

# Impact of State Firearms Laws and Regulations on Controlling Firearms Trafficking

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This presentation reports on the results of an NIJ funded project (Pierce, Braga and Wintemute, 2011) designed to enhance our understanding of illegal firearms markets. The study had two major components. The first component drew on a national set of ATF firearms trace data acquired and developed in a NIJ funded RAND study (Ridgeway et. al, 2008). These data were obtained for all firearms recovered by law enforcement for the period of January 2003 through most of 2006. The nationwide scope of these data enabled us to examine the impact of a set of state firearms laws and regulations on potential firearms trafficking. The second, component of the study was designed to extend our ability to trace firearms beyond standard ATF tracing procedures that most typically end with the first-time retailer sale of the firearm. This presentation reviews the finding of the first component.

The research carried out in this report suggests that state-level laws backed up by a strong commitment to regulate firearms dealers can reduce the ease through which criminals illegally divert firearms from legal commerce. The stringency of state-level firearms laws and regulations on primary and secondary firearms sales and, in the case of California, the regular enforcement of state regulations leads to consistently longer time-to-crime for firearms from gun dealers located within their jurisdictions, and consistently higher rates of traced firearms. The analyses also suggests that California enforcement of state laws and regulations through routine dealer inspections and the ongoing analysis of automated records on firearm transactions for suspicious sales and purchase patterns further reduced time-to-crime of recovered crime guns originating from in-state dealers.

Our research also compared illegal firearm market characteristics using information from ATF trace data relative to illegal firearms market characteristics using enhanced trace data that was updated with information from matched California DROS data. This latter data source provides information on the last known purchaser of a firearm recovered by law enforcement. Our comparison revealed that including information on the last known purchaser of a firearm significantly reduced the median time-to-crime of California-sourced crime guns relative to time-to-crime calculations based on standard ATF trace data. This finding reveals that guns sometimes move very rapidly from subsequent market transactions to use in crime. These enhanced firearm trace data can be very useful in guiding law enforcement actions against gun traffickers and criminals directly acquiring firearms through secondary market sources.

States with lax gun laws and high rates of gun violence could impact the flow of recently purchased firearms to criminals by enacting more stringent purchase and sales laws, tracking all primary and secondary firearms transactions, and more closely regulating licensed firearms dealers. Increasing the number of states with more stringent gun controls would also have the desirable effect of reducing the export of newer guns to criminals in tighter gun control states. Of course, criminals in states with newly adopted gun controls can find ways to substitute other sources of guns such as theft from residences or making connections to gun traffickers operating in nearby lax-gun-law states. However, by raising the effective price of acquiring guns, criminals would have to economize on gun possession and use that would hopefully translate into reduced violent gun offending.

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<sup>1</sup> This research brief is based on an NIJ funded study (Pierce, Braga, & Wintemute, 2011).

# The Impact of State Firearm Laws and Regulations on Controlling Firearm Trafficking

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REDUCING GUN VIOLENCE: LESSONS FROM RESEARCH AND PRACTICE  
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# NIJ Funded Research

- Principal Investigators
  - Glenn Pierce, Northeastern University
  - Anthony Braga, Rutgers University and Harvard University
  - Garen Wintemute, University of California, Davis
- Two components
  - National study of illegal firearm markets using ATF firearm trace data for all firearms recovered by law enforcement (2003 – 2006)
  - Research designed to extend our ability to trace firearms beyond standard ATF tracing procedures using California DROS data

# Nation-wide study of the impact of state laws and regulations on firearm trafficking

1. The analysis focused on time-to-crime (TTC) of firearms recovered by law enforcement
  - ATF considers this a key indicator of illegal firearms transfers
  - Researchers have consistently documented a disproportionate representation of newer guns among firearms recovered by police
  - More recently, Braga and colleagues have found that the age distribution of recovered crime guns is significantly different (i.e., younger) than the age distribution of guns held by private owners and the age distribution of firearms manufactured and imported the United States
2. The TTC of gun traces was examined across four types of state firearms legal contexts
  - States with *no* firearm purchase or registration laws (36 states)
  - States with a firearm purchase *or* registration laws (7 states)
  - States with both purchase *and* registration laws (6 states)
  - California

# Nation-wide study of the impact on TTC.

3. The impact of state firearm law was examined in terms of the state in which a firearm was sold (not the recovery state)
  - state laws should have a similar effect independent of whether a recovered firearms *originated* from an in-state or out-of-state dealer
4. The research reported here presents summary results.
  - It should be noted however, that the study's full analysis included 16 additional potential determinants of TTC, and the effects of guns laws on TTC remained or was mediated in a manner consistent with hypothesized expectations
5. Next, Table 1 examines the distribution of TTC for recovered firearms for recovered firearms,
  - across each of the four state gun law contexts
  - for in- and out-of-state sales

Table 1  
Distribution of TTC of Traced Firearms by the State Gun Laws Where Firearms Were Sold for Purchasers and Possessors Who Are Not the Same Individual (Recoveries 2003 to 2006)

1. In-State Sales TTC by State of Sale Gun Laws

Time-to-Crime	No Purchase or Reg. Law	Has Purchase or Reg. Laws	Has Purchase and Reg. Laws	California	Total
<b>% 1 to 3 yrs</b>	<b>34.2</b>	<b>26.8</b>	<b>20.3</b>	<b>12.7</b>	30.8
% 4 to 6 yrs	18.4	18.1	15.4	12.3	22.7
% 7 to 10 yrs	18.3	21.4	19.6	18.5	23.1
% 11 + yrs	29.2	33.7	44.7	56.5	23.4
Total %	100.0	100.0	100.0	100.0	100.0
Tot. Traces	111,898	22,984	7,011	11,665	153,558

2. Out-of-State TTC Sales by State of Sale Gun Laws

% Time-to-Crime	No Purchase or Reg. Law	Has Purchase or Reg. Laws	Has Purchase and Reg. Laws	California	Total
<b>% 1 to 3 yrs</b>	<b>20.3</b>	<b>17.4</b>	<b>9.5</b>	<b>6.5</b>	18.9
% 4 to 6 yrs	17.1	17.2	11.7	9.6	21.7
% 7 to 10 yrs	20.5	22.3	17.6	16.6	26.6
% 11 + yrs	42.0	43.0	61.2	67.3	32.7
Total %	100.0	100.0	100.0	100.0	100.0
Tot. Traces	59,864	8,106	2,759	3,728	74,457

# State Law Potential Effect on TTC and Traced Gun Rates.

1. To refine our understanding we examined the rate of traced firearms per 100,000 (gun owners)
  - Traced gun rates by on state residential population would artificially reduce the rates of states with less stringent laws because they generally have smaller populations of gun owners.
  - Estimated number of gun owners in states were derived from BRFSS 2001 survey of 200,000 US households
2. In Table 2 the rate of traced firearms per 100,000 gun owners was examined,
  - across each of the four state gun law contexts
  - for in- and out-of-state sales
  - for short and longer TTC traced guns

Table 2  
Gun Traces per 100,000 Gun Owners by the State Gun Laws Where Firearms Were Purchased for Purchasers and Possessors Who Are Not the Same Individual (Recoveries 2003 to 2006)

1. In-State Gun Trace Rate by State of Sale Gun Laws

Time-to-Crime	No Purchase or Reg. Law	Has Purchase or Reg. Laws	Has Purchase and Reg. Laws	California	Total
<b>1 to 3 yrs</b>	<b>65.8</b>	<b>47.9</b>	<b>15.0</b>	<b>21.1</b>	54.1
4 to 6 yrs	35.4	32.4	11.4	20.4	31.1
7 to 10 yrs	35.2	38.2	14.5	30.7	33.0
11 + yrs	<b>56.2</b>	<b>60.1</b>	<b>33.1</b>	<b>93.7</b>	57.3
Tot. in-state rate	192.6	178.5	74.0	165.9	175.5

2. Out-of-State Sales Gun Trace Rate by State of Sale Gun Laws

Time-to-Crime	No Purchase or Reg. Law	Has Purchase or Reg. Laws	Has Purchase and Reg. Laws	California	Total
<b>1 to 3 yrs</b>	<b>20.9</b>	<b>11.0</b>	<b>2.8</b>	<b>3.4</b>	16.1
4 to 6 yrs	17.7	10.9	3.4	5.1	14.1
7 to 10 yrs	21.1	14.1	5.1	8.8	17.4
11 + yrs	43.3	27.1	17.8	35.7	37.6
Tot. out-of-state rate	103.0	63.0	29.1	53.0	85.1
Gun Owner Population	58,095,663	12,872,898	9,472,213	7,031,819	87,472,593



# Policy Implications

1. The research carried out in this study suggests that state-level laws backed up by a strong commitment to regulate firearms dealers can reduce the ease through which criminals illegally divert firearms from legal commerce.
2. The stringency of state-level firearms laws and regulations on primary and secondary firearms sales and, in the case of California, the regular enforcement of state regulations leads to consistently longer time-to-crime for firearms from gun dealers located within their jurisdictions, and consistently lower rates of traced firearms.
3. The analyses from the second component of this study found that enhanced firearm trace data to a last known purchaser, using California DROS data, can be very useful in guiding law enforcement actions against gun traffickers and criminals directly acquiring firearms through secondary market sources.