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The decline in robbery and theft: Inter-state comparisons

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Aim: *To describe and discuss inter-jurisdictional trends in police-recorded robbery and theft offences.*

Method: *Rates of recorded robbery and theft per head of population are calculated for each Australian jurisdiction from 1994/1995 to 2012. Rates of recorded robbery are disaggregated into armed and unarmed robbery. Rates of recorded theft are disaggregated into burglary, motor vehicle theft and other theft.*

Results: *In most jurisdictions, trends in recorded robbery and theft offences rose during the late 1990s, peaked around 2001 and then fell from 2001 to 2012. Between 2001 and 2009, recorded rates of robbery offences in Australia fell by 49.1 per cent, recorded rates of burglary fell by 57.3 per cent, recorded rates of motor vehicle theft fell by 62.2 per cent and recorded rates of other theft fell by 39.3 per cent.*

Conclusion: *The national decline in robbery and theft offences is partly due to a reduction in heroin use and partly due to improvements in the economy but other factors are likely to have also played a role. Research into the causes of the fall in crime is hampered by the absence of any regional breakdown in national recorded crime statistics.*

Keywords: *robbery, burglary, motor vehicle theft, crime drop, Australia, heroin, economy, criminal justice*

Introduction

A growing percentage of the New South Wales (NSW) public believe that property crime is in decline (Snowball and Jones 2012)—and it is. The overall rate of theft in NSW is now less than half what it was in 2000. The NSW robbery rate has fallen even further. It is less than a third of what it was in 2000. Many people in NSW, however, probably do not realise that most Australian States and Territories have experienced significant falls in theft and robbery offences over the last 12 years.

In this report we describe trends in theft and robbery offences in each Australian State and Territory, consider possible explanations for their decline and then suggest changes to the national crime statistics that would allow us to test these explanations.

It is important to note before we begin that, although trends in police-recorded theft and robbery provide a fair guide to actual trends in theft and robbery, a significant percentage of thefts and robberies are not reported to police. As a result, recorded crime data do not provide an accurate indication of the true prevalence of crime (for more details on the strengths and weaknesses of recorded crime data see Weatherburn 2011). Readers interested in making interstate comparisons of crime victimisation risks should consult the Australian Bureau of Statistics (ABS) crime victimisation reports (e.g. ABS 2012a).

Data, definitions and method

The data presented in this report were obtained from the ABS by way of a special data request. Changes in ABS offence definitions and counting rules produced a break in the ABS recorded crime series between 2009 and 2010. For this reason rates of theft and robbery before and after 2009 cannot be compared. Changes in rates of crime between 2001 (the peak year for most offences) and 2009 were calculated by the authors but graphs are also presented showing the trend in recorded crime between 2000 and 2012. In most instances the change in definitions and counting rules does not appear to have materially affected the trends after 2009.

The national trends

Figure 1 shows the national trend in recorded rates of armed robbery, unarmed robbery and total robberies between 1994 and 2012. The general pattern is one of increasing rates up until 2001 and decreasing rates thereafter. Between 2001 and 2009, the recorded rate of (total) robbery declined by 49.1 per cent or an average of 8.1 per cent per annum. The downward trend continued between 2010 and 2012 for armed robbery.

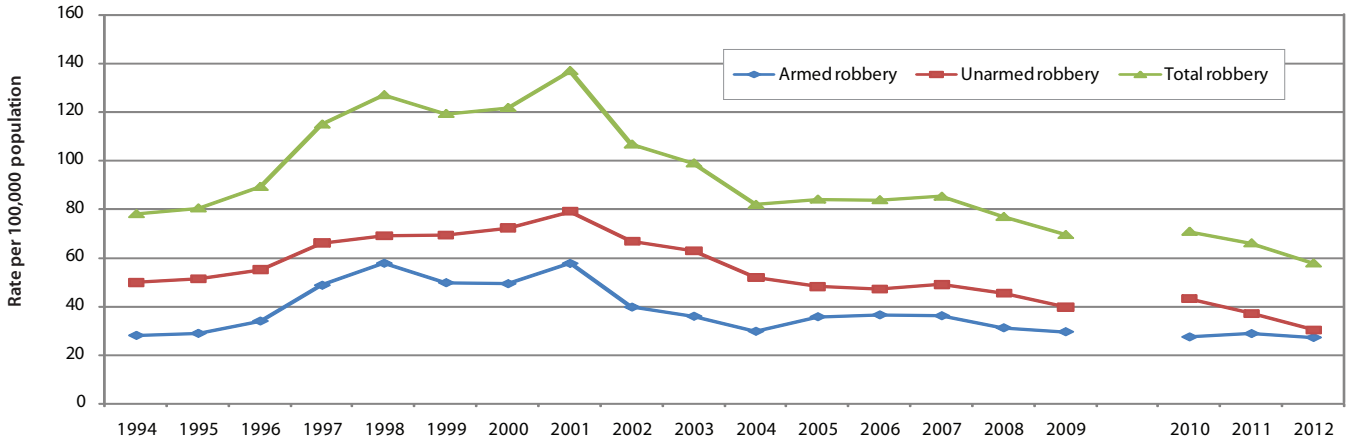
Figure 2 shows the national trend in recorded rates of burglary (referred to in ABS publications as 'unlawful entry with intent' or 'UEWI'), motor vehicle theft and other theft [1] between 1995 and 2012 (national data for these offences did not become available until 1995). Burglary and motor vehicle theft do not show the steep rise in the 1990s exhibited by robbery but do show the same rapid fall after 2001. The pattern for other theft is similar to that of robbery; with the rate rising during the late 1990s, peaking in 2001 and falling thereafter.

Between 2001 and 2009, the recorded rate of burglary declined by 57.3 per cent (average: 10.1% per annum). The recorded rate of motor vehicle theft declined by 62.2 per cent (average: 11.4% per annum), while the recorded rate of other theft declined by 39.3 per cent (average: 6.1% per annum).

Jurisdictional trends in robbery

In this section we compare trends within each State and Territory in recorded rates of robbery. Because armed and unarmed robbery exhibit similar trends (see Figure 1) they have been combined into one category. Figure 3 shows the trend since 1994 in recorded rates of robbery in each Australian State and Territory. In all jurisdictions other than Tasmania (TAS) and the Northern Territory (NT), robbery rates rose in the 1990s and then began to decline. In Tasmania and the Northern Territory robbery rates increased.

Figure 1. Australian trends in recorded rates of armed robbery, unarmed robbery and total robbery (1994-2012)



Source: Australian Bureau of Statistics (2013, unpublished data)

Figure 2. Australian trends in recorded rates of burglary, motor vehicle theft and other theft (1995-2012)

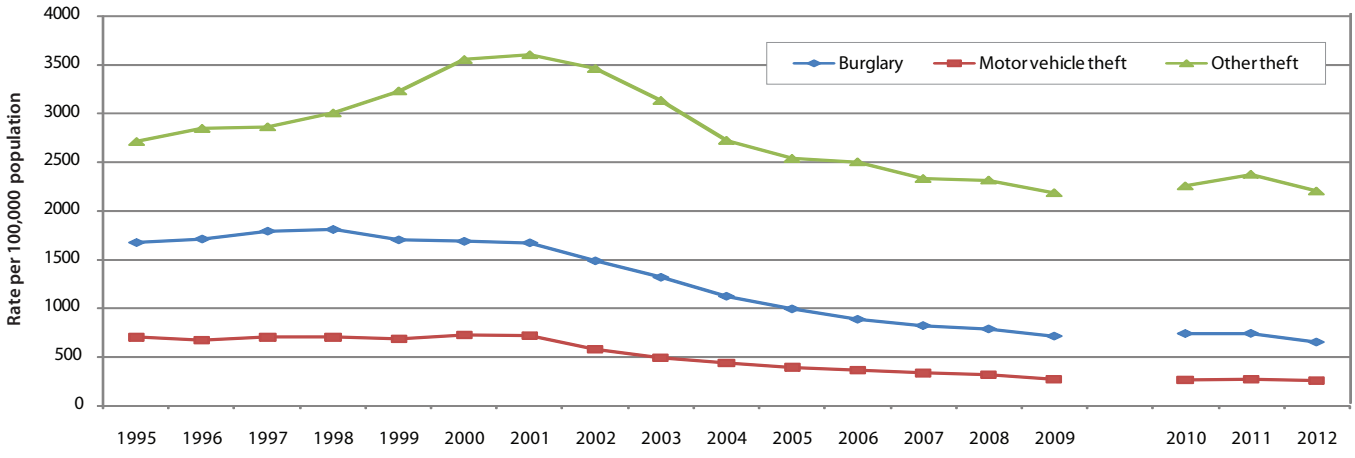


Table 1 shows the percentage change and average annual percentage change in recorded rates of robbery for each State and Territory (and for Australia) between 2001 and 2009.

Table 1. Changes in robbery by jurisdiction

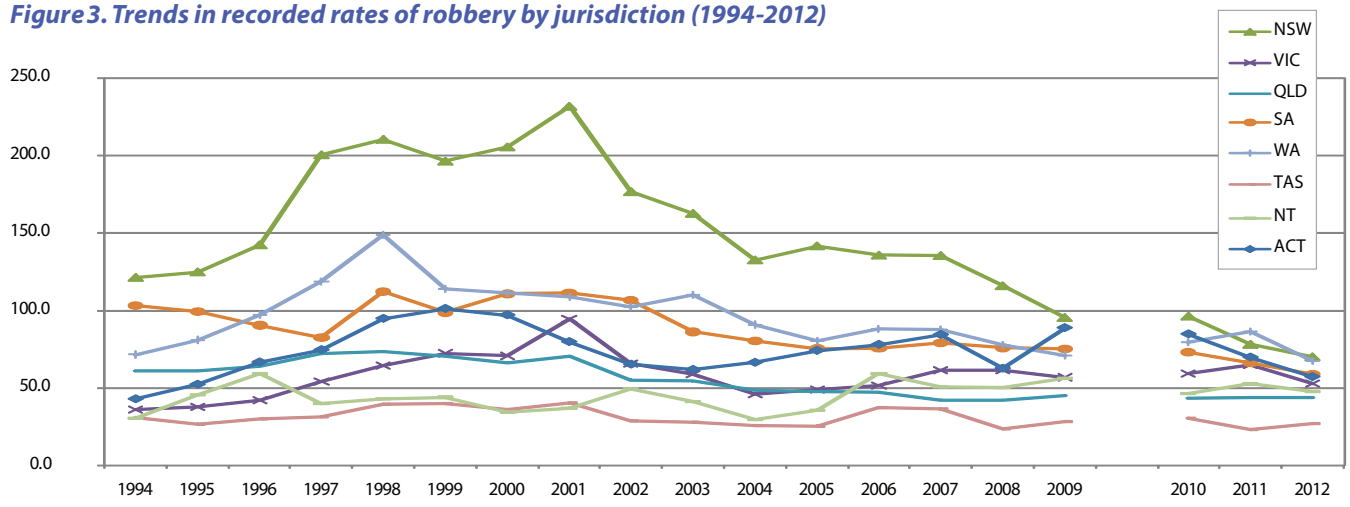
Jurisdiction	% change 2001-2009	average annual % change 2001-2009
NT	53.0	5.5
ACT	11.3	1.3
TAS	-29.7	-4.3
SA	-32.4	-4.8
WA	-34.6	-5.2
QLD	-35.7	-5.4
VIC	-39.8	-6.1
Australia	-49.1	-8.1
NSW	-58.9	-10.5

Over this period recorded rates of robbery increased by 53 per cent in the NT (an average of 5.5% per annum) and by 11.3 per cent in the Australian Capital Territory (ACT) (an average of 1.3% per annum). The States all showed significant falls in the incidence of robbery. New South Wales (NSW) showed the most substantial fall in robbery (down 58.9% or an average of 10.5% per annum) but falls in excess of 30 per cent occurred in South Australia (SA), Western Australia (WA), Queensland (QLD) and Victoria (VIC).

Jurisdictional trends in burglary

Figure 4 shows the trend in burglary by jurisdiction between 1995 and 2012. All jurisdictions show clear reductions in burglary from 2000 or 2001 onwards. Notice that, whereas recorded rates of robbery rose across almost all of Australia during the late 1990s, recorded burglary rates during the 1990s rose in some jurisdictions (e.g. ACT, NSW), fell in some (e.g. WA, NT) and remained stable in others (e.g. VIC, QLD).

Figure 3. Trends in recorded rates of robbery by jurisdiction (1994-2012)



Source: Australian Bureau of Statistics (2013, unpublished data)

Figure 4. Trends in recorded burglary rates by jurisdiction (1995-2012)

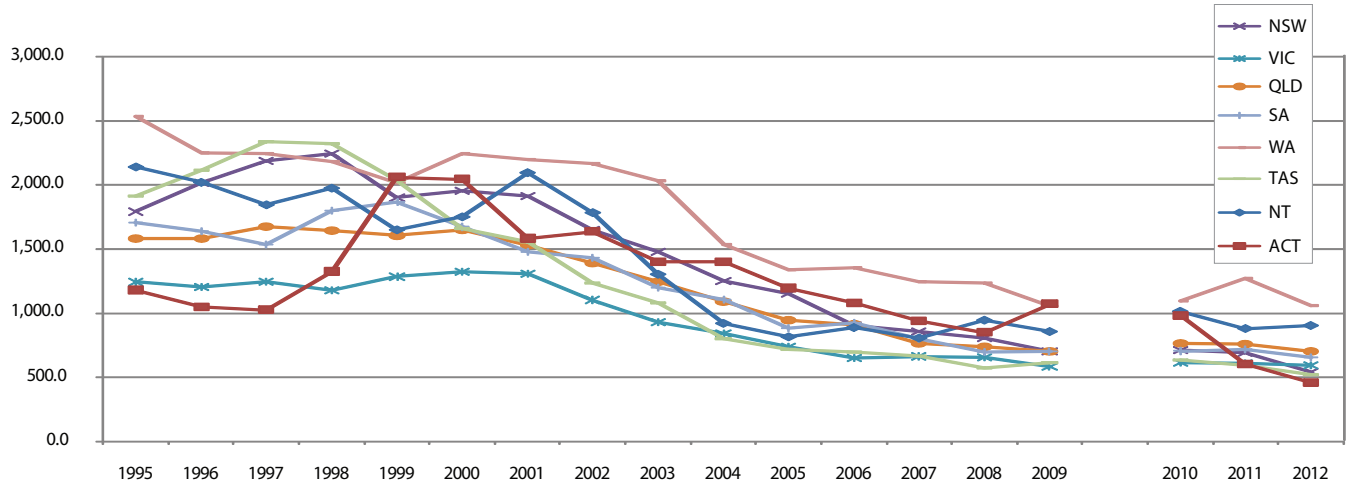


Table 2 shows the percentage change and average annual percentage change in recorded rates of burglary in each State and Territory (and for Australia) between 2001 and 2009.

Table 2. Changes in burglary by jurisdiction

Jurisdiction	% change 2001-2009	average annual % change 2001-2009
ACT	-32.3	-4.8
WA	-52.1	-8.8
SA	-52.4	-8.9
QLD	-54.1	-9.3
VIC	-55.4	-9.6
Australia	-57.3	-10.1
NT	-59.1	-10.6
TAS	-60.6	-11.0
NSW	-63.4	-11.8

Table 3. Changes in motor vehicle theft by jurisdiction

Jurisdiction	% change 2001-2009	average annual % change 2001-2009
NT	-26.9	-3.8
ACT	-27.2	-3.9
WA	-51.6	-8.7
NSW	-60.3	-10.9
QLD	-60.9	-11.1
TAS	-61.0	-11.1
Australia	-62.2	-11.4
SA	-62.5	-11.5
VIC	-70.1	-14.0

All jurisdictions recorded a substantial decline in recorded rates of burglary from 2001 to 2009. NSW showed the largest decline (down 63.4% or an average of 11.8% per annum). The smallest decline occurred in the ACT (down 32.3% or an average of 4.8% per annum). All jurisdictions other than the ACT experienced declines in the burglary rate of more than 50 per cent.

Jurisdictional trends in motor vehicle theft

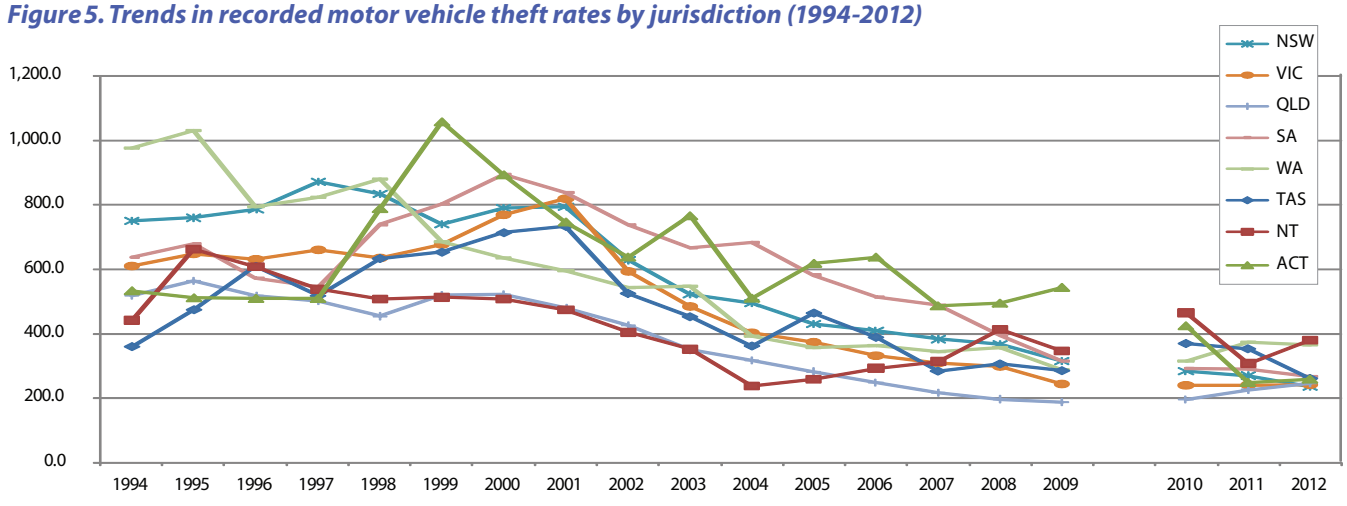
Figure 5 shows the trend in motor vehicle theft between 1994 and 2012. Once again, all jurisdictions showed a marked decline from 2001 onwards. The trend for ACT is quite unusual. Motor vehicle theft rates in that jurisdiction were fairly stable between 1994 and 1997. Between 1997 and 1999, however, the recorded rate of motor vehicle theft more than doubled. Over the next three years it fell back almost as far as it had risen between 1997 and 1999.

Table 3 shows the percentage change and average annual percentage change in recorded rates of motor vehicle theft in each State and Territory (and for Australia) between 2001 and 2009. The largest fall in motor vehicle theft occurred in VIC; where rates fell by more than 70 per cent (or an average of 14% per annum). The smallest falls occurred in the ACT (down 27.2% or 3.9% per annum) and the NT (down 26.9% or 3.8% per annum).

Jurisdictional trends in other theft

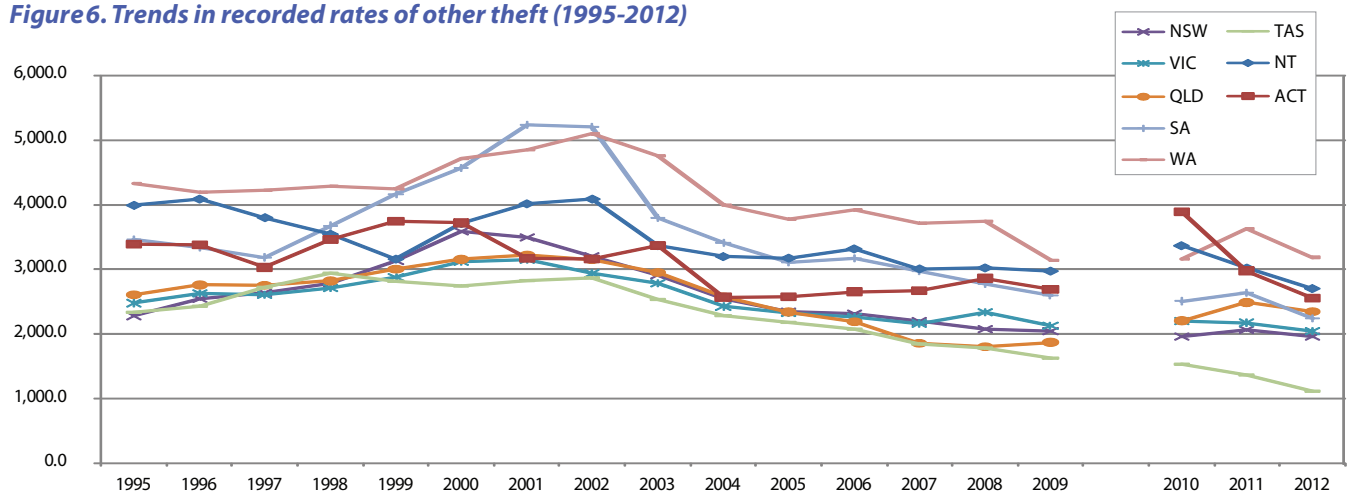
Figure 6 shows the trend in other theft between 1995 and 2012. All jurisdictions except the ACT show a decline after 2001 or 2002. In the ACT the decline did not occur until 2003. Several jurisdictions (WA, SA, QLD, VIC, NSW) show the characteristic 'hump' pattern seen in connection with robbery (i.e. rising rates during the late 1990s and falling rates after 2001-2003).

Figure 5. Trends in recorded motor vehicle theft rates by jurisdiction (1994-2012)



Source: Australian Bureau of Statistics (2013, unpublished data)

Figure 6. Trends in recorded rates of other theft (1995-2012)



Source: Australian Bureau of Statistics (2013, unpublished data)

Table 4. Changes in other theft by jurisdiction

Jurisdiction	% change 2001-2009	average annual % change 2001-2009
ACT	-15.3	-2.1
NT	-26.0	-3.7
VIC	-32.6	-4.8
WA	-35.3	-5.3
Australia	-39.3	-6.1
NSW	-41.5	-6.5
QLD	-42.0	-6.6
TAS	-42.4	-6.7
SA	-50.5	-8.4

Table 4 shows the percentage change and average annual percentage change in recorded rates of other theft. The largest fall in this category of offence occurred in SA (down 50.5% or an average of 8.4% per annum). Falls of over 40 per cent occurred in TAS, QLD and NSW. The smallest fall occurred in the ACT (down 15.3% or an average of 2.1% per annum).

Discussion

The data presented above show that, from around 2001 onwards, most Australian States and Territories began experiencing remarkable falls in rates of robbery, burglary, motor vehicle theft and other theft. What might account for these falls? This is an issue which has received very little research attention outside of New South Wales.

One salient factor is the Australian heroin shortage. It has long been known that dependent heroin users resort to property crime and robbery to fund their purchases of heroin (see, for example, Dobinson & Ward 1995; Dobinson & Ward 1987; Dobinson & Poletti 1989). There is good evidence that increasing the price of heroin reduces demand for the drug (Gallet 2013). Around Christmas 2000, Australia began experiencing an acute heroin shortage (Degenhardt et al. 2004). The shortage greatly increased the price of heroin, not just in NSW but in other States and Territories as well (Degenhardt et al. 2004). Heroin consumption, property crime and robbery began falling in 2001—immediately after the heroin shortage began (Degenhardt 2004; Weatherburn et al. 2003; Moffatt et al. 2005).

Important as it is, the heroin shortage is unlikely to be the only factor contributing to the fall in theft and robbery across Australia. If heroin overdoses and arrests for use and possession of narcotics are any indication, the downward trend in heroin use ceased (i.e. heroin use levelled off) toward the end of 2002. As we have seen, rates of theft and robbery continued falling long after this. Research by the NSW Bureau of Crime Statistics and Research suggests that the downward trend in crime continued in NSW at least in part because average weekly earnings were rising along with the risk of arrest and the proportion of convicted offenders imprisoned (Wan et al. 2012).

These findings sit comfortably with economic theories of crime (Becker, 1968; Ehrlich, 1973) because they suggest that crime rates fall when the rewards associated with legal activity or the costs associated with illegal activity increase. Whether changes in income and the risk of arrest and imprisonment played a role in reducing crime in States and Territories, however, remains unclear. The growth in average weekly earnings may well have played a role because average weekly earnings rose in all States and Territories (ABS 2012b). There are no published data on long term trends in the risk of arrest and imprisonment in jurisdictions other than NSW.

There are a number of other factors that could have helped reduce rates of robbery, burglary, motor vehicle theft and other theft over the last 12 years but which have been the subject of

little, if any, research. These include:

- changes in policing policy/tactics/management;
- changes in the number of people in the peak offender-prone age bracket (16-24 years);
- changes in vehicle, household and private security.

Changes in policing policy, tactics and management are an important consideration because police in some States have increased their focus on repeat offenders and crime 'hotspots' at 'hot times' (e.g. NSW Police 2013). Research has shown that this sort of focussed policing can be very effective in reducing crime (Sherman et al. 2002). Over the last decade or so, NSW (and perhaps other State and Territory Police) have also increased police accountability through management strategies similar to the well-known 'Compstat' strategy introduced in New York. There is some evidence that this may have helped reduce crime in NSW, although whether its effects were transient or long-lasting remains unclear (Chilvers & Weatherburn, 2001).

The age structure of the population is a potentially important consideration because crime is disproportionately committed by young men aged between 16 and 24 and the Australian population is aging. Whether changes in the number of males in the age bracket 16-24 are significant enough to have influenced crime, however, remains unknown. Increases in household, vehicle and private security are potentially important because there is evidence that target hardening and surveillance are effective in reducing crime. Australian use of household, vehicle and private security use has grown rapidly over the last decade (Prenzler, Earle and Sarre, 2009). Once again, however, no studies have been conducted in Australia to measure the effect of any of these factors on crime.

The lack of research into the dramatic fall in crime in Australia is both surprising and disappointing. One of the main impediments to such research is that the data required to test various explanations for the fall is simply not available. The only way to test hypotheses about changes in crime is to exploit spatial and/or temporal variation in factors that we think affect crime. To see whether changes in the number of police have influenced theft rates, for example, we need to find out whether theft rates in an area are inversely related to the number of police in the area after controlling for other factors that might affect crime (e.g. unemployment, average weekly earnings). Similarly, to see whether policing policy in one jurisdiction is more effective than policing policy in another jurisdiction we need to be able to compare trends in crime in both jurisdictions over time.

This sort of research requires a much more fine-grained spatial and temporal breakdown of crime than is currently available. The national crime statistics published by the ABS currently break crime down by jurisdiction and year. Because of the break in the recorded crime statistics, we only have 24 observations for each category of crime (eight jurisdictions with three years of data from each). For a typical time series or panel analysis we need much more data than this. The ideal would be a breakdown of crime by month (or quarter) and Local Government Area. This would put Australian recorded crime statistics on a similar footing to those available in the United Kingdom (UK Office of National Statistics, 2013) and the United States (US Department of Justice, 2013).

More detailed spatial and temporal breakdowns of crime data would also allow researchers to more fully exploit other datasets held by the ABS. The ABS routinely collects a vast quantity of data on factors potentially relevant to an understating of crime (e.g. household income, unemployment, labour force participation, the age structure of the population, the health of the Australian population, family dissolution and alcohol consumption) but which has only rarely been used for this purpose. Other government agencies also collect information which could be usefully combined with ABS data if a detailed spatial and temporal breakdown of Australian recorded crime statistics were available. The Household, Income and Labour Dynamics in Australia (HILDA) survey is one example.

The limitations in the current national crime statistics collection are not the fault of the ABS. The data on recorded crime published by the ABS is sourced from State and Territory Police. Improvements to national crime statistics of the kind described here require the agreement and cooperation of all State and Territory Police Services. The creation of more detailed national crime statistics may require additional funds. If they do, it is important to remember, that Australian State and Territory Governments currently spend about $9.5 billion on policing (SCRGSP, 2013). The crime data collected by the ABS provide the only practical and effective means by which to evaluate the effects and effectiveness of policing policy. Considered in this light, a small increase in spending on national crime statistics would be a worthwhile investment indeed.

Notes

1 The ABS definition of 'other' theft includes: theft of motor vehicle parts or contents; theft from a person (excluding by force); theft from retail premises; theft (apart from motor vehicle theft) nec (not elsewhere classified); and illegal use of property (except motor vehicles).

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