This report provides information on the oral health and use of dental services among rural and remote dwellers in Australia. Comparisons are provided by geographic region to investigate whether persons living outside the main population centres are more disadvantaged than their urban counterparts.

Data on tooth loss, dental visiting patterns, treatment received, affordability of dental care, toothache experience and avoidance of food are presented.

Data collection

Data presented in this publication were sourced from the National Dental Telephone Interview Survey 2002. The residential postcode of survey respondents was used in conjunction with the ASGC remoteness classification scheme used by the Australian Bureau of Statistics to classify respondents as urban, rural or remote dwellers. Results are reported for adults aged 18 years and over (n=6,149) with 77% of the sample classified as urban dwellers, 17% as rural dwellers and 5% as remote dwellers.

Data were weighted to represent the age and sex distribution of the Australian population at the time of the survey.

Dentate status

The cumulative effects of past disease and treatment practices are reflected in tooth loss. The percentage of adults who have lost all of their natural teeth (i.e. are edentulous) is presented in Figure 1. Complete tooth loss increased sharply across age in each geographic region. Approximately 6% of adults aged 45–59 years were edentulous irrespective of their residential location. For adults aged 60 years and over, those living in rural areas were more likely to be edentulous (34.6%) than urban (28.6%) or remote (26.8%) dwellers.

Dental health status

Respondents were asked to rate their dental health using a six-point scale ranging from excellent through to very poor. The percentage of adults with some natural teeth (i.e. dentate) who rated their dental health ‘very poor’, ‘poor’ or ‘average’ is presented in Figure 2.
Rural dwellers were most likely to rate their dental health as ‘very poor’, ‘poor’ or ‘average’. One-in-four rural dwellers (24.9%) reported this compared with 21.5% of urban dwellers and 19.5% of remote dwellers.

**Access to dental services**

**Dental visiting patterns**

Regular visits to the dentist can help prevent or control dental disease. The time elapsed since dentate adults made their last dental visit is presented in Figure 3.

Urban dwellers were most likely to have visited a dentist in the last year (58.2%), followed by rural dwellers (53.1%) and remote dwellers (50.5%). One-in-three residents living in remote areas (33.5%) had not visited a dentist in the last 2 years compared with 26.0% of rural dwellers and 22.5% of urban dwellers.

**Usual reason for dental visit**

A person’s reason for seeking dental care influences the type of care they receive. Those seeking care for a check-up benefit from early detection and receive preventive services whilst those who usually seek care for a problem may receive less complete treatment and fewer preventive services.

The percentage of residents who usually visit the dentist for a problem rather than a check-up is presented in Figure 4.

Residents living in rural and remote regions of Australia were far more likely to usually visit the dentist for a problem (approximately 59%) than urban dwellers (45.3%).

**Location of last dental visit**

The percentage of dentate adults who attended a private clinic at their last dental visit is presented in Figure 5.

Urban dwellers were most likely to have attended a private clinic (86.7%) followed by rural dwellers (82.2%). Over one-in-four residents living in remote locations attended a public clinic or other non-private clinic at their last dental visit.
Treatment received

Extractions

Respondents who made a dental visit in the last year were asked about the treatment they received. Extraction of a tooth indicates that all previous preventive and restorative treatment has failed.

Figure 6: Received extraction in last year – dentate adults who visited in last 12 months

<table>
<thead>
<tr>
<th>Urban</th>
<th>Rural</th>
<th>Remote</th>
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<tbody>
<tr>
<td>21.6%</td>
<td>17.2%</td>
<td>17.7%</td>
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Residents living in rural areas were slightly more likely to report they had a tooth extracted in the last year (21.6%) than urban (17.2%) and remote dwellers (17.7%) (Figure 6).

Fillings

Urban and rural dwellers were equally likely to report they had received a filling in the last year (45–46%). Residents living in remote areas were less likely (37.6%) to have had a filling (Figure 7).

Cost of dental care

Affordability

Respondents were asked how much difficulty they would have in paying a $100 dental bill. Between 12% and 14% of respondents reported they would have a lot of difficulty paying a $100 dental bill irrespective of whether they lived in an urban, rural or remote location (Figure 8).

Dental insurance

Dental insurance coverage was lowest among rural dwellers (39.0%) and highest among urban dwellers (47.4%). Remote dwellers were more likely to have dental insurance (43.4%) than residents living in rural areas (Figure 9).
Social impact

A range of factors that may affect a person’s quality of life was investigated to determine if differences existed between residents living in urban and non-urban regions.

Respondents were asked about their toothache experience in the last year. The percentage of dentate adults who reported they had experienced toothache ‘very often’, ‘often’ or ‘sometimes’ in the last year is presented in Figure 10.

Residents were equally likely to report they had experienced toothache in the last year irrespective of geographic location (13–14%).

Respondents were also asked whether they had avoided certain foods in the last year due to problems with their teeth or dentures.

The percentage of adults who reported they had avoided eating certain foods ‘very often’, ‘often’ or ‘sometimes’ in the last year is presented in Figure 11. Residents wearing partial or full dentures were more likely to report difficulty (20–22%) than residents with natural teeth only (13–14%). Residents were equally likely to report avoiding certain foods irrespective of whether they lived in urban or non-urban locations.

Summary

Persons living in rural and remote locations were found to generally have less favourable results than urban residents. The main findings are provided below:

- Rural and remote dwellers were far more likely to usually visit the dentist for a problem than urban dwellers.
- Rural dwellers reported the highest level of complete tooth loss and the lowest level of dental insurance coverage, and were most likely to have had a tooth extracted in the last year and be dissatisfied with their dental health.
- Remote dwellers were most likely to have not visited a dentist in the last 2 years and to have attended a public clinic at their last dental visit.
- There was little variation in the prevalence of toothache and avoidance of certain foods across geographic regions. Residents were equally likely to report difficulty in paying a $100 dental bill irrespective of residential location.

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