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**CRIME AND SAFETY, VICTORIA  
APRIL 1995**

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**AUSTRALIAN BUREAU OF STATISTICS**

**CATALOGUE NO. 4509.2**

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## MAIN FEATURES

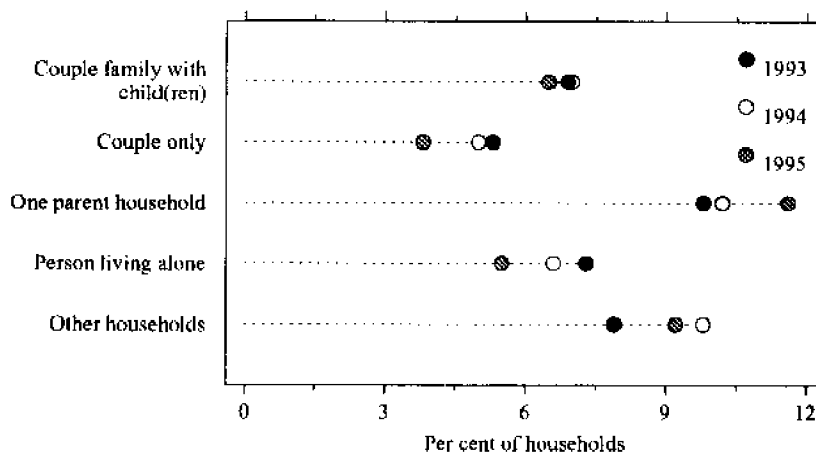
### HOUSEHOLD CRIME

- During the 12 months to April 1995, an estimated 103,300 (6.3%) of households in Victoria were victims of at least one break and enter, attempted break and enter, or motor vehicle theft offence.
- This victimisation rate decreased as compared with the rate found in April 1993 (7.0%) and 1994 (7.0%).
- Households in the Melbourne Statistical Division experienced a higher victimisation rate (7.5%) than the balance of Victoria (3.5%).
- The victimisation rate in the balance of Victoria decreased from 6.1% in 1993 and 4.8% in 1994 to 3.5% in 1995.

### HOUSEHOLD TYPE

- Households comprising a one parent family had the highest crime victimisation rate (11.6%). This increased from 9.8% in 1993 and 10.2% in 1994.
- The lowest rate (3.8%) was recorded for households comprising a couple only.

**VICTIMS OF HOUSEHOLD CRIME BY HOUSEHOLD TYPE  
IN THE PREVIOUS TWELVE MONTHS  
VICTORIA**



Source: Table 2

### NEIGHBOURHOOD WATCH

- Households which were a member of Neighbourhood (or Rural) Watch programs had the lowest victimisation rate (5.7%), compared to households which were not a member or households which responded 'do not know' to the membership status question.
- The victimisation rates for Neighbourhood Watch members was 5.6% in 1993, 6.8% in 1994 and 5.7% in 1995.

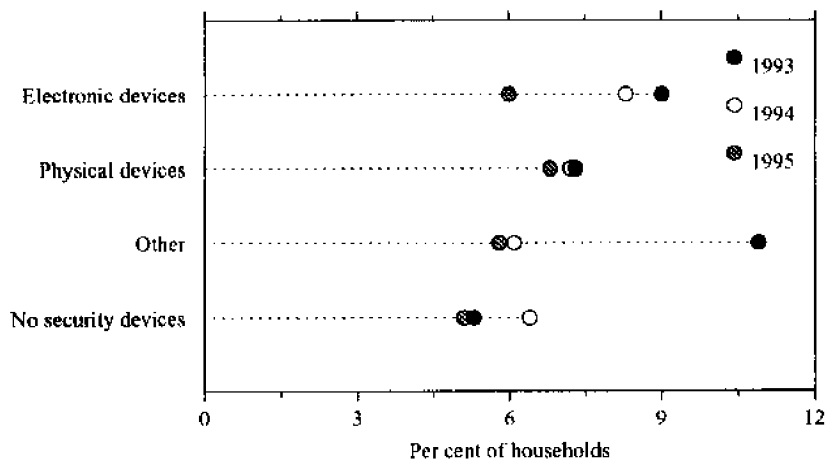
### INQUIRIES

- for more information about statistics in this publication, contact Paul Taylor on (03) 9615 7350.
- for more information about other ABS statistics and services, please refer to the back page of this publication.

## SECURITY DEVICES

- For 1993, 1994 and 1995, households with security devices (electronic and physical) had a higher victimisation rate than those without security devices.
- Victimization rates for households with electronic security devices has steadily decreased since 1993 (9.0% in 1993, 8.3% in 1994 and 6.0% in 1995).

### VICTIMS OF HOUSEHOLD CRIME BY TYPE OF SECURITY DEVICE IN THE PREVIOUS TWELVE MONTHS VICTORIA



Source: Table 3

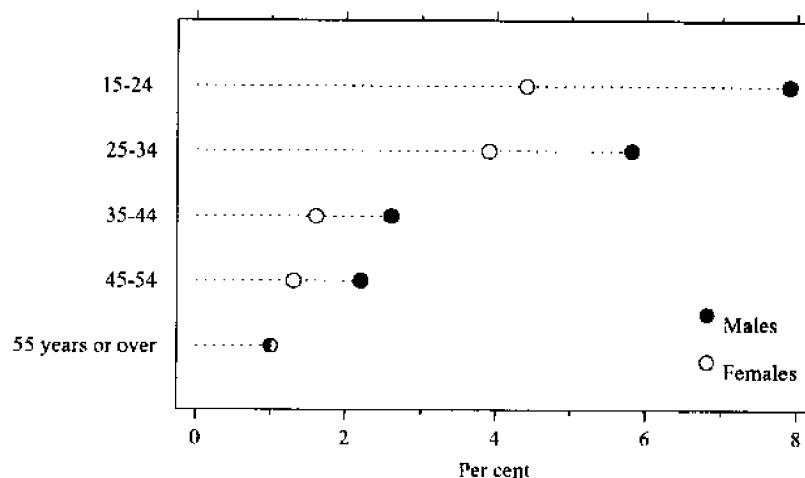
## PERSONAL CRIME

- The number of people who were victims of personal crime (robbery, assault or sexual assault) decreased from 3.7% in 1994 (126,800 persons) to 3.1% (106,800 persons).
- An estimated 65,000 males and 41,800 females were victims of a personal crime during the 12 months ended April 1995 representing victimisation rates of 3.8% and 2.4% respectively.
- The risk of victimisation of personal crime was highest for males 15-24 years (7.9%). This victimisation rate reduced significantly from 12.0% in the 12 months ended April 1994.
- The risk of victimisation decreases with increasing age for both males and females.

## RISK FACTORS

- Victimization rates for personal crimes decreased with length of residency and increased with more frequent use of public transport and attendance at entertainment places after 6pm.
- People who were unemployed had a higher victimisation rate (4.5%) than those employed (3.6%) or not in the labour force (2.1%).

**VICTIMS OF PERSONAL CRIME BY AGE BY SEX  
IN THE PREVIOUS TWELVE MONTHS  
VICTORIA**



Source: Table 4

**MULTIPLE  
VICTIMS**

- Over 42.5% of victims of a personal crime were victims on more than one occasion, compared with 25.4% of household victims.
- Of victims of assault, 44.6% experienced more than one assault during the 12 months to April 1995.
- Of victims of motor vehicle theft, 10.3% experienced more than one incident during the 12 months period.

**REPORTING  
TO POLICE**

- The reporting rates were 76.5% for break and enter, 37.4% for attempted break and enter and 96.5% for motor vehicle thefts in 1995.
- The proportion of victims reporting the last household break and enter incident to the police decreased from 83.8% in 1994 to 76.5% in 1995.
- The proportion of robbery victims who reported the last incident to the police was significantly lower in the 1995 survey (56.7%) than in the 1994 survey (67.8%), but was marginally higher than in the 1993 survey (52.2%). The reporting rates for assault had reduced from 35.3% in 1993 to 33.2% in 1995.

# 1

## VICTIMS AND NON-VICTIMS OF CRIME<sup>1</sup> IN THE LAST 12 MONTHS: TYPE OF OFFENCE, VICTORIA, APRIL 1994 AND 1995

Type of offence	1994		1995		1993	1994	1995
	Victims	Non-victims	Victims	Non-victims	Victimisation rate Per cent <sup>3</sup>		
	'000						
<b>Households</b>							
Break and enter	54.9	1 549.7	52.7	1 574.2	3.3	3.4	3.2
Attempted break and enter	39.6	1 565.1	36.6	1 590.2	2.6	2.5	2.3
Break and enter or attempted break and enter <sup>2</sup>	85.7	1 519.0	81.9	1 545.0	5.4	5.3	5.0
Motor vehicle theft	29.9	1 574.7	23.8	1 603.0	1.7	1.9	1.5
<b>Total household crime<sup>2</sup></b>	<b>111.8</b>	<b>1 492.8</b>	<b>103.3</b>	<b>1 523.6</b>	<b>7.0</b>	<b>7.0</b>	<b>6.3</b>
<b>Persons</b>							
Robbery	39.2	3 370.9	27.9	3 409.1	1.0	1.1	0.8
Assault	88.3	3 321.8	81.8	3 355.2	2.2	2.6	2.4
Sexual assault <sup>4</sup>	8.2	1 640.8	*4.7	1 653.1	0.5	0.5	*0.1
<b>Total personal crime<sup>2</sup></b>	<b>126.8</b>	<b>3 283.3</b>	<b>106.8</b>	<b>3 330.2</b>	<b>3.2</b>	<b>3.7</b>	<b>3.1</b>

<sup>1</sup> Refers to households or persons who were victims of any of the types of offence specified.

<sup>2</sup> Because an individual household or person could be a victim of more than one type of offence, figures given for individual offence types do not sum to the figures in this row.

<sup>3</sup> Of all households/persons.

<sup>4</sup> Sexual assault questions were asked only of females aged 18 years and over.

# 2

## VICTIMS AND NON-VICTIMS OF HOUSEHOLD CRIME<sup>1</sup> IN THE LAST 12 MONTHS: OTHER CHARACTERISTICS, VICTORIA, APRIL 1995

Other characteristics	1995			1993	1994	1995
	Victims	Non-victims	Total	Victimisation rate Per cent <sup>2</sup>		
	'000					
<b>Major statistical region</b>						
Melbourne	86.8	1 070.8	1 157.6	7.4	7.9	7.5
Balance of Victoria	16.5	452.7	469.2	6.1	4.8	3.5
<b>Household type</b>						
Couple with child(ren)	39.1	560.9	600.0	6.9	7.0	6.5
Couple only	15.0	379.5	394.4	5.3	5.0	3.8
One parent household	15.5	118.0	133.5	9.8	10.2	11.6
Person living alone	17.8	308.3	326.1	7.3	6.6	5.5
Other households	15.8	157.0	172.8	7.9	9.8	9.2
<b>Total households</b>	<b>103.3</b>	<b>1 523.6</b>	<b>1 626.9</b>	<b>7.0</b>	<b>7.0</b>	<b>6.3</b>

<sup>1</sup> Break and enter, attempted break and enter or motor vehicle theft.

<sup>2</sup> Of households.



### 3

#### VICTIMS AND NON-VICTIMS OF HOUSEHOLD CRIME<sup>1</sup> IN THE LAST 12 MONTHS: SELECTED RISK FACTORS, VICTORIA, APRIL 1995

Selected risk factors	1995			1993	1994	1995
	Victims	Non-victims	Total	Victimisation rate		
	'000			Per cent <sup>2</sup>		
<b>Whether a member of Neighbourhood (or Rural) Watch -</b>						
Member	29.6	493.1	522.7	5.6	6.8	5.7
Not a member	57.6	841.6	899.2	7.6	6.9	6.4
Don't know	16.0	188.9	204.9	8.4	8.1	7.8
<b>Type of security devices in households<sup>3</sup></b>						
Electronic devices	21.2	331.6	352.8	9.0	8.3	8.0
Physical devices	80.3	1 103.9	1 184.2	7.3	7.2	6.8
Other	*5.8	95.5	101.3	10.9	*6.1	*5.8
No security devices	16.6	309.1	325.7	5.3	6.4	5.1
<b>Total</b>	<b>103.3</b>	<b>1 523.6</b>	<b>1 626.9</b>	<b>7.0</b>	<b>7.0</b>	<b>6.3</b>

<sup>1</sup> Break and enter, attempted break and enter or motor vehicle theft.

<sup>2</sup> Of households.

<sup>3</sup> A household could have more than one type of security device. As a consequence, figures in these columns do not sum to the total shown for all households. Households that did not state whether they had security devices have not been included in the table.

## 4

**VICTIMS AND NON-VICTIMS OF PERSONAL CRIME<sup>1</sup> IN THE LAST 12 MONTHS:  
AGE BY SEX, VICTORIA, APRIL 1995**

Age	1995			1993	1994	1995
	Victims	Non-victims	Total	Victimisation Rate		
	'000			Per cent <sup>2</sup>		
MALES						
15-24 years	26.4	309.3	335.8	8.3	12.0	7.9
25-34 years	19.9	325.6	345.5	4.7	5.0	5.8
35-44 years	8.6	320.4	329.0	3.4	3.5	2.6
45-54 years	*5.9	266.9	272.8	2.5	2.3	*2.2
55-64 years	*2.2	185.3	187.5	*1.2	*1.1	*1.2
65 years or over	*2.0	218.4	220.4	*0.4	*1.0	*0.9
<b>Total</b>	<b>65.0</b>	<b>1 625.9</b>	<b>1 690.9</b>	<b>3.9</b>	<b>4.7</b>	<b>3.8</b>
FEMALES						
15-24 years	14.4	312.8	327.2	4.4	5.9	4.4
25-34 years	13.8	342.3	356.1	3.8	3.7	3.9
35-44 years	*5.2	332.5	337.7	2.3	2.8	*1.6
45-54 years	*3.6	264.9	268.6	*1.1	*1.0	*1.3
55-64 years	**1.1	185.1	186.2	*0.5	*0.8	**0.6
65 years or over	*3.6	266.6	270.2	*0.9	*0.7	*1.3
<b>Total</b>	<b>41.8</b>	<b>1 704.3</b>	<b>1 746.1</b>	<b>2.5</b>	<b>2.7</b>	<b>2.4</b>
PERSONS						
15-24 years	40.8	622.2	663.0	6.4	9.0	6.2
25-34 years	33.7	667.9	701.6	4.3	4.3	4.8
35-44 years	13.9	652.8	666.7	2.8	3.1	2.1
45-54 years	9.5	531.8	541.4	1.8	1.7	1.8
55-64 years	*3.3	370.4	373.7	*0.9	*1.0	*0.9
65 years or over	*5.6	485.0	490.6	*0.7	*0.8	*1.1
<b>Total</b>	<b>106.8</b>	<b>3 330.2</b>	<b>3 437.0</b>	<b>3.2</b>	<b>3.7</b>	<b>3.1</b>

<sup>1</sup> Robbery, assault or sexual assault.

<sup>2</sup> Of persons.

## 6

### VICTIMS AND NON-VICTIMS OF PERSONAL CRIME<sup>1</sup> IN THE LAST 12 MONTHS: OTHER CHARACTERISTICS, VICTORIA, APRIL 1995

Other characteristics	1995			1993	1994	1995
	Victims	Non-victims	Total			
		'000			Victimisation rate	
					Per cent <sup>2</sup>	
<b>Major statistical region</b>						
Melbourne	83.4	2 403.3	2 486.6	3.3	3.9	3.4
Balance of Victoria	23.5	926.9	950.4	2.9	3.2	2.5
<b>Labour force status</b>						
Employed	72.5	1 961.8	2 034.3	3.6	3.7	3.6
Unemployed	8.4	177.2	185.7	4.7	7.5	4.5
Not in the labour force	25.9	1 191.1	1 217.1	2.2	3.0	2.1
<b>Total</b>	<b>106.8</b>	<b>3 330.2</b>	<b>3 437.0</b>	<b>3.2</b>	<b>3.7</b>	<b>3.1</b>

<sup>1</sup> Robbery, assault or sexual assault.

<sup>2</sup> Of persons.

## 5

### VICTIMS AND NON-VICTIMS OF PERSONAL CRIME<sup>1</sup> IN THE LAST 12 MONTHS: SELECTED RISK FACTORS, VICTORIA, APRIL 1995

Selected risk factors	1995			1993	1994	1995
	Victims	Non-victims	Total			
		'000			Victimisation rate	
					Per cent <sup>2</sup>	
<b>Length of occupancy in dwelling</b>						
Less than 1 year	27.5	462.9	490.4	5.2	6.8	5.6
1 to less than 3 years	25.7	559.9	585.5	4.0	4.8	4.4
3 to less than 5 years	7.1	287.4	294.5	3.1	3.9	2.4
5 years or more	46.6	2 020.0	2 066.5	2.5	2.7	2.3
<b>Frequency of travel on public transport after 6 pm in the last 12 months</b>						
More than once a week	16.9	182.7	199.6	9.6	9.4	8.5
Once a week	7.7	103.1	110.7	*4.7	5.7	6.9
At least once a month	11.3	154.3	165.6	5.8	9.3	6.8
Less than once a month	71.0	2 890.1	2 961.2	2.6	3.0	2.4
<b>Frequency of attending entertainment places after 6 pm in the last 12 months</b>						
More than once a week	30.9	434.2	465.1	8.1	7.9	6.7
Once a week	27.3	588.3	615.5	3.9	5.9	4.4
At least once a month	22.1	814.0	836.0	2.9	2.8	2.6
Less than once a month	26.5	1 493.8	1 520.3	1.6	1.9	1.7
<b>Total</b>	<b>106.8</b>	<b>3 330.2</b>	<b>3 437.0</b>	<b>3.2</b>	<b>3.7</b>	<b>3.1</b>

<sup>1</sup> Robbery, assault or sexual assault.

<sup>2</sup> Of persons.

## 7

**VICTIMS OF CRIME<sup>1</sup> IN THE LAST 12 MONTHS: NUMBER OF INCIDENTS EXPERIENCED  
BY TYPE OF OFFENCE, VICTORIA, APRIL 1995**

Type of offence	'000			Total victims	Per cent		
	One	Two	Three or more		One	Two	Three or more
<b>Households</b>							
Break and enter	41.3	*5.5	*5.9	52.7	78.4	*10.5	*11.1
Attempted break and enter	23.4	8.3	*5.0	36.6	63.9	22.6	*13.6
Break and enter or attempted break and enter <sup>2</sup>	58.8	11.7	11.3	81.9	71.8	14.3	13.8
Motor vehicle theft	21.4	**1.6	**0.9	23.8	89.7	**6.7	**3.6
<b>Total household victims<sup>2</sup></b>	<b>77.0</b>	<b>14.5</b>	<b>11.7</b>	<b>103.3</b>	<b>74.6</b>	<b>14.0</b>	<b>11.4</b>
<b>Persons</b>							
Robbery	17.6	*4.0	*6.3	27.9	63.1	*14.4	*22.5
Assault	45.3	16.3	20.2	81.8	55.4	19.9	24.7
Sexual assault <sup>3</sup>	*2.6	***	***	*4.7	*55.6	***	***
<b>Total personal victims<sup>2</sup></b>	<b>61.5</b>	<b>18.9</b>	<b>26.5</b>	<b>106.8</b>	<b>57.5</b>	<b>17.7</b>	<b>24.8</b>

<sup>1</sup> Refers to households or persons who were victims of any of the types of offence specified.

<sup>2</sup> Because an individual household or person could be a victim of more than one type of offence, figures given for individual offence types do not sum to total figures in this row.

<sup>3</sup> Sexual assault questions were asked only of females aged 18 years and over.

## 8

**VICTIMS OF CRIME<sup>1</sup> IN THE LAST 12 MONTHS: WHETHER POLICE TOLD ABOUT THE LAST INCIDENT BY TYPE OF OFFENCE, VICTORIA, APRIL 1994 AND 1995**

Type of offence	1994			1995			1993	1994	1995
	Police told	Police not told	Total victims	Police told	Police not told	Total victims			
'000									
Per cent <sup>2</sup>									
<b>Households</b>									
Break and enter	46.0	8.9	54.9	40.3	12.4	52.7	82.9	83.8	76.5
Attempted break and enter	14.6	24.6	39.6	13.7	22.9	36.6	39.6	37.0	37.4
Motor vehicle theft	28.1	*1.9	29.9	23.0	**0.8	23.8	94.2	93.7	96.5
<b>Persons</b>									
Robbery	26.6	12.6	39.2	15.8	12.1	27.9	52.2	67.8	56.7
Assault	30.9	57.4	88.3	27.2	54.6	81.8	35.3	35.0	33.2
Sexual assault <sup>3</sup>	**1.0	7.2	8.2	**0.7	*4.0	*4.7	**33.1	**12.0	**14.9

<sup>1</sup> Refer to households or persons who were victims of any of the types of offence specified.

<sup>2</sup> Of all households/persons.

<sup>3</sup> Sexual assault questions were asked only of females aged 18 years and over.

## EXPLANATORY NOTES

- INTRODUCTION**
- 1** This publication contains results from a survey of Crime and Safety which was conducted throughout Victoria in April 1995 as a supplement to the ABS Monthly Population Survey (MPS). The survey was conducted and funded at the request of the Department of Justice, Victoria.
  - 2** Information was collected from individuals and households about their experience of selected crimes, reporting behaviour and risk factors, and households' membership of Neighbourhood or Rural Watch programs.
  - 3** The survey was conducted using all the private dwellings included in the MPS, with the exception of private dwellings containing only visitors. The MPS was conducted during the two weeks commencing Monday, 10 April 1995.
  - 4** Information was sought from approximately 11,200 persons, of whom 9,118 (81.4%) responded. Data pertaining to households were sought from approximately 5,320 households and 4,320 (81.2%) replied. Examination of successive waves of responses did not indicate any serious problem of non-response bias. Special estimation procedures and imputation were employed to reduce the effect of non-response.
- SCOPE**
- 5** The survey was conducted for all persons aged 15 years and over who were usual residents of private dwellings, except:
    - (a) members of the permanent defence forces;
    - (b) certain diplomatic personnel of overseas governments, customarily excluded from censuses and surveys;
    - (c) overseas residents in Australia; and
    - (d) members of non-Australian defence forces (and their dependants) stationed in Australia.
  - 6** Residents of other non-private dwellings such as hospitals, motels and jails (included in the MPS) were excluded from this survey.
- COVERAGE**
- 7** In the survey, coverage rules were applied which aimed to ensure that each person was associated with only one dwelling, and hence had only one chance of selection in the survey.
  - 8** Crime and Safety questionnaires were delivered to the selected households by MPS interviewers for completion by respondents and return by mail. One questionnaire per household contained questions relating to the household as a whole. In addition, all persons in scope (refer paragraph 5) were provided with a questionnaire relating to their personal experiences of crime. All females aged 18 years or over were provided with an additional questionnaire relating to their personal experiences of sexual assault only.
- COMPARISONS WITH POLICE STATISTICS**
- 9** It should be emphasised that the responses obtained in this survey are based on the respondent's perception of their having been the victim of an offence. The terms used summarise the wording of the questions asked of the respondent, and may not necessarily correspond with the legal or police definitions which are used for each offence.
- DEFINITIONS**
- 10** *Household*: A group of residents of a dwelling who share common facilities and meals or who consider themselves to be a household. It is possible for a dwelling to contain more than one household, for example, where regular provision is made for groups to take meals separately and where persons consider their households to be separate.

- 11** *Neighbourhood (or Rural) Watch*: A community-based crime prevention program mainly aimed at preventing break and enter offences.
- 12** *Offence*: Indicates crimes which persons or households reported had been committed against them.
- 13** *Break and enter offence*: An incident where the respondent's home had been broken into. The respondent's home was defined to include their garage or shed, but break and enter offences relating to their car or garden were excluded.
- 14** *Attempted break & enter offence*: An incident where an attempt was made to break into the respondent's home.
- 15** *Motor vehicle theft*: An incident where a registered motor vehicle was stolen from any member of the household. It included privately owned motor vehicles as well as business/company vehicles used exclusively by any members of the household.
- 16** *Robbery*: An incident where someone had stolen something from a respondent by threatening or attacking them.
- 17** *Assault*: An incident other than a robbery where the respondent was threatened with force or attacked.
- 18** *Sexual assault*: An incident which was of a sexual nature involving physical contact, including rape, attempted rape, indecent assault, and assault with intent to sexually assault. Sexual harassment (that did not lead to an assault) was excluded. Only females aged 18 years and over were asked sexual assault questions.
- 19** *Victim*: A person or a household reporting at least one of the offences listed above. Victims were counted once only for each type of offence, regardless of the number of incidents of that type.
- 20** *Dwelling*: A suite of rooms contained within a building which are self-contained and intended for long-term residential use. To be self-contained the suite of rooms must possess cooking and bathing facilities as building fixtures.
- 21** *Security devices*: Electronic devices include alarms, electric timers for lights and motion sensor devices. Physical devices include dead locks or improved locks, security screen doors, security screens and grills or shutters on windows.
- 22** *Employed*: Persons aged 15 and over who, during the reference week:
- (a) worked for one hour or more for pay, profit, commission or payment in kind in a job or business, or on a farm (comprising employees, employers and self employed persons); or
  - (b) worked for one hour or more without pay in a family business or on a farm (i.e. unpaid family helpers); or
  - (c) were employees who had a job but were not at work and were: on paid leave; on leave without pay for less than four weeks up to the end of the reference week; stood down without pay because of bad weather or plant breakdown at their place of employment for less than four weeks up to the end of the reference week; on strike or locked out; on workers' compensation and expecting to be returning to their job; or receiving wages or salary while undertaking full time study; or

(d) were employers, self employed persons or unpaid family helpers who had a job, business or farm, but were not at work.

**23 Unemployed:** Persons aged 15 and over who were not employed during the reference week and:

(a) had actively looked for full-time or part-time work at any time in the four weeks up to the end of the reference week and:

(i) were available for work in the reference week, or would have been available except for temporary illness (i.e. lasting for less than four weeks to the end of the reference week); or

(ii) were waiting to start a new job within four weeks from the end of the reference week and would have started in the reference week if the job had been available then; or

(b) were waiting to be called back to a full-time or part-time job from which they had been stood down without pay for less than four weeks up to the end of the reference week (including the whole of the reference week) for reasons other than bad weather or plant breakdown.

**24 Not in the labour force:** Persons who were not in the categories employed or unemployed as defined.

#### RELATED PUBLICATIONS

**25** The ABS produces a wide range of publications of social and demographic statistics. Other ABS publications which relate to this survey topic include:

*Crime and Safety, Victoria, April 1994 (4509.2)*

*Crime and Safety, New South Wales, April 1994 (4509.1)*

*Crime and Safety, Australia, April 1993 (4509.0)*

*National Crime Statistics, Jan-Dec 1993 (4510.0)*

*Crime and Safety, New South Wales, April 1992 (4509.1)*

*Crime and Safety, South Australia, April 1991 (4509.4)*

*Crime Victims, Western Australia, October 1991 (4506.5)*

*Crime and Crime Prevention Survey, Victoria, July 1987, Preliminary (4507.2)*

*Crime Victims Survey, Victoria 1986 (4506.2)*

*Crime Victims Survey, Australia, 1983, Preliminary (4505.0)*

*Victims of Crime, Australia, 1983 (4506.0)*

#### SYMBOLS AND OTHER USAGES

\* estimate is subject to a relative standard error of between 25% and 50%.

\*\* estimate is subject to sampling variability too high for most practical purposes (more than 50%). Refer to the Technical Notes on Data Reliability.

\*\*\* data is not released due to confidentiality requirements.

## TECHNICAL NOTES

### ESTIMATION PROCEDURE

**1** Estimates derived from this survey were obtained in two stages. In the first stage, adjustment of non-response was carried out based on the demographic composition of the Monthly Population Survey sample, as well as on analysis of the effect of reminder action on the responses obtained.

**2** The second stage was a complex ratio estimation procedure, which ensured that the survey estimates conformed to an independently estimated distribution of the population by age, sex and part of state, rather than to the age, sex and part of state distribution among respondents.

### RELIABILITY OF ESTIMATES

**3** Estimates in this publication are subject to non-sampling and sampling errors.

### NON-SAMPLING ERRORS

**4** Non-sampling errors may arise as a result of errors in the reporting, recording or processing of the data and can occur even if there is a complete enumeration of the population. Non-sampling errors can be introduced through: inadequacies in the questionnaire; non-response; inaccurate reporting by respondents; errors in the application of survey procedures; incorrect recording of answers; and errors in data entry and processing.

**5** It is difficult to measure the size of the non-sampling errors and the extent of these errors could vary considerably in significance from survey to survey and from question to question. However, every effort is made in the design of the survey and development of survey procedures to minimise the effect of these errors.

### SAMPLING ERRORS

**6** Sampling error is the error which occurs by chance because the data were only obtained from a sample, not the entire population.

### ESTIMATES OF SAMPLING ERROR

**7** One measure of the variability of estimates which occurs as a result of surveying only a sample of the population is the *standard error* (SE) (Table A).

**8** There are about two chances in three (67%) that a survey estimate is within one standard error of the figure that would have been obtained if all persons had been included in the survey. There are about nineteen chances in twenty (95%) that the difference will be less than two standard errors.

**9** Linear interpolation should be used to calculate the standard error of estimates falling between the sizes of estimates listed in the table.

**10** The standard error can also be expressed as a percentage of the estimate and this is known as the *relative standard error* (RSE). For example, if an estimate of 6 330 persons has a standard error of 1 580, then the estimate has a relative standard error of  $1\ 580/6\ 330 \times 100 = 25\%$ . The relative standard error is a useful measure in that it provides an immediate indication of the percentage errors likely to have occurred due to sampling.

**11** Proportions and percentages formed from the ratio of two estimates are also subject to sampling error. The size of the error depends on the accuracy of both the numerator and the denominator. The formula for the relative standard error of a proportion or percentage is -

$$RSE(x/y) = \sqrt{[RSE(x)]^2 + [RSE(y)]^2}$$



**12** For all tables in this publication, only estimates with relative standard errors of 25% or less, and percentages based on such estimates, are considered sufficiently reliable for most purposes. However, estimates and percentages with relative standard errors between 25% to 50% have been included, preceded by the symbol \* to indicate that they are subject to high standard errors and should be used with caution. Estimates with relative standard errors greater than 50% should not be regarded as reliable, and are indicated by the symbol \*\*.

**13** An example of the calculation on use of standard error is as follows: from Table A we see that a population estimate of 6 000 persons (column 1) has a standard error of 1 550 (column 2). Therefore, there are two chances in three that the number which would result if all persons were included in the survey lies in the range 4 450 to 7 550 (one SE either side of the estimate). There are 19 chances in 20 that the true number lies in the range 2 900 to 9 100 (2 SEs either side of the estimate).

### **A** STANDARD ERRORS OF ESTIMATES OF PERSONS AND HOUSEHOLDS, VICTORIA APRIL 1995

Size of estimate (households or persons)	Standard error (Number)	Relative standard error (%)
1 000	650	64.5
1 500	790	52.7
2 000	910	45.6
2 500	1 000	40.7
3 000	1 100	37.0
3 500	1 200	34.2
4 000	1 300	31.9
4 500	1 350	30.0
5 000	1 400	28.4
6 000	1 550	25.7
8 000	1 750	22.0
10 000	1 950	19.5
20 000	2 650	13.3
30 000	3 150	10.6
40 000	3 600	9.0
50 000	3 950	7.9
100 000	5 200	5.2
200 000	6 800	3.4
300 000	8 000	2.7
400 000	8 900	2.2
500 000	9 600	1.9

**VICTORIAN CRIME AND SAFETY SURVEY,  
APRIL 1995**

**NEED ADDITIONAL DATA?**

The survey of Crime and Safety provides information on the incidence of selected categories of crime, reporting behaviour, and victimisation risk factors from persons aged 15 years and over for the period of 12 months ended in April 1995. In addition, females aged 18 years and over were asked to provide information on their personal experience of sexual assaults. A customised data service is now available to meet special data requirements.

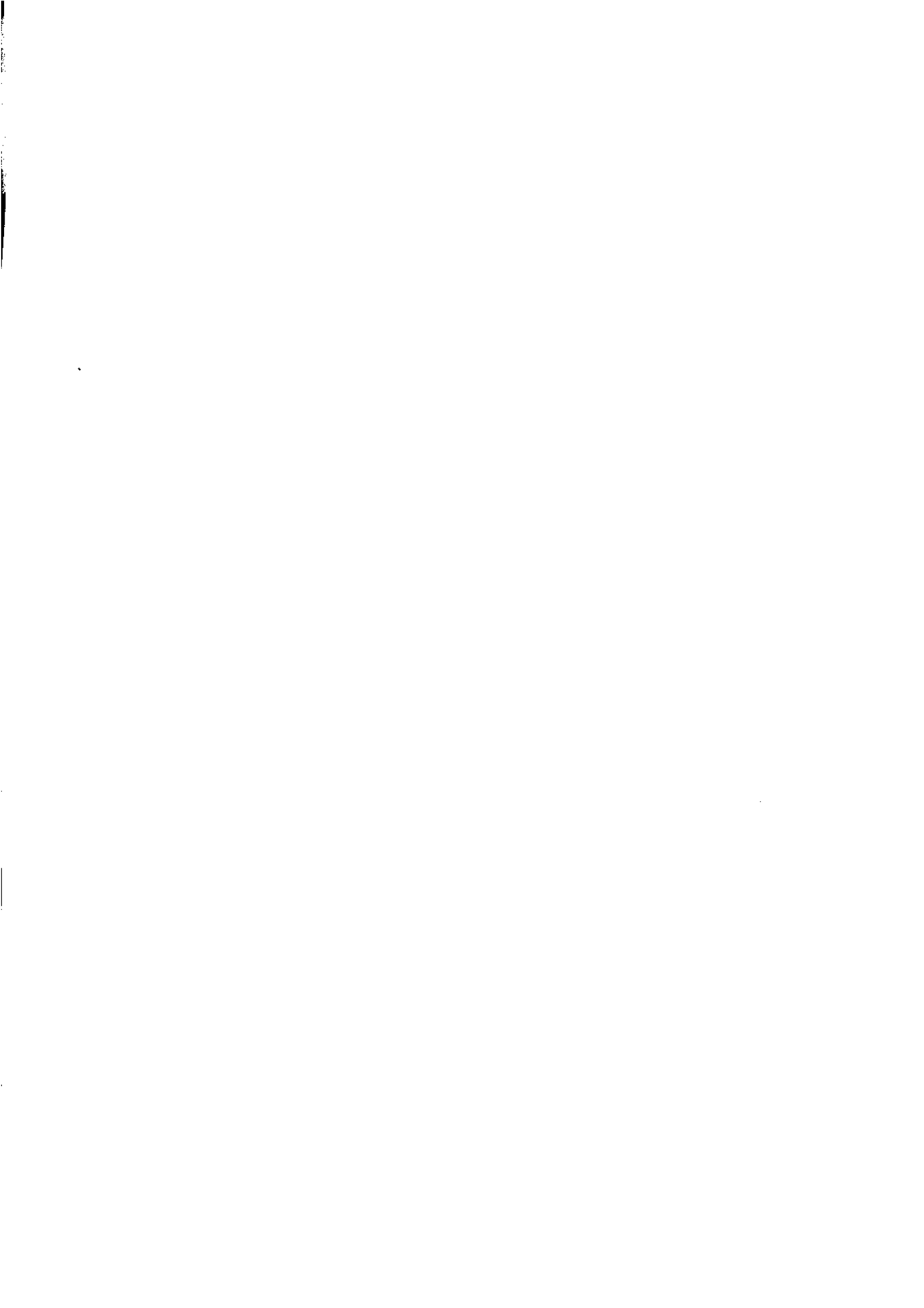
**Information collected in the survey includes:**

- Length of residence
  - number of incidents in the last twelve months
- Socio-economic profile of the victims and
  - number of incidents reported to the police,
  - the main reason why the incident was not reported to the police.
- Whether a member of Neighbourhood (or Rural) Watch
  - (ii) For break and enter:
    - description of items stolen.
- Household security:
  - security devices installed and
  - reasons for having the security devices
  - (iii) For motor vehicle theft:
    - location of incident,
    - type of registered owner, and
    - whether covered by comprehensive insurance
- Victimisation risk factors:
  - frequency of attending evening entertainment
  - types of entertainment places attended
  - frequency of using public transport in the evening
  - (iv) For robbery, assault and sexual assault:
    - location of the last incident,
    - whether a weapon was used, and
    - whether the offender was known to the victim
- Types of offences:
  - (i) For break and enter, attempted break and enter, motor vehicle theft, robbery, assault and sexual assault:

**Data can be classified by the following variables:**

- Age
- Sex
- Marital status
- Household type
- Year of arrival in Australia
- Whether studying
- Labour force region
- Labour force status

To discuss your data requirements or for further information regarding this survey please contact **Paul Taylor on (03)9615 7350**



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**Recommended retail price: \$13.00**

