Where the job in question is a marginal one, their choice may frequently be the latter. More often, they will not even seek out the job in the first instance because of the difficulties of reaching it from possible residence locations.<sup>71</sup>

In the three decades since the spatial mismatch hypothesis was first articulated, a large amount of research has been produced on the subject. Many of the issues related to the spatial mismatch hypothesis are still hotly debated, particularly the role played by residential segregation. Nonetheless, a significant amount of research has been produced which identifies the practical consequences associated with higher travel costs for inner-city residents. For instance, Keith Ihlanfeldt found that limits to job accessibility significantly increase minority unemployment, accounting for upwards of one-quarter of the difference between Hispanic and white employment levels. Of particular relevance to this paper, Harry Holzer, Ihlanfeldt and

<sup>71</sup> John F. Kain, "Housing Segregation, Negro Employment, and Metropolitan Decentralization," *Quarterly Journal of Economics* 82, no. 2 (May 1968): 181.
<sup>72</sup> For a review of evidence supporting the spatial mismatch hypothesis, see John F. Kain, "The Spatial Mismatch

<sup>&</sup>lt;sup>70</sup> State of California, Governor's Commission on the Los Angeles Riots, *Violence in the City – An End or a Beginning?* (Los Angeles, CA: State of California, 1965), 65.

<sup>&</sup>lt;sup>72</sup> For a review of evidence supporting the spatial mismatch hypothesis, see John F. Kain, "The Spatial Mismatch Hypothesis: Three Decades Later," *Housing Policy Debate* 3, no. 2 (1992): 371-460. For an opposing view see Brian D. Taylor and Paul M. Ong, "Spatial Mismatch or Automobile Mismatch? An Examination of Race, Residence and Commuting in US Metropolitan Areas," *Urban Studies* 32, no. 9 (1995): 1453-1473, who argue that employment obstacles faced by low-skill, urban minorities are attributable not to a spatial mismatch, but to an "automobile mismatch," where the lack of access to automobiles forces them to rely on inadequate public transit.

<sup>73</sup> Keith R. Ihlanfeldt, "Intra-Urban Job Accessibility and Hispanic Youth Employment Rates," *Journal of Urban Economics* 33, no. 2 (March 1993): 254. Similar findings were reported by Katherine M. O'Regan and John M.

David Sjoquist found that car ownership is associated with 12 percent higher wages for blacks, as well as shorter spells of unemployment for blacks.<sup>74</sup>

Research by John Kasarda and Kwok-fai Ting further suggests that public transportation remedies are not only inadequate, but that problems of job access have a disparate impact on inner-city women with little education:

The deconcentration of metropolitan jobs, together with restricted transport choice, differentially impacts the least mobile – that is, less-educated inner-city women. These women are most likely to (1) depend entirely on public transportation, (2) travel close to home, (3) seek only jobs with short commute times, (4) avoid work that requires traveling through nearby dangerous areas (especially after dark), and (5) need to balance multiple domestic responsibilities with work schedules. As a result, job options for these women tend to be much more restricted spatially and temporally, often limiting them to low-paying and part-time work closer to home. These constraints no doubt pose strong work disincentives.<sup>75</sup>

The transportation obstacles associated with locating and holding down a job are a critical component of welfare reform. <sup>76</sup> The importance of owning a car for recipients of Aid to

Families with Dependent Children (AFDC) was the subject of a 1996 article in Social Work Research.<sup>77</sup> Even after controlling for other factors like education and race, author Paul Ong found that automobile ownership granted significant benefits to welfare recipients in the form of higher rates of employment, more hours worked, and higher monthly earnings. On average, welfare recipients who owned an

Table 4. Effect of Automobile Ownership on **Welfare Recipients** 

Work characteristic	Automobile Advantage
Worked at all	+12%
Average hours worked	+23
Average monthly earnings	+\$152

Source: Ong.

automobile were 12 percent more likely to work at all, worked an additional 23 hours per month, and brought home an additional \$152 per month (Table 4).

These findings are consistent with a survey of local welfare administrators by the U.S. General Accounting Office that found that lack of transportation was a significant obstacle to

Quigley, "Teenage Employment and the Spatial Isolation of Minority and Poverty Households - Comment,"

*Journal of Human Resources* 31, no. 3 (Summer 1996): 692-702. <sup>74</sup> Harry J. Holzer, Keith R. Ihlanfeldt, and David L. Sjoquist, "Work, Search, and Travel among White and Black Youth," Journal of Urban Economics 35, no. 3 (May 1994): 340

<sup>&</sup>lt;sup>75</sup> John D. Kasarda and Kwok-fai Ting, "Joblessness and Poverty in America's Central Cities: Causes and Policy Prescriptions," Housing Policy Debate 7, no. 2 (1996): 412.

<sup>&</sup>lt;sup>76</sup> See Jane Gross, "Poor Without Cars Find Trek to Work Is Now a Job," *New York Times*, 11/18/97; and Carl F. Horowitz, "Off the Dole and Into Autos," Investor's Business Daily, 1/13/98.

<sup>&</sup>lt;sup>77</sup> Paul M. Ong, "Work and Automobile Ownership among Welfare Recipients," *Social Work Research* 20, no. 4 (December 1996): 255-262.

moving individuals off welfare even when they were prepared to work. Seventy-five percent of welfare administrators felt that lack of transportation was either a "major reason" (44 percent) or a "moderate reason" (31 percent) why welfare recipients failed to become employed. In fact, the survey results suggest that lack of transportation is a greater problem than lack of jobs, since just 26 percent cited "no jobs are available" as a "major reason" for failure to become employed. In addition, having access to a car can help welfare recipients to obtain better-paying, yet more distant jobs that will help keep them off public assistance. In Wisconsin, for instance, a preliminary analysis of that state's W-2 welfare reform plan found that there was a strong positive correlation between hourly wages and distance traveled to work.

#### **Fiscal Impact on State and Local Governments**

The problems associated with the auto insurance system impose a significant burden on state and local governments, diverting scarce taxpayer dollars from other priorities. In 1995, state, county and municipal governments owned and operated more than 3.3 million vehicles, most of which were trucks and buses. The burden on taxpayers comes not only from the direct insurance and legal costs of maintaining such a large fleet, but also from such indirect costs as an eroding tax base and excess consumption of health care by public-aid recipients. Moreover, since local governments depend on state governments for roughly 30 percent of their revenue, the fiscal burden placed on states has important indirect consequences as well. But the significant burden on state governments for roughly 30 percent of their revenue, the fiscal burden placed on states has important indirect consequences as well.

#### Lawsuits against Cities

For some cities, the rising number of lawsuits brought against government agencies is a major problem. Automobile tort cases make up the single most common type of tort litigation brought against government, accounting for 44 percent of all tort cases where the government is the primary defendant. One factor is the perception that the government has "deep pockets" and can afford a large settlement. This explanation is corroborated by the fact that a government agency is more likely to be hit with a large damage award than are other defendants. According to a survey of auto injury tort cases conducted by the U.S. Department of Justice, the government was the defendant in close to one-third (29 percent) of all jury verdicts in excess of \$1 million, even though they represented less than 8 percent of all such jury verdicts.

<sup>78</sup> U.S. General Accounting Office, *Welfare to Work: Most AFDC Training Programs Not Emphasizing Job Placement*, HEHS-95-113 (Washington, DC: General Accounting Office, 1995), 84.

<sup>&</sup>lt;sup>79</sup> John Pawasarat, "Initial Findings on Mobility and Employment of Public Assistance Recipients in Milwaukee County and Factors Relating to Changes in W-2 Regions Over Time," University of Wisconsin – Milwaukee, Employment and Training Institute (1997), online at http://www.uwm.edu/dept/eti/afdcmobl.htm.

<sup>&</sup>lt;sup>80</sup> U.S. Department of Transportation, *Highway Statistics* 1995, II-4.

<sup>&</sup>lt;sup>81</sup> U.S. Bureau of the Census, *Government Finances: 1991-92*, Series GF/92-5 (Washington, DC: Government Printing Office, 1996), 2.

<sup>&</sup>lt;sup>82</sup> Analysis based on data from U.S. Department of Justice, Bureau of Justice Statistics, "Civil Justice Survey of State Courts, 1992," available online at the University of Michigan's Inter-university Consortium for Political and Social Research, http://www.icpsr.umich.edu/index.html.

<sup>&</sup>lt;sup>83</sup> The term "government" refers to any government agency. These figures refer only to jury verdict tort cases in state general jurisdiction courts. U.S. Department of Justice, Bureau of Justice Statistics, *Civil Jury Cases and Verdicts in Large Counties*, NCJ-154346 (Washington, DC: Bureau of Justice Statistics, 1995), 5.

The strain on city governments from such lawsuits can be considerable. As former Corporation Counsel for the District of Columbia John Payton pointed out, litigated settlements must be paid no matter how excessive and may force spending reductions in other areas: "We're at the point where we can't afford to get hit. ... Our options are limited. We [could] end up having to cut services, fire employees."

Consider the problem of excess litigation for New York City alone. The cost of settling all personal injury lawsuits against the city increased from just \$25 million in 1977 to \$282 million in 1996, for a total increase of over 1,000 percent. With an average rate of growth of nearly 14 percent per year, liability payouts by New York City grew two and one-half times faster than the rate of inflation. Cases related to auto accidents make up a major portion of those costs – more than \$40 million, and between 60 and 75 percent of that amount (\$24 to \$30 million) went for "pain and suffering" claims.

A broader measure of the overall liability costs faced by state and local governments comes from a survey of the membership of the National Institute of Municipal Law Officers, consisting

mainly of legal counsels. The survey reveals that litigation costs for most cities grew at least 10 percent in 1991 and 1992.87 For roughly one in five local governments, litigation costs in those two years grew by more than 30 percent. Even worse, the survey indicates that local governments in "poor or fair" fiscal condition have been hit the hardest.

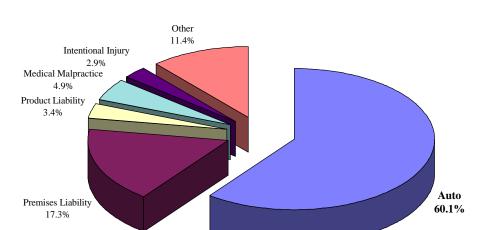


Figure 8. Types of Tort Cases in 75 Most Populous Counties

Source: U.S. Department of Justice, Bureau of Justice Statistics, Tort Cases.

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<sup>&</sup>lt;sup>84</sup> John Murawski, "District Slumps under Liability Strain," Legal Times, 8/30/93.

<sup>&</sup>lt;sup>85</sup> Paul A. Crotty, Corporation Counsel of the City of New York, "Shutting Off the Money Faucet," *Citylaw* 2, no. 6 (December 1996): 125; and Council of Economic Advisers, *Economic Report of the President* (Washington, DC: Government Printing Office, 1998), 349.

<sup>&</sup>lt;sup>86</sup> Rudolph Giuliani, Mayor of New York City, Statement submitted to the Senate Committee on Commerce, Science and Transportation, Congress of the United States, 9/24/96.

<sup>&</sup>lt;sup>87</sup> The survey data did not indicate the portion of litigation and costs attributable to motor vehicle crashes. Susan A. MacManus and Patricia A. Turner, "Litigation as a Budgetary Constraint: Problem Areas and Costs," *Public Administration Review* 53, no. 5 (September/October 1993): 462-472.

Nationwide, the study estimates that city governments spent roughly \$6.45 billion on all forms of litigation costs in 1991. County governments were burdened with an additional \$2.1 billion in litigation costs, bringing the total cost to local government to approximately \$8.5 billion in 1991.

#### Administration of Justice

A 1992 survey of the nation's 75 most populous counties by the U.S. Department of Justice found that auto accident-related lawsuits filed in state courts account for 60 percent of all tort cases – more than all other types of tort lawsuits combined (Figure 8). The cost of providing the judicial infrastructure for these cases consumes resources that could be better used to aid cities. As importantly, the large number of auto-related lawsuits clogs the court system and causes delays in the administration of justice in other cases.

#### Health Care

An additional fiscal burden for state and local governments comes in the form of unnecessary consumption of medical services in order to increase a legal settlement for "pain and suffering" damages. According to the U.S. Department of Transportation, state Medicaid programs pay for close to 10 percent of all medical costs resulting from auto accidents, totaling \$1.7 billion in 1994 alone. <sup>89</sup> If such costs continue to grow at the average rate for 1990-94, state governments will spend approximately \$9.8 billion over the next five years (1998-2002). <sup>90</sup> Unless the extent of fraud in government-paid services varies greatly from that in privately-paid services, a significant portion of these expenses can be attributed to fraudulent and unnecessary services. <sup>91</sup>

#### Tax Base

Expensive auto insurance also affects local governments by contributing to the erosion of the tax base in two ways. First, large premium disparities between central cities and suburbs

<sup>88</sup> Refers only to cases in state general jurisdiction courts. U.S. Department of Justice, Bureau of Justice Statistics, *Tort Cases in Large Counties*, NCJ-153177 (Washington, DC: Bureau of Justice Statistics, 1995), 2.

State and federal government sources combined pay roughly one-quarter (24.2 percent) of all medical expenses from auto accidents. Other Department of Transportation studies have estimated the government's share to be even higher. A 1993 report estimated the government's share to be 26.4 percent, and a 1992 report put the figure at 29 percent. The 1992 report, however, cautioned that since payment information is usually only available for first-year costs, the long-term figure could be as high as 51 percent, since some victims are "rendered eligible for publicly assisted medical care as a consequence of the motor vehicle injury." The authoring agency for all three reports is the U.S. Department of Transportation, National Highway Traffic Safety Administration: *The Economic Cost of Motor Vehicle Crashes, 1994*, by Lawrence J. Blincoe, DOT HS 808-425 (Washington, DC: Government Printing Office, 1996), 46-47; *Saving Lives and Dollars – Highway Safety Contribution to Health Care Reform and Deficit Reduction* (Washington, DC: Government Printing Office, 1993), 3; and *Source of Payment for the Medical Cost of Motor Vehicle Injuries in the United States*, by Joan S. Harris, DOT HS 807-800 (Washington, DC: Government Printing Office, 1992), 7, 28.

<sup>&</sup>lt;sup>90</sup> Growth rate of medical costs was calculated using methodology recommended by Blincoe. See *supra* note 89 and U.S. Department of Transportation, National Highway Traffic Safety Administration, *The Economic Cost of Motor Vehicle Crashes*, 1990, by Lawrence J. Blincoe and Barbara M. Faigin, DOT HS 807-876 (Washington, DC: Government Printing Office, 1992), I-3.

<sup>&</sup>lt;sup>91</sup> See *supra* notes 11, 12, and 13, and accompanying text.

create an additional incentive for middle-income households to leave the city. Although the stream of middle- and upper-income families out of central cities results from numerous problems, including crime, school quality, and taxes, high auto insurance premiums exacerbate the already higher cost of living in cities.

Second, high insurance premiums reduce the number of registered automobiles, which in turn lowers registration receipts raised by state and local governments. In 1995, such fees at the state level accounted for \$11.9 billion. As with most goods, when the price increases, there is a reduction in the quantity purchased. In the case of cars, high insurance premiums significantly raise the long-term costs of owning a vehicle. According to a 1995 article in *Public Finance Quarterly*, authors Tim Pritchard and Larry DeBoer estimate that a 10 percent reduction in insurance costs would boost the number of registered automobiles by 4.6 to 5.6 percent. This research suggests that if insurance premiums were reduced by close to one-quarter, state governments could raise an additional \$1.2 billion in revenue. Thus, spiraling insurance costs strain the fiscal resources of governments by reducing motor vehicle registration receipts from levels that would otherwise result.

#### **Respect for the Law**

Of all the consequences of an inefficient and costly auto insurance system, among the most troubling is how frustration eventually transforms into lack of respect for the law. Resentment towards the insurance system results from at least two sources. First, because premiums are so high (even for drivers with clean records), many individuals feel that they are not getting their money's worth out of auto insurance. Second, the perception that fraud and claims buildup is widespread helps to erode the social inhibition against insurance abuse. In other words, people begin to believe that claims buildup is acceptable behavior because "everybody does it." Together, high premiums and the perception of pervasive fraud combine to foster an attitude among some consumers that the insurance system is corrupt, unfair, or illegitimate. Because of such feelings, some individuals feel justified in abusing the insurance system. Common sense suggests that these attitudes get worse as premiums get higher and fraud appears more widespread, the very problems that are most evident in urban areas.

To a large degree, the perverse incentives of the tort system are responsible for these attitudes. Indirectly, the high cost of a litigious compensation system pushes premiums up. Directly, the way the system overcompensates minor injuries adds to the perception that fraud and claims abuse is pervasive. A driver injured in an accident begins to feel that he too is entitled to "payback" for all the years he paid excessive premiums.

<sup>&</sup>lt;sup>92</sup> Amount does not include an additional \$10.7 billion raised from other fees, such driver license fees, title taxes, fines and penalties, or other related charges. U.S. Department of Transportation, *Highway Statistics 1995*, IV-61.
<sup>93</sup> An increase in registrations does not necessarily mean more cars on the road. Some new cars may be purchased by individuals at the margin; other registrations may result from currently-owned vehicles that are not now registered. Pritchard and DeBoer caution that the elasticity estimate is sensitive to the premium measure used and the instrumental variable technique. Tim Pritchard and Larry DeBoer, "The Effect of Taxes and Insurance Costs on Automobile Registrations in the United States," *Public Finance Quarterly* 23, no. 3 (July 1995): 297.
<sup>94</sup> See *infra* Table 8 and accompanying text.

It should come as no surprise that drivers increasingly feel like they are participating in a giant lottery, where slight collisions causing minor property damage are treated by many as an opportunity to win the jackpot. Marjorie Berte, the director of the California Department of Consumer Affairs, articulated the problem in her 1991 book, Hit Me - I Need the Money: "Because people have learned that they can get perhaps three times the amount of their actual economic losses, each claimant, regardless of how serious the injury, expects triple the value of his loss."

Because the problems of high premiums and claims abuse are greater in inner cities, there is also more tolerance of claims buildup. According to a 1993 survey, 46 percent of large city residents felt that claims buildup was acceptable to make up for premiums paid in past years. Only 24 percent of suburban residents shared the same view. Likewise, 25 percent of large city residents approved of receiving treatment after an injury has healed, compared to just 6 percent of suburban residents. Property of suburban residents.

The mandatory nature of auto insurance in many states also contributes to negative perceptions of the law, government, and other citizens. Approximately 44 percent of respondents in a survey of low-income families in Maricopa County, Arizona (which contains the city of Phoenix), felt that other drivers were not complying with the mandatory insurance law. Perhaps of greater concern is the prevalence of this opinion among minorities in the survey, 53 percent of whom believed that the mandatory insurance law was not being followed by others. Attitudes towards law enforcement were similarly affected. When asked whether the police were a problem in enforcing the mandatory insurance law, only 22 percent of whites responded affirmatively, whereas 66 percent of minorities felt that they were. A common theme is reflected in the comments of one minority respondent who said "... I got stopped four times in one day by police, and they purposely wanted to know whether I had insurance."

Resentment is further fueled by the often-stiff penalties imposed on drivers who lack auto insurance. For instance, a 1997 California law imposes fines ranging from a *minimum* of \$1,375 to a maximum of \$2,750 for first-time offenders of the state's mandated insurance law. Ohio's effort to crack down on motorists violating the state's insurance requirements resulted in the suspension of more than 71,000 driver licenses in the first year of the new law. Drivers in Louisiana and Oregon can now have their cars towed and impounded if they fail to carry proof of insurance. Even without addressing the merits of mandatory insurance laws, it is clear why such penalties can undermine respect for the law: such laws punish low-income motorists who refuse to spend hundreds, if not thousands, of dollars annually to buy liability insurance. Despite

<sup>95</sup> Marjorie M. Berte, *Hit Me – I Need the Money!* (San Francisco, CA: ICS Press, 1991), 38.

<sup>&</sup>lt;sup>96</sup> Large cities are defined in the survey as having a population of one million or more. Insurance Research Council, *Public Attitude Monitor 1993* (Oak Brook, IL: Insurance Research Council, 1993), 18, 20. See also *supra* note 36 and accompanying text.

<sup>&</sup>lt;sup>97</sup> *Ibid.*, 20.

<sup>&</sup>lt;sup>98</sup> Maril, 17.

<sup>&</sup>lt;sup>99</sup> *Ibid.*, 14.

<sup>&</sup>lt;sup>100</sup> The Los Angeles Times, 1/3/97.

<sup>&</sup>lt;sup>101</sup> The (Cincinnati) Call and Post, 11/7/96.

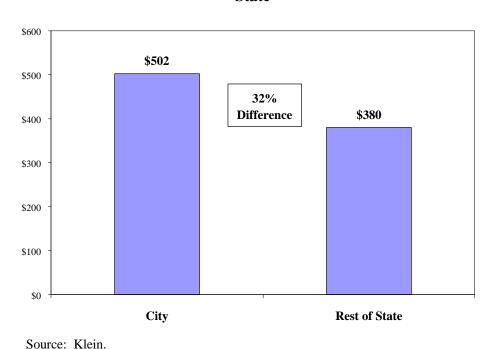
<sup>&</sup>lt;sup>102</sup> The (New Orleans) Times-Picayune, 12/31/97; and The (Bend, O.R.) Bulletin, 8/1/96.

the high price, however, liability insurance does not cover one dime of their own losses if they are injured, protects assets that they do not have, and contributes to a liability system that is perceived by many as corrupt and wasteful. 103

#### **City-Suburb Premium Disparities**

One of the most vexing consequences of the problems described above is that an urban insurance policy can cost much more than a policy for the same coverage and same driver living in the suburbs. According to a 1991 survey of urban auto premiums by Robert Klein, then the

Figure 9. Average Liability Premium for Cities and the Rest of the State



Director of Research for the National Association of Insurance Commissioners (NAIC), the average liability premium is 32 percent higher in large cities than other parts of the same state (Figure 9).<sup>104</sup> A separate analysis by the National Association of Insurance Commissioners similarly indicated that the average premium differential for

cities ranged between 25 and 33 percent for different types of policies. The absolute size of disparities can be quite large, easily exceeding \$1,000 or \$1,500 per year, per car.

The disparity in insurance premiums is the result of "territorial rating" and is one of the more controversial aspects of insurance reform. When setting premium rates, insurance companies attempt to set the premium to a level that will cover, on average, the expected cost of

<sup>&</sup>lt;sup>103</sup> For further discussion on these and related issues, see the section below on Poor and Low-Income Drivers, as well as the previous section on Fraud and Claims Buildup.

<sup>&</sup>lt;sup>104</sup> Robert Klein, "Reducing Urban Auto Insurance Costs," in *Affordable Auto Insurance for Urban Communities:* The Universe of Possibilities, 1995 Conference Proceedings, Milwaukee, Wisconsin, May 12-13 and Baltimore, Maryland, December 7-8, ed. Guila P. Parker and James L. Brown (Milwaukee, WI: Center for Consumer Affairs, 1995).

<sup>&</sup>lt;sup>105</sup> Lamberty, 17.

administration and payment for injuries. If insurance costs are higher in cities, then insurance companies must set higher urban premiums to cover the higher expected costs.

This paper makes no attempt to resolve the many issues surrounding territorial rating, except to note that 1) perhaps the most effective way to minimize its apparent disparate impact is to eliminate the perverse incentives which distort claiming behavior and push up costs; and 2) a system that pays policyholders for their own losses would more fairly reflect in the insurance premiums of the poor their lower wage losses suffered in accidents. <sup>106</sup>

#### IV. POOR AND LOW-INCOME DRIVERS

The shortcomings of the auto insurance system are clearly evident in their deleterious impact on the poor. Indeed, perhaps the most manifestly inequitable aspect of the current tort liability system is its regressivity. Families at the bottom end of the income scale have very little disposable income, and every dollar spent on premiums for auto insurance represents money that could be spent on other essentials, such as food, shelter and health care. As previously indicated, owning a car can be extremely important in terms of finding and holding down a job. <sup>107</sup>

In addition to the effect on employment and wages, the current system's deficiencies adversely impact low-income families in a number of ways. First, the tort litigation system best compensates those people who can wait out a protracted and costly legal process. However, such a process typically requires retaining a lawyer, which generally increases the length of time a claimant has to wait for payment. However, low-income families by definition lack the necessary resources to wait for an inefficient tort system to provide compensation. Such families, therefore, must often settle for a smaller amount rather than hold out for a larger award.

Second, as suggested above, insurance in a third-party liability system provides compensation not to the owner of the policy but to an unknown third-party whose losses – unlike the insured himself – cannot be predicted before the accident. Since premiums are based on the expected cost to compensate the "average" third-party claimant, low-income drivers (who by definition have below average economic losses) are forced to subsidize the premiums of high-income drivers (who have above average economic losses). In fact, liability insurance itself is designed to protect the assets of the policyholder from lawsuits – a service of limited value to someone who has no assets. Since the poor generally have little in the way of assets, liability insurance affords them little protection. This type of system by its very nature provides no compensation to policyholders injured in single-car accidents, in an accident for which they are held responsible, or by uninsured drivers.

<sup>&</sup>lt;sup>106</sup> See text accompanying *infra* note 109.

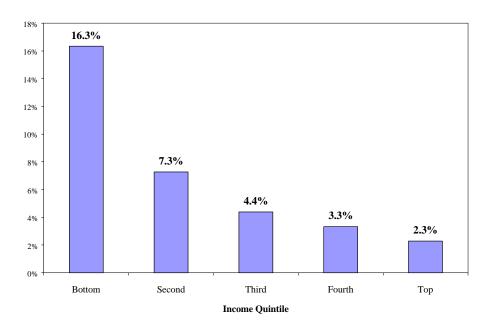
<sup>&</sup>lt;sup>107</sup> See text accompanying *supra* notes 67 through 79.

<sup>&</sup>lt;sup>108</sup> See *supra* note 55 and accompanying text.

Additional insurance policies can be purchased at added cost to cover such contingencies (on a first-party basis). However, the point remains that the tort liability system itself has nothing to offer such accident victims.

Third, the regressivity of the current system is heightened by the fact that insurance represents a larger share of operating costs for older, less-valuable cars. According to a 1992 report from the Department of Transportation, the share of the ownership costs attributable to vehicle insurance steadily increases with the car's age. For a brand new sub-compact car, auto insurance represents 13 percent of the total cost of owning and operating the car. For a six-year-old car of the same make and model, insurance doubles to 26 percent of total costs, even after dropping the optional property damage coverage, and after eight years, liability insurance is the single most expensive component of car ownership. By the 12<sup>th</sup> year, insurance premiums account for 33 percent of total ownership expenses and cost more than even vehicle repairs and maintenance. Since low-income households often purchase older, used vehicles, the deficiencies of the current system that drive up costs are magnified for families at the bottom of the income scale. 111

Figure 10. Vehicle Insurance as a Share of Household Income



Source: Joint Economic Committee calculations and U.S. Department of Labor, "1995 Consumer Expenditure Survey."

Finally, because auto insurance is (to varying degrees) a legal requirement of owning a car, lowincome families often must purchase an expensive liability policy that consumes a disproportionate share of their family budget. According to data from the Bureau of Labor Statistics, among households that have auto insurance, the wealthiest fifth spends 2.3 percent

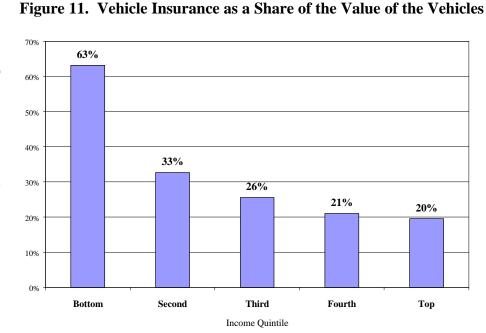
<sup>&</sup>lt;sup>110</sup> Costs are based on operation of typical 1991 vehicles in the suburbs of Baltimore, Maryland. The analysis assumes that insurance for the first five years meets Maryland's minimum liability requirements plus optional coverage for collision and comprehensive. The collision and comprehensive coverages are assumed to be dropped after the fifth year. U.S. Department of Transportation, Federal Highway Administration, *Cost of Owning & Operating Automobiles, Vans & Light Trucks 1991*, FHWA-PL-92-019 (Washington, DC: Federal Highway Administration, 1992), 12-13.

A survey by the U.S. Department of Energy found that the average age of vehicles in households eligible for food stamps was 11.8 years. U.S. Department of Energy, Energy Information Administration, *Household Vehicles Energy Consumption 1991*, DOE/EIA-0464 (Washington, DC: Government Printing Office, 1993), 42.

of their total household income on insurance premiums (Figure 10). The poorest fifth of households, by comparison, spends 16.3 percent of their income on premiums when they purchase auto insurance, more than seven times the income share of the richest families.

The heavy financial burden imposed by auto insurance stands in stark contrast to the inexpensive cars that lowincome families generally own. Given the high premiums charged in big cities like Los Angeles and New York, many low-income urban drivers end up spending more on auto insurance than the value of their car. Household

surveys indicate



Source: Joint Economic Committee calculations and U.S. Bureau of the Census, *Asset Ownership*, and U.S. Department of Labor, "1995 Consumer Expenditure Survey."

that the average insurance expenditure by families in the bottom income quintile represents close to two-thirds (63 percent) the median value of their car (Figure 11). In other words, the typical low-income household with auto insurance spends more on premiums in two years than the value of their automobile.

Perhaps the best evidence on the burden of auto insurance on low-income families comes from the 1993 study of poor and near-poor families in Maricopa County, Arizona, cited earlier. According to this study, families with incomes below 50 percent of the poverty line (roughly \$6,700) spend nearly one-third of their income (31.6 percent) on auto premiums when they

<sup>&</sup>lt;sup>112</sup> These figures are only for those households reporting an expenditure on vehicle insurance. Joint Economic Committee calculations based on data from the U.S. Department of Labor, Bureau of Labor Statistics, "1995 Consumer Expenditure Survey."

<sup>113</sup> These estimates were computed using insurance data from a survey of consumer expenditures and data on vehicle value from a survey of household assets. Although the data come from two different surveys, and therefore are not directly comparable, the household characteristics in each survey were similar enough to allow combination of these data. Data on average annual insurance expenditures (for households buying auto insurance) are from the U.S. Department of Labor, Bureau of Labor Statistics, "Consumer Expenditure Survey" (1991 and 1993). Data on median vehicle value (for households with a vehicle) are from U.S. Bureau of the Census, *Asset Ownership of Households: 1993* (Washington, DC: Government Printing Office, 1995), 6.

purchase insurance.<sup>114</sup> Over half (50.9 percent) of all families living at or below 200 percent of the poverty line report having to put off other important expenses in order to pay their insurance premiums. The most common purchase that was put off was food, followed by rent or mortgage.

Although low-income families bear the brunt of the current system's inequities, the primary beneficiaries of the perverse incentives in the tort system are lawyers (who gain from excessive litigation) and medical professionals (who gain from buildup of unnecessary medical treatments). The irony of this situation was noted by consumer advocate Andrew Tobias in his testimony before the Senate Commerce Committee:

As a practical matter, what this means is that today's \$7-an-hour worker, if he obeys the law in most states, is forced to buy insurance that pays lawyers \$125-an-hour to fight his claim, if he's hurt, and that then typically requires him to give up 33% or 40% plus expenses of anything he wins to the lawyer who helped him win it. 115

Of course, faced with having to put off important expenses such as food or rent in order to pay into a system that too often fails to fully compensate serious injuries, many low-income drivers choose instead to enter outlaw status as an uninsured driver. The dilemma faced by low-income families is understandably tough: either they obey the law and spend a substantial portion of their income on an inefficient tort system; or they break the law and spend the money on essential items such as food and shelter. To compound the dilemma of the poor, the legal punishments for driving without insurance are becoming increasingly stiff, ranging from first-offense penalties of more than \$1,300 to impoundment of their cars. <sup>116</sup>

#### V. PROBLEMS FOR SUBURBAN AND MIDDLE-CLASS DRIVERS

The fact that low-income and urban drivers are big losers under the present system does not mean that other drivers are winners – the auto insurance system is not a zero-sum game for consumers. Suburban and middle-class drivers face the same fundamental problem that urban and low-income drivers have: premiums are too high, yet policies fail to provide prompt and sensible payments for injuries.

Even in the suburbs of big cities, premiums can be painfully high. For example, in the suburbs of Camden, New Jersey, a married couple with one car and a 17-year-old daughter, all with clean driving records, would have to pay more than \$2,000 a year for an insurance policy with relatively good coverage. For a two-car family in Pasadena, California, where each

<sup>&</sup>lt;sup>114</sup> Maril, 17. This figure differs from the Bureau of Labor Statistics figures cited earlier in two ways: it is focused on a narrower and poorer segment of the population, and it is based on a different household survey.

Andrew Tobias, Testimony to the Senate Committee on Commerce, Science and Transportation, Congress of the United States, 7/17/97.

<sup>&</sup>lt;sup>116</sup> See *supra* notes 100, 101, and 102, and accompanying text.

<sup>&</sup>lt;sup>117</sup> New Jersey Department of Insurance, *1995 Automobile Insurance Premium Comparison Survey* (Trenton, NJ: Department of Insurance, 1995).

parent has one speeding ticket and the 17-year-old son is an occasional driver, the average premium is over \$4,700 per year. 118

While premiums for suburban residents may consume a smaller portion of the family budget compared to low-income drivers, they are nonetheless stunningly high, and in any event represent resources that could be spent on more productive uses. The financial consequences of the current system's shortcomings are magnified for such families because the average middleincome household owns two vehicles. 119 As with any family, excessively high premiums take money from the family budget that could be better spent on items such as education, health care, or a home mortgage. For example, data from the Bureau of Labor Statistics indicate that middleincome families on average spend two-and-one-half times more on vehicle insurance than on direct educational expenses. 120 However, as previously noted, despite such high premiums, the tort system does not offer quicker or more complete compensation. 121

#### VI. AUTO CHOICE SOLUTIONS

The proposed Auto Choice reform would help alleviate many of the problems associated with the current auto insurance system. Auto Choice represents real reform because it addresses the underlying cause of the problems, principally the incentives in the tort liability system to inflate medical claims and engage in litigation. By reducing these incentives, Auto Choice would lower premiums and at the same time increase the degree to which premium dollars are used for medical and wage losses for drivers who switch to a PPI policy.

Auto Choice promises to be effective in lowering premiums because it relies on market forces to reduce costs. Unlike health, life, or homeowners insurance policies, consumers in today's highly-regulated auto insurance system are forced to purchase insurance coverage for pain and suffering losses. In economic terms, the present system "bundles" insurance for economic and non-economic losses, essentially giving consumers just one package of services. Auto Choice unbundles the two types of premiums and allows consumers to choose the amount of coverage they want for each type of loss. Auto Choice is therefore a market-based reform because it gives insurance providers greater leeway to meet the needs and preferences of their customers. In doing so, Auto Choice exposes the incentives of current tort liability system to the pressures of market forces.

The premium savings from Auto Choice have been well documented in a series of studies by Stephen Carroll and Allan Abrahamse of the RAND Institute for Civil Justice. 122 Previous

<sup>&</sup>lt;sup>118</sup> California Department of Insurance, 1996 Automobile Premium Survey (1997), online at http://www.insurance.ca.gov/sab/autosurvey.html.

<sup>&</sup>lt;sup>119</sup>U.S. Department of Labor, Bureau of Labor Statistics, "1995 Consumer Expenditure Survey."

<sup>&</sup>lt;sup>120</sup> *Ibid.* Does not include educational expenses funded through tax payments.

<sup>&</sup>lt;sup>121</sup> See text accompanying *supra* notes 55 and 56.

<sup>122</sup> Stephen J. Carroll and Allan F. Abrahamse, The Effects of a Choice Automobile Insurance Plan on Insurance Costs and Compensation: An Updated Analysis (Santa Monica, CA: RAND, forthcoming 1998). See also Abrahamse and Carroll, The Effects of a Choice Automobile Insurance Plan Under Consideration by the Joint

studies by the Joint Economic Committee used RAND's research findings to estimate potential premium savings from implementation of Auto Choice. <sup>123</sup> This section presents updated savings estimates of Auto Choice based on the 1998 RAND study, *The Effects of a Choice Automobile Insurance Plan on Insurance Costs and Compensation: An Updated Analysis*.

# **Premium Savings**

According to RAND's 1998 study, Auto Choice would reduce the cost of compensating PPI drivers for personal injuries by about 45 percent. Since personal injuries make up about half of the total premium (with property damage being the other half), these savings translate into roughly a one-quarter reduction in the overall premium. Based on RAND's findings and insurance industry data, Auto Choice would make available to consumers more than \$35 billion in premium savings in 1998, and up to \$193 billion over the next five years (1998-2002).

Table 5. Estimated 1998 Savings from Auto Choice

	Private	Commercial	Total
Average premium savings	22.8%	27.5%	23.7%
Average savings per car	\$184		
Savings for low-income drivers	36.0%		
Total available savings if 100% switch (billions)	\$27.4	\$8.1	\$35.5

Source: Joint Economic Committee calculations using data from Carroll and Abrahamse.

Economic Committee of the United States Congress (Santa Monica, CA: RAND, 1997); and Abrahamse and Carroll, The Effects of a Choice Auto Insurance Plan on Insurance Costs (Santa Monica, CA: RAND, 1995).

<sup>&</sup>lt;sup>123</sup> Joint Economic Committee, Congress of the United States, *The Benefits and Savings of Auto Choice* (1997) and *Improving the American Legal System: The Economic Benefits of Tort Reform* (1996).

The savings estimates presented here are somewhat smaller than previous estimates, a change largely attributable to the fact that the present system has gotten worse at compensating accident victims. Between 1987 (the basis for previous estimates) and 1992 (the basis for the current estimate), the average economic loss in auto accidents grew faster than the average compensation. As a result, accident victims found it increasingly difficult to recover not only pain and suffering, but even their basic economic losses. This trend affects the savings estimates in two ways. First, because pain and suffering is harder to recover, there are less savings to be realized from eliminating such payments. Second, because the current system has gotten worse at paying economic losses, some of the savings are offset by increased compensation for serious injuries. For a fuller explanation, see Carroll and Abrahamse, Appendix B.

125 Savings for a given year and state were obtained by following the methodology described in O'Connell, et al. (1996). Projections were made using historical data from A.M. Best Company Inc., in Insurance Information Institute, *The Fact Book – Property/Casualty Insurance Facts* (New York, NY: Insurance Information Institute, annual); and Conning & Co. (Hartford, CT: 1/16/97). Because of data limitations, the RAND analysis did not examine the effect of Auto Choice on savings for commercial policies. This analysis assumes that commercial policies will experience the same personal injury savings as private passenger vehicles.

Table 6. State-by-State 1998 Savings from Auto Choice\*

Table 6. State-by-State 1998 Savings from Auto Choice*  Personal Overall Premium Savings Total Potential Average						
State	Injury Savings	<b>Private Drivers</b>	Low-Income	Savings (millions)	Savings	
<b>United States</b>	45%	23%	36%	\$35,513	<b>\$184</b>	
Alabama	43%	16%	31%	\$346	\$113	
Alaska	53%	23%	38%	\$80	\$216	
Arizona	45%	25%	37%	\$641	\$229	
Arkansas	60%	25%	42%	\$354	\$180	
California	42%	21%	34%	\$3,739	<b>\$193</b>	
Colorado	50%	26%	40%	\$639	\$230	
Connecticut	44%	23%	33%	\$596	\$217	
Delaware	44%	26%	36%	\$141	\$232	
Florida	50%	29%	42%	\$2,677	\$249	
Georgia	44%	16%	31%	\$718	\$129	
Hawaii	47%	30%	39%	\$248	\$322	
Idaho	18%	8%	13%	\$46	<b>\$46</b>	
Illinois	38%	16%	28%	\$1,002	<b>\$117</b>	
Indiana	51%	22%	36%	\$691	\$147	
Iowa	67%	26%	47%	\$370	\$140	
Kansas	27%	10%	18%	\$137	\$65	
Kentucky	38%	18%	27%	\$357	\$134	
Louisiana	60%	34%	49%	\$962	\$323	
Maine	51%	24%	39%	\$148	\$124	
Maryland	52%	26%	40%	\$882	\$221	
Massachusetts	63%	35%	48%	\$1,591	\$285	
Michigan	30%	14%	27%	\$866	\$124	
Minnesota	39%	21%	31%	\$568	\$155	
Mississippi	46%	19%	35%	\$249	\$142	
Missouri	44%	18%	31%	\$524	\$134	

<sup>\*</sup> Assumes 100% of drivers switch. Based on state laws as of 1988 (see *infra* note 127). Percent and average savings are relatively insensitive to how many drivers switch (see *infra* note 126). Source: Carroll and Abrahamse (1998) and Joint Economic Committee calculations.

Table 6. State-by-State 1998 Savings from Auto Choice, cont.\*

	Personal	Overall Premi		Total Potential	Average
State	Injury Savings	<b>Private Drivers</b>	Low-Income	Savings (millions)	Savings
Montana	57%	25%	44%	\$119	\$161
Nebraska	36%	14%	25%	\$126	<b>\$87</b>
Nevada	49%	27%	40%	\$291	\$259
New Hampshire	52%	24%	40%	\$171	\$159
New Jersey	47%	25%	38%	\$1,800	\$321
New Mexico	35%	17%	27%	\$157	\$146
New York	63%	32%	48%	\$3,729	\$385
North Carolina	32%	16%	25%	\$639	\$102
North Dakota	75%	28%	54%	\$93	\$155
Ohio	44%	20%	33%	\$1,092	\$126
Oklahoma	52%	23%	38%	\$399	\$165
Oregon	48%	23%	36%	\$426	\$159
Pennsylvania	37%	19%	29%	\$1,398	\$149
Rhode Island	57%	31%	45%	\$224	\$313
South Carolina	38%	17%	28%	\$337	\$122
South Dakota	8%	4%	6%	\$13	\$22
Tennessee	45%	18%	31%	\$484	\$118
Texas	47%	25%	37%	\$2,826	\$202
Utah	61%	29%	45%	\$271	\$205
Vermont	26%	11%	20%	\$36	\$67
Virginia	37%	19%	28%	\$652	\$117
Washington	60%	33%	48%	\$1,034	\$242
West Virginia	55%	28%	44%	\$298	\$237
Wisconsin	23%	10%	17%	\$261	\$62
Wyoming	69%	26%	51%	\$68	\$165

<sup>\*</sup> Assumes 100% of drivers switch. Based on state laws as of 1988 (see *infra* note 127). Percent and average savings are relatively insensitive to how many drivers switch (see *infra* note 126). Source: Carroll and Abrahamse (1998) and Joint Economic Committee calculations.

The typical private passenger insurance policy would save approximately 23 percent, averaging \$184 per car (Table 5). Drivers who opted to remain with their state's current system would be largely unaffected. State-by-state savings are presented in Table 6. 127

Low-income drivers would enjoy significantly higher savings – 36 percent on average. Since low-income families, by definition, have less disposable income, they often forgo the optional collision and comprehensive property damage coverages. As a result, the personal injury savings represent a larger share of their overall premium. The potential Auto Choice savings represent real purchasing power for low-income households. The average savings of \$184 is the equivalent of five weeks of free groceries or free electricity for nearly four months. In addition, to the degree that more affordable auto insurance enables low-income workers to own an automobile, Auto Choice will yield additional benefits in terms of better-paying jobs or reduced commute costs.

Table 7 presents the illustrative effect of Auto Choice on premiums for hypothetical policyholders with clean driving records in five metropolitan areas. These calculations take the average premium charged for hypothetical drivers (based on surveys of insurance companies by the relevant state regulatory agency) and estimate what the drivers would save if Auto Choice were enacted. The first row under each city lists the premium and savings for the urban driver, while the second row shows the estimates for the same driver in a nearby suburb. The third row under each city presents the city-suburb premium disparity. As the data indicate, Auto Choice offers substantial savings for urban drivers. In central Los Angeles, for example, a 38-year-old female could save nearly \$1,200 per year on her insurance premium. Likewise, a young male living in Chicago could reduce his premium by over \$600 per year. Clearly, drivers in urban areas stand to enjoy considerable premium savings if Auto Choice were enacted.

<sup>126</sup> The savings estimates presented here are based on the assumption that 100 percent of drivers switch to the new PPI policy. Percent and average savings, however, are relatively insensitive to how many drivers elect PPI. See Carroll and Abrahamse, Section 3. Actual savings for a particular driver will depend on the specifics of their policy, as well as other individual risk factors. Differences in the average percentage savings presented here and the estimates in Carroll and Abrahamse are primarily attributable to the use in this analysis of more recent premium data to estimate savings for 1998; average savings in Carroll and Abrahamse are for 1992. Historical data from National Association of Insurance Commissioners.

<sup>&</sup>lt;sup>127</sup> The RAND study uses 1992 data to estimate the effect of Auto-Choice based on laws in effect as of 1988. Data problems or changes in state law since 1988 precluded RAND from estimating savings for four states. This analysis therefore assumes that savings for Hawaii (which modified its no-fault system in 1998) equals the average for all no-fault states. For the two states that repealed their no-fault systems (Georgia in 1991 and Connecticut in 1993), this analysis assumes that savings equal the average for all tort states. Two states (Pennsylvania and New Jersey) have limited choice systems already in place. In both cases, the savings estimate is a weighted average of savings from the full-tort and limited-tort policies. In the case of New Jersey, there were no reliable 1992 data, so this analysis assumes that savings for full-tort policies equal the national average for all tort states, and that savings for limited-tort policies equal the average for all no-fault states.

<sup>&</sup>lt;sup>128</sup> U.S. Department of Labor, Bureau of Labor Statistics, "1995 Consumer Expenditure Survey."

<sup>&</sup>lt;sup>129</sup> For example, Ong's research found that welfare recipients who owned a car earned an additional \$152 per month relative to welfare recipients without a car. See *supra* note 77 and accompanying text.

<sup>&</sup>lt;sup>130</sup> These estimated savings are calculated using hypothetical driver profiles and average premiums charged for specific territories. Actual savings for a particular driver will depend on the specifics of their policy (especially the amount of personal injury coverage purchased), as well as other individual risk factors.

Table 7. Effect of Auto Choice on City and Suburb Premiums for Hypothetical Drivers<sup>†</sup>

	Average Pre	Average Premium Under		
	<b>Current Law</b>	<b>Auto-Choice</b>	Sav	ings*
Los Angeles, CA: Female, age	38 (BI/PD 100/300/	/50; MP 5; UM 15/3		
Los Angeles	\$3,461	\$2,281	34%	\$1,180
Pomona	\$1,827	\$1,204	34%	\$623
City-suburb difference	\$1,634	\$1,077	34%	\$557
Chicago, IL: Male, age 20 (BI/I	PD 20/40/15; MP 1;	UM 20/40)		
Chicago	\$2,132	\$1,540	28%	\$592
Aurora	\$1,064	\$769	28%	\$295
City-suburb difference	\$1,068	\$772	28%	\$296
Baltimore, MD: Male, age 20 (	BI/PD 20/40/10; PII	P 2.5; UM 20/40/10	)	
City of Baltimore	\$3,214	\$1,937	40%	\$1,277
<b>Baltimore County</b>	\$1,778	\$1,072	40%	<b>\$707</b>
Difference	\$1,435	\$865	40%	\$570
New York, NY: Male, age 20 (1	BI 25/50/10; PIP 50	; UM 25/50)		
Brooklyn	\$2,270	\$1,187	48%	\$1,083
Mt. Vernon/Yonkers	\$1,363	\$712	48%	\$650
City-suburb difference	\$907	\$474	48%	\$433
Dallas, TX: Female, under age	21 (BI/PD 20/40/15)	)		
Harris County	\$1,297	\$812	37%	\$485
Ellis County	\$870	\$545	37%	\$325
Difference	\$427	\$267	37%	\$160

<sup>†</sup> All drivers in these examples have clean driving records. Policy limits for bodily injury and property damage policies are listed as "BI/PD 15/30/5," where the numbers refer to the liability coverage (in \$1,000s) on BI per person, BI per accident, and PD per accident, respectively. Uninsured motorist (UM) policies take the same form as BI policies. Other policies are medical payments (MP) and personal injury protection (PIP).

# **City-Suburb Premium Disparities and Savings**

Table 7 also illustrates the effect of Auto Choice on city-suburb premium disparities. In Baltimore, the city-suburb premium difference for a 20-year-old male would fall from more than \$1,400 under current law to \$865, a drop of 40 percent. In New York City, the city-suburb disparity for a single 20-year-old male would be cut by over \$430 per year, or 48 percent. Nationwide, premiums for liability-only policies would be reduced by 36 percent on average. <sup>131</sup>

<sup>\*</sup> Percentage savings equals the low-income savings estimate, or savings for policies with liability coverage only. Source: Joint Economic Committee calculations using data from the relevant state regulatory agency and Insurance News Network, "States," online at http://www.insure.com/states/.

<sup>&</sup>lt;sup>131</sup> The RAND analysis of Auto Choice estimates personal injury savings by state, but not by city. Mathematically, since premiums in both the city and suburb examples are being reduced by the same percentage, the ratio of city to

Although city premiums would still be higher than suburban premiums, the dollar difference between the two would be reduced significantly.

The evidence presented in this paper suggests that inner cities may enjoy significantly larger savings than those estimated by RAND. The RAND analysis estimates what it would cost to provide auto insurance without coverage for pain and suffering damages, assuming that there is no change in claiming behavior. In this sense, the RAND estimates are quite conservative, since there is a compelling amount of evidence that the potential to recover pain and suffering is a major contributing factor to insurance costs. 132 As the data in Section II so clearly indicate, excess claiming behavior is a principal reason why premiums are so high in central cities. Because Auto Choice eliminates the incentive for such excess claiming behavior for those who choose it, the premium savings for many urban drivers are likely to be significantly greater than the RAND estimates, thus further reducing both the dollar and percentage difference between city and suburb premiums.

Empirical confirmation of the potential rate-flattening effect of Auto Choice is found by examining the city-suburb disparities in insurance costs for the three no-fault states that currently have a strict verbal threshold. Of the 14 states that had a no-fault system during the 1989-1991 period, only Florida, Michigan and New York have what is called a "strict verbal threshold," where victims must suffer a specific type of injury (such as permanent disability) before they can sue for pain and suffering damages. Relative to no-fault states with monetary thresholds, there is far less incentive to artificially inflate medical claims in order to surpass the threshold. Based on the data listed in Table 2, the city-suburb difference in average loss cost (ALC) for PIP claimants in Florida, Michigan and New York is 27 percent, whereas the average for the other 11 no-fault states is 61 percent. In other words, the city-suburb premium disparity for states with a strict verbal threshold is less than one-half the disparity in other no-fault states. Moreover, average loss costs in the state with the toughest verbal threshold in the country, Michigan, are actually lower in the city than elsewhere in the state. 134 This relationship confirms the conclusion that implementation of the Auto Choice reform will significantly reduce the premium disparity between cities and suburbs.

Previous attempts to address premium disparities between cities and suburbs have typically focused on requiring suburban and rural drivers to pay higher insurance rates in order to lower premiums in heavily-urbanized areas. Although such subsidies may in fact flatten rates, they do nothing to remedy the problems that drive up urban premiums in the first place. A further drawback of this approach is the attendant resentment felt by the drivers who are expected to finance the subsidy through higher rates. One of the appealing aspects of the Auto Choice reform is that it reduces city-suburb premium disparities by addressing the underlying cost factors.

134 See supra note 27.

suburb premiums would not change. However, the disparity in absolute terms would be reduced by the same percent that overall premiums are reduced.

132 See *supra* notes 11, 12, and 13, and accompanying text.

Even in strict verbal threshold states, however, once the threshold has been crossed there is still a powerful incentive to inflate damages in order to maximize the pain and suffering award.

### **Savings to State and Local Governments**

Auto Choice would provide government at all levels some degree of fiscal relief. State Medicaid programs pay for roughly 10 percent of all medical expenses from auto accidents. As discussed above, a substantial portion of these costs are for unnecessary medical treatments incurred in response to the perverse incentives of the tort liability system. Depending on how

Table 8. Potential Effect of Auto Choice on Motor Vehicle Registration Receipts in 1995 (millions)

State	Revenue	State	Revenue
Alabama	\$4.4	Montana	\$1.4
Alaska	\$2.5	Nebraska	\$3.0
Arizona	\$8.6	Nevada	\$7.2
Arkansas	\$6.5	New Hampshire	\$4.6
California	\$339.9	New Jersey	\$27.6
Colorado	\$11.4	New Mexico	\$4.1
Connecticut	\$14.2	New York	\$50.6
Delaware	\$1.8	North Carolina	\$13.1
Florida	\$45.5	North Dakota	\$4.9
Georgia	\$13.1	Ohio	\$36.5
Hawaii	\$9.2	Oklahoma	\$28.9
Idaho	\$1.1	Oregon	\$5.9
Illinois	\$42.3	Pennsylvania	\$35.7
Indiana	\$16.8	Rhode Island	\$4.1
Iowa	\$30.6	South Carolina	\$4.5
Kansas	\$5.0	South Dakota	\$0.6
Kentucky	\$3.2	Tennessee	\$9.4
Louisiana	\$9.9	Texas	\$79.7
Maine	\$3.8	Utah	\$3.3
Maryland	\$16.1	Vermont	\$1.3
Massachusetts	\$24.7	Virginia	\$4.4
Michigan	\$31.9	Washington	\$129.1
Minnesota	\$40.1	West Virginia	\$7.3
Mississippi	\$5.3	Wisconsin	\$10.7
Missouri	\$15.4	Wyoming	\$4.0
		All U.S.	\$1,217.7

Source: Joint Economic Committee calculations using data from U.S. Department of Transportation, *Highway Statistics* 1995 (1996) and Pritchard and DeBoer (1995).

many consumers choose a PPI policy, Auto Choice could significantly reduce the taxpayer's share of this excess consumption of health care. Moreover, the significant rate reductions will make auto insurance affordable for many motorists who are currently uninsured. Because many of these drivers are poor, their purchase of first-party health coverage would reduce their dependence on government-provided health benefits.

A more quantifiable source of savings comes in the form of vehicle registration fees. In 1995, state governments raised \$11.9 billion from fees for personal and commercial motor vehicle registrations. Using the lower bound estimate of insurance price elasticity from Pritchard and DeBoer<sup>136</sup>, the premium reductions produced by Auto Choice would increase the number of registered vehicles by roughly 11 percent. Based on this assumption and 1995 data, increased motor vehicle registrations from Auto Choice would have increased state

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<sup>&</sup>lt;sup>135</sup> U.S. Department of Transportation, *Motor Vehicle Crashes*, 46.

<sup>136</sup> See *supra* note 93 and accompanying text.

government receipts by around \$1.2 billion.<sup>137</sup> The estimates in Table 8 suggest the rough order of magnitude of the potential revenue gains, although these estimates are sensitive to the assumption that the elasticity effect of insurance reductions is the same for all states.

#### Jobs and Urban Renewal

Despite billions of dollars in aid from the federal government, many of the nation's large cities continue to suffer from a range of problems, including economic stagnation or decline, high rates of crime, racial tension, high cost of living, and a declining tax base. Obviously, no single piece of legislation could hope to satisfactorily address all of these problems. The proposed Auto Choice reform, however, would help alleviate many of the pressures that have contributed to the long-standing problems of cities.

Although the automobile may seem to be a surprising choice to aid in urban renewal, history suggests that geographic mobility is a potent social tool. Historically, access to transportation has been of greatest value to ordinary people. Affordable travel grants individuals the ability to change their location, and with it the opportunity to change their social and economic well being. As the economist Robert L. Heilbroner noted,

Yet these reflections on the impact of the automobile still fail to do justice to its quintessential contribution to our lives. This is its gift of mobility itself – not mobility as a dollar-spreading device or a mechanical substitute for personal movement, but as a direct enhancement of life, as an enlargement of life's boundaries and opportunities. This is so enormous, so radical a transformation that its effect can no longer be measured or appreciated by mere figures. It is nothing less than the unshackling of the age-old bonds of locality; it is the grant of geographic choice and economic freedom on a hitherto unimagined scale. <sup>138</sup>

The economic importance of mobility is highlighted by the discussion of job accessibility above. The federal government has recognized and tried to address these issues with additional spending programs. The Department of Transportation has proposed spending \$600 million over the next six years on the Access to Jobs program. Transportation assistance is one of the components of the Department of Labor's \$3 billion Welfare-to-Work grant program. In addition, some state and local governments have sought to address the problem by expanding public transportation programs. Although these programs may have merit, they nonetheless

<sup>138</sup> Robert L. Heilbroner, "Halfway to the Moon on Wheels," *Petroleum Today* (Spring 1960): 1-3; quoted in John B. Rae, *The Road and the Car in American Life* (Cambridge, MA: MIT Press, 1971), 370.

<sup>&</sup>lt;sup>137</sup> Estimated premium savings are listed in Table 6. See also *supra* notes 92 and 93.

<sup>&</sup>lt;sup>139</sup> Office of Management and Budget, *Budget of the United States Government, Fiscal Year 1998* (Washington, DC: Government Printing Office, 1998), 87-88.

<sup>&</sup>lt;sup>140</sup> U.S. Department of Labor, Employment and Training Administration, "ETA Press Release: Labor Secretary Herman Kicks-Off Nationwide Welfare-to-Work Tour," (Washington, DC: Employment and Training Administration, 11/17/97).

<sup>&</sup>lt;sup>141</sup> Most of the research surveyed here has found that traditional public transportation systems suffer from a number of inherent limitations. For example, Kain and Meyer found that efforts to expand public transportation failed to compensate for low automobile ownership rates among blacks. Wilson and Kasarda and Ting also document the

represent increases in the size of government and a burden to the taxpayer. Auto Choice is an attractive alternative because it would directly address the transportation barriers faced by low-income and inner-city workers by making car ownership more affordable, without creating a new government program or engendering dependence on public assistance.

## **Improved Compensation for Injuries**

In addition to reducing premiums, Auto Choice virtually guarantees that everyone injured in an auto accident will have access to greater amounts of compensation than they do today – even if they buy minimum policy limits. This result is true for drivers regardless of whether they choose to remain in their state's current system or switch to the new PPI policy. This conclusion follows from the fact that in today's system, accident victims are compensated from two sources, their own first-party auto health coverage (if any) and the negligent driver's liability policy (if any). Auto Choice would increase the amount of compensation available from both sources.

In terms of collection from first-party health coverages (such as MP policies), drivers residing in a tort state who switch to Auto Choice would generally increase their available compensation by a factor of at least three or four. For example, most medical payments policies purchased today have limits of \$5,000 or less. In contrast, minimum PPI limits in 33 of the existing 37 (roughly three out of four) tort states would be at least \$15,000. These figures significantly understate the magnitude of increased compensation, since most states make the purchase of first-party health coverage optional. Thus, many drivers would switch from having zero first-party health coverage under the current system, to \$15,000 or more under Auto Choice, a vast improvement for all drivers. It would be of particular benefit to the approximately 30 percent of injured drivers who have no recovery under the tort system – injuries sustained in single-car accidents, by at-fault drivers, or caused by uninsured motorists.

On top of expanded first-party health coverage, Auto Choice preserves the right of injured PPI drivers to sue the negligent party for any economic losses above their PPI policy limits. Regardless of whether the negligent driver chose TMC or PPI, they would still be required to carry liability insurance at least to their state's financial responsibility level. PPI drivers would therefore be able to recover greater amounts of their losses on a first-party basis, plus recover at least everything they could have under the old tort system on a third-party basis.

Even drivers who opted to remain in their state's existing system would be better off, since they would have access to compensation not only from their own TMC policy but also from the negligent PPI driver's supplemental liability insurance. Both TMC and PPI drivers would further benefit from any reduction in the number of uninsured motorists that results from the premium reductions.

inadequacies of public transportation (*supra* notes 67 and 75). John F. Kain and John R. Meyer, "Transportation and Poverty," *The Public Interest* 18 (Winter 1970): 75-87.

<sup>&</sup>lt;sup>142</sup> Insurance Research Council, *Claiming Behavior*, 76.

<sup>&</sup>lt;sup>143</sup> Insurance Information Institute, *The Fact Book*, 112-113.

<sup>&</sup>lt;sup>144</sup> Carroll and Abrahamse, 12 at note 24.

<sup>&</sup>lt;sup>145</sup> The RAND analysis assumes that since drivers who switch to PPI would have the same amount of assets to protect, they would purchase supplemental liability coverage at the same levels that they now buy.

Thus, even if PPI drivers choose to purchase policies with the *minimum* limits, they would still on average recover more of their economic loss than in today's system. However, if drivers choose instead to spend part or all of their premium savings on additional coverage (for example, by raising their limits to \$250,000), they stand to be dramatically better off under Auto Choice. Traditionally, drivers who suffer catastrophic losses have fared the worst under the current tort system. Whereas the current tort system compensates such victims for just 9 percent of their losses<sup>146</sup>, under Auto Choice, drivers would at least have the opportunity to buy affordable coverage for such incidents. Consumers would finally be empowered to purchase an insurance policy that covers all economic losses up to limits that they choose. This sort of consumer choice stands in stark contrast to the present fault-based system. Since accident victims in the tort system are compensated by the insurance company of the negligent driver, compensation limits are often set by the very wrongdoer who caused the accident. With first-party PPI coverage, Auto Choice puts consumers in control of the limits of their compensation.

In addition to increasing the amount of compensation, Auto Choice would provide it more quickly to accident victims because of the reduced need for time-consuming litigation as a means of determining compensation. The fact that the tort system relies on litigation in the clogged court system to resolve negligence means that compensation for injuries can be delayed for months and even years. In contrast, the Auto Choice reform described here would require PPI claims to be paid within 30 days.

Finally, it is important to note that the first-party health coverage provided by Auto Choice is of greatest value to lower-income households. Such households may have limited employer-provided health benefits or lack private health insurance altogether. When the tort system malfunctions and fails to compensate injuries, the people who suffer the most are those who have no alternative source of health coverage. Auto Choice offers these families the opportunity to purchase more affordable health insurance to cover their injuries from auto accidents.

## VII. CONCLUSION

Auto insurance is first and foremost about compensating people for injuries they suffer in car accidents. Today's system of compensating people through a third-party liability system, however, has failed in this goal: the system malfunctions on many levels, even as premiums are growing one-and-a-half times faster than inflation. In other words, the system costs too much and does not give consumers their money's worth.

The shortcomings of the present tort liability system make all consumers losers. Low-income families are burdened with high and often mandatory insurance premiums that can consume up to one-third of household income. Urban residents suffer from high costs, large city-suburb premium disparities, organized fraud rings, and obstacles to job opportunities.

<sup>&</sup>lt;sup>146</sup> Carroll, et al., 187.

Finally, suburban and rural drivers must not only pay excessively high premiums, but also run the risk of being injured by an uninsured motorist or becoming the target of a frivolous lawsuit.

While no single reform could hope to remedy all the problems identified in this paper, Auto Choice represents real reform because it addresses the underlying causes. For those who choose it, Auto Choice would eliminate the powerful incentives to inflate medical and wage losses and to engage in unnecessary litigation. Consumers would benefit from substantial premium reductions, with average savings of \$184 per car. Accident victims would also benefit from a system that compensates medical and wage losses more surely and more quickly than today's system.

Auto Choice would particularly benefit low-income and inner-city drivers. Low-income motorists could see their premiums cut by 36 percent and would benefit from a first-party system that more fairly reflects their lower expected economic losses. Residents of inner cities would enjoy significant premium savings as well as see the disparity between city and suburban premiums greatly diminish. Urban areas would further benefit from a reduction in the high cost of living and reduced fiscal strain on government. In addition, by making legal car ownership more affordable, Auto Choice would enhance the ability of poor, inner-city workers to find and maintain better-paying jobs.

Finally, Auto Choice has the added appeal of achieving these benefits without an expensive government program or burdensome regulations. Indeed, it seems that as the auto insurance system worsens with respect to cost and injury compensation, increased government intervention is frequently offered as a solution, including mandated rate-rollbacks, harsher penalties for uninsured drivers, and subsidization of urban premiums by suburban drivers. Rather than expanding the role of government, Auto Choice relies on market forces to offer all consumers a more effective and less costly way to compensate auto injuries. Moreover, by addressing the problems that afflict all motorists, Auto Choice generates numerous benefits that specifically accrue to low-income and inner-city families.

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### **BIBLIOGRAPHY**

- Abrahamse, Allan F. and Stephen J. Carroll. *The Effects of a Choice Automobile Insurance Plan Under Consideration by the Joint Economic Committee of the United States Congress*. Santa Monica, CA: RAND, 1997.
- Abrahamse, Allan F. and Stephen J. Carroll. *The Effects of a Choice Auto Insurance Plan on Insurance Costs.* Santa Monica, CA: RAND, 1995.
- Berte, Marjorie M. *Hit Me I Need the Money!* San Francisco, CA: ICS Press, 1991.
- Browne, Mark J. and Robert Puelz. "Statutory Rules, Attorney Involvement, and Automobile Liability Claims." *Journal of Risk and Insurance* 63, no. 1 (March 1996): 77-94.
- California Department of Insurance. 1996 Automobile Premium Survey. 1997. Online at http://www.insurance.ca.gov/sab/autosurvey.html.
- Carroll, Stephen J. and Allan F. Abrahamse. *The Effects of a Choice Automobile Insurance Plan on Insurance Costs and Compensation: An Updated Analysis*. Santa Monica, CA: RAND, forthcoming 1998.
- Carroll, Stephen, Allan Abrahamse, and Mary Vaiana. *The Costs of Excess Medical Claims for Automobile Personal Injuries*. Santa Monica, CA: RAND Institute for Civil Justice, 1995.
- Carroll, Stephen J., James S. Kakalik, Nicholas M. Pace, and John L. Adams. *No-Fault Approaches to Compensating People Injured in Automobile Accidents*. Santa Monica, CA: RAND, 1991.
- Conning & Co. Data provided to the Joint Economic Committee. Hartford, CT: Conning & Co., 1/16/97.
- Council of Economic Advisers. *Economic Report of the President*. Washington, DC: Government Printing Office, 1998.
- Crotty, Paul A. "Shutting Off the Money Faucet." Citylaw 2, no. 6 (December 1996): 125-129.
- Dornstein, Ken. *Accidentally, on Purpose: The Making of a Personal Injury Underworld in America*. New York, NY: St. Martin's Press, 1996.
- Fleming, John G. "The Collateral Source Rule and Loss Allocation in Tort Law." *California Law Review* 54, no. 4 (October 1966): 1478-1549.
- Giuliani, Rudolph. Statement submitted to the Senate Committee on Commerce, Science and Transportation, Congress of the United States. 9/24/96.
- Heilbroner, Robert L. "Halfway to the Moon on Wheels." *Petroleum Today* (Spring 1960): 1-3. Quoted in John B. Rae, *The Road and the Car in American Life* (Cambridge, MA: MIT Press, 1971), 370.
- Highway Loss Data Institute. *Atlas of Automobile Injury and Collision Losses In Large Metropolitan Areas*. Arlington, VA: Highway Loss Data Institute, 1995.
- Holzer, Harry J., Keith R. Ihlanfeldt, and David L. Sjoquist. "Work, Search, and Travel among White and Black Youth." *Journal of Urban Economics* 35, no. 3 (May 1994): 320-345.
- Huebner, S.S., Kenneth Black, Jr. and Bernard L. Webb. *Property and Liability Insurance*. 4<sup>th</sup> ed. Upper Saddle River, NJ: Prentice Hall, 1996.
- Ihlanfeldt, Keith R. "Intra-Urban Job Accessibility and Hispanic Youth Employment Rates." *Journal of Urban Economics* 33, no. 2 (March 1993): 254-271.
- Ihlanfeldt, Keith R. and Madelyn V. Young. "The Spatial Distribution of Black Employment Between the Central City and the Suburbs." *Economic Inquiry* 34, no. 4 (October 1996): 693-707.
- Insurance Information Institute. Data provided to the Joint Economic Committee. New York, NY: Insurance Information Institute, 4/30/97.
- Insurance Information Institute. *The Fact Book Property/Casualty Insurance Facts*. New York, New York: Insurance Information Institute, annual.
- Insurance News Network. "States." Online at http://www.insure.com/states/.
- Insurance Research Council. *Fraud and Buildup in Auto Injury Claims*. Wheaton, IL: Insurance Research Council, 1996.
- Insurance Research Council. *Trends in Auto Injury Claims*. 2<sup>nd</sup> ed. Wheaton, IL: Insurance Research Council, 1995.

- Insurance Research Council. *Auto Injuries: Claiming Behavior and Its Impact on Insurance Costs.* Oak Brook, IL: Insurance Research Council, 1994.
- Insurance Research Council. *Paying for Auto Injuries: A Consumer Panel Survey of Auto Accident Victims*. Oak Brook, IL: Insurance Research Council, 1994.
- Insurance Research Council. *Public Attitude Monitor 1993*. Oak Brook, IL: Insurance Research Council, 1993.
- Insurance Research Council. *Automobile Injury Claims in Hawaii*. Oak Brook, IL: Insurance Research Council, 1991.
- Insurance Services Office, Inc. and National Association of Independent Insurers. "Factors Affecting Urban Auto Insurance Costs." New York, NY: Insurance Services Office, Inc., 1988.
- Joint Economic Committee, Congress of the United States. *The Benefits and Savings of Auto Choice*. 1997.
- Joint Economic Committee, Congress of the United States. *Improving the American Legal System: The Economic Benefits of Tort Reform.* 1996.
- Kain, John F. "The Spatial Mismatch Hypothesis: Three Decades Later." *Housing Policy Debate* 3, no. 2 (1992): 371-460.
- Kain, John F. "Housing Segregation, Negro Employment, and Metropolitan Decentralization." *Quarterly Journal of Economics* 82, no. 2 (May 1968): 175-197.
- Kain, John F. and John R. Meyer. "Transportation and Poverty." *The Public Interest* 18 (Winter 1970): 75-87.
- Kasarda, John D. "Industrial Restructuring and the Changing Location of Jobs." In *State of the Union: America in the 1990s, Volume I: Economic Trends*, edited by Reynolds Farley, 215-267. New York, NY: Russell Sage Foundation, 1995.
- Kasarda, John D. and Kwok-fai Ting. "Joblessness and Poverty in America's Central Cities: Causes and Policy Prescriptions." *Housing Policy Debate* 7, no. 2 (1996): 387-419.
- Klein, Robert. "Reducing Urban Auto Insurance Costs." In Affordable Auto Insurance for Urban Communities: The Universe of Possibilities, 1995 Conference Proceedings, Milwaukee, Wisconsin May 12-13 and Baltimore, Maryland December 7-8, edited Guila P. Parker and James L. Brown. Milwaukee, WI: Center for Consumer Affairs, 1995.
- Lamberty, Steve. "Urban and Non-Urban Auto Insurance Comparisons." *NAIC Research Quarterly* 1, no. 4 (October 1995): 14-19.
- MacManus, Susan A. and Patricia A. Turner. "Litigation as a Budgetary Constraint: Problem Areas and Costs." *Public Administration Review* 53, no. 5 (September/October 1993): 462-472.
- Maril, Robert Lee. "The Impact of Mandatory Auto Insurance Upon Low Income Residents of Maricopa County, Arizona." Unpublished manuscript, 1993.
- Marter, Sarah S. and Herbert I. Weisberg. "Medical Expenses and the Massachusetts Automobile Tort Reform Law: A First Review of 1989 Bodily Injury Liability Claims," *Journal of Insurance Regulation* 10, no. 4 (Summer 1992): 462-514.
- Mooney, Sean F. "The Cost of Urban Auto Insurance." New York, NY: Insurance Information Institute, 1992.
- National Association of Independent Insurers. Data provided to the Joint Economic Committee from the NAII Auto Compilation. Des Plaines, IL: National Association of Independent Insurers, 1/17/97.
- National Association of Insurance Commissioners. *State Average Expenditures & Premiums for Personal Automobile Insurance*. Kansas City, MO: National Association of Insurance Commissioners, annual.
- New Jersey Department of Insurance. 1995 Automobile Insurance Premium Comparison Survey. Trenton, NJ: New Jersey Department of Insurance, 1995.
- O'Connell, Jeffrey, Stephen Carroll, Michael Horowitz, Allan Abrahamse, and Paul Jamieson. "The Comparative Costs of Allowing Consumer Choice for Auto Insurance in All Fifty States." Maryland Law Review 55, no. 1 (1996): 160-222.

- O'Connell, Jeffrey, Stephen Carroll, Michael Horowitz, Allan Abrahamse, and Daniel Kaiser. "The Costs of Consumer Choice for Auto Insurance in States without No-Fault Insurance." *Maryland Law Review* 54, no. 2 (1995): 281-351.
- O'Connell, Jeffrey, Stephen Carroll, Michael Horowitz, and Allan Abrahamse. "Consumer Choice in the Auto Insurance Market." *Maryland Law Review* 52, no. 4 (1993): 1016-1062.
- O'Regan, Katherine M. and John M. Quigley. "Teenage Employment and the Spatial Isolation of Minority and Poverty Households Comment." *Journal of Human Resources* 31, no. 3 (Summer 1996): 692-702.
- Office of Management and Budget. *Budget of the United States Government, Fiscal Year 1998*. Washington, DC: Government Printing Office, 1998.
- Ong, Paul M. "Work and Automobile Ownership Among Welfare Recipients." *Social Work Research* 20, no. 4 (December 1996): 255-262.
- Pennsylvania Department of Insurance. Harrisburg, PA: 1995. Cited in Insurance News Network, "Pennsylvania Auto Insurance Premiums" (1997), online at http://www.insure.com/states/pa/.
- Pawasarat, John. "Initial Findings on Mobility and Employment of Public Assistance Recipients in Milwaukee County and Factors Relating to Changes in W-2 Regions Over Time." University of Wisconsin Milwaukee, Employment and Training Institute, 1997. Online at http://www.uwm.edu/dept/eti/afdcmobl.htm.
- Pritchard, Tim and Larry DeBoer. "The Effect of Taxes and Insurance Costs on Automobile Registrations in the United States." *Public Finance Quarterly* 23, no. 3 (July 1995): 283-304.
- Smith, Eric and Randall Wright. "Why Is Automobile Insurance in Philadelphia So Damn Expensive?" *American Economic Review* 82, no. 4 (September 1992): 756-772.
- State of California, Governor's Commission on the Los Angeles Riots. *Violence in the City An End or a Beginning?* Los Angeles, CA: State of California, 1965.
- Taylor, Brian D. and Paul M. Ong. "Spatial Mismatch or Automobile Mismatch? An Examination of Race, Residence and Commuting in US Metropolitan Areas." *Urban Studies* 32, no. 9 (1995): 1453-1473.
- Tobias, Andrew. Testimony to the Senate Committee on Commerce, Science and Transportation, Congress of the United States. 7/17/97.
- U.S. Bureau of the Census. *Government Finances: 1991-92*. Series GF/92-5. Washington, DC: Government Printing Office, 1996.
- U.S. Bureau of the Census. *Asset Ownership of Households: 1993*. Washington, DC: Government Printing Office, 1995.
- U.S. Department of Energy, Energy Information Administration. *Household Vehicles Energy Consumption 1991*. DOE/EIA-0464. Washington, DC: Government Printing Office, 1993.
- U.S. Department of Justice, Bureau of Justice Statistics. *Civil Jury Cases and Verdicts in Large Counties*. NCJ-154346. Washington, DC: Bureau of Justice Statistics, 1995.
- U.S. Department of Justice, Bureau of Justice Statistics. *Tort Cases in Large Counties*. NCJ-153177. Washington, DC: Bureau of Justice Statistics, 1995.
- U.S. Department of Justice, Bureau of Justice Statistics. "Civil Justice Survey of State Courts, 1992." Available online at the University of Michigan's Inter-university Consortium for Political and Social Research, http://www.icpsr.umich.edu/index.html.
- U.S. Department of Justice, Federal Bureau of Investigation. Press Release. Washington, DC: Federal Bureau of Investigation, 5/24/95.
- U.S. Department of Labor, Bureau of Labor Statistics. "Consumer Prices Indexes." 1998. Online at http://stats.bls.gov/cpihome.htm
- U.S. Department of Labor, Bureau of Labor Statistics. "1995 Consumer Expenditure Survey." 1997. Online at http://stats.bls.gov/blshome.html.
- U.S. Department of Labor, Bureau of Labor Statistics. Unpublished data from the "1995 Consumer Expenditure Survey." Washington, DC: Bureau of Labor Statistics, 1997.

- U.S. Department of Labor, Employment and Training Administration. "ETA Press Release: Labor Secretary Herman Kicks-Off Nationwide Welfare-to-Work Tour." Washington, DC: Employment and Training Administration, 11/17/97.
- U.S. Department of Transportation, Federal Highway Administration. *Highway Statistics 1995*. Washington, DC: Government Printing Office, 1996.
- U.S. Department of Transportation, Federal Highway Administration. *Cost of Owning & Operating Automobiles, Vans & Light Trucks 1991*. FHWA-PL-92-019. Washington, DC: Federal Highway Administration, 1992.
- U.S. Department of Transportation, National Highway Traffic Safety Administration. *The Economic Cost of Motor Vehicle Crashes*, 1994. By Lawrence J. Blincoe. DOT HS 808-425. Washington, DC: Government Printing Office, 1996.
- U.S. Department of Transportation, National Highway Traffic Safety Administration. *Rural and Urban Crashes: A Comparative Analysis*. DOT HS 808-450. Washington, DC: National Highway Traffic Safety Administration, 1996.
- U.S. Department of Transportation, National Highway Transportation Safety Administration. Saving

  Lives and Dollars Highway Safety Contribution to Health Care Reform and Deficit Reduction.

  Washington, DC: Government Printing Office, 1993.
- U.S. Department of Transportation, National Highway Transportation Safety Administration. *The Economic Cost of Motor Vehicle Crashes, 1990.* By Lawrence J. Blincoe and Barbara M. Faigin. DOT HS 807-876. Washington, DC: Government Printing Office, 1992.
- U.S. Department of Transportation, National Highway Traffic Safety Administration. *Source of Payment for the Medical Cost of Motor Vehicle Injuries in the United States*. By Joan S. Harris. DOT HS 807-800. Washington, DC: Government Printing Office, 1992.
- U.S. General Accounting Office. Welfare to Work: Most AFDC Training Programs Not Emphasizing Job Placement. HEHS-95-113. Washington, DC: General Accounting Office, 1995.
- Whitman, Christine Todd. Testimony to the Joint Economic Committee, Congress of the United States. 3/19/97.
- Wilson, William Julius. When Work Disappears. New York: Vintage Books, 1996.
- Wolfram, Charles W. Modern Legal Ethics. St. Paul, MN: West Publishing Co., 1986.