

#### AIHW Dental Statistics and Research Unit Research Report No. 7

Dental Therapist Labour Force Data Collection 2000



This report provides information on the dental therapist labour force in Australia. Data were collected in 2000 as a part of the national dental labour force data collection. The collection was conducted with the assistance of the Australian Dental Therapists Association (ADTA) and the State/Territory dental services. A summary of the collection findings and some comparisons to the 1997 collection is presented.

## **Data collection**

The data collection was conducted in the last quarter of 2000 and the first quarter of 2001. The scope of the collection included all registered therapists in Western Australia and the Northern Territory, and all therapists currently employed by the State/Territory oral health services in the Australian Capital Territory, South Australia and Tasmania. In New South Wales and Queensland, questionnaires were forwarded to all members of the ADTA in those States. Victoria could not be included in the collection due to the postponement of the 2000 registration period.

The questionnaire included data items on demographic characteristics, practice status, qualifications, hours worked, and area and type of practice.

Oral health therapists who had graduated in 1999 and 2000 from the University of Queensland's Bachelor of Oral Health (BOH) were included in the collection to the extent that contact details were available via the Queensland branch of the ADTA. BOH graduates received a slightly different questionnaire, which attempted to capture their wider range of practice activity options. Oral health therapists are reported separately and are not included in the dental therapist estimations.

Of those therapists included in the scope of the survey, a response rate of 72.6% was achieved. The response rate varied greatly between States, ranging from 60% in Western Australia to 92.9% in New South Wales. It was assumed that the non-respondents in each State/Territory had the

same labour force characteristics as the respondents; hence response numbers were adjusted according to the known number of therapists residing or employed in each State/Territory.

The scope of the collection and the accuracy of estimations with regard to 'latent' workforce and 'non-participating' therapists varies greatly between the States/Territories due to the differing collection processes adopted in each State/Territory. The extent to which the collection includes therapists not working in dental therapy in those States without registration is unknown.

Furthermore, there may be an overestimation of numbers reported if non-respondents were more likely to be those not working as a dental therapist.

#### Practice status

The majority of therapists surveyed were in practice (80.8%), with an additional 3.3% on leave for 3 months or longer. Western Australia had the highest practising rate of dental therapists per 100,000 population (17.6), while New South Wales had the lowest practising rate of 3.3 (Table 1). The number of practising therapists was converted to the number of full-time equivalent (FTE) therapists based on 37.5 hours per week; overall the FTE rate per 100,000 population was 6.0 therapists.

Table 1: Practice status by State/Territory, 2000									
	NSW	Vic	Qld	SA	WA	Tas	NT	ACT	Total
Dental therapists	216	N/A	361	128	331	50	16	19	1,121
3+ months' leave	11	N/A	14	7	12	2	-	-	46
Overseas Working in dentistry, but not		N/A	-	-	2	-	_	-	2
in dental therapy Working, but not		N/A	17	12	23	2	-	-	73
in dentistry	11	N/A	23	4	23	-	_	-	61
Not working	3	N/A	50	-	31	1	_	-	85
Total 260 N/A 465 151 422 55 16 19 1,388 Practising rate per 100,000									
pop.	3.3	N/A	10.1	8.5	17.6	10.6	8.2	6.1	7.8
FTE rate per 100,000 pop.	2.6	N/A	8.0	6.3	12.8	8.4	8.5	5.0	6.0
<ol> <li>N/A denotes data not available, Victoria was not included in the 2000 collection.</li> <li>Full-time equivalence based on 37.5-hour week.</li> </ol>									

# Demographic characteristics and qualifications

Table 2 shows that 16.8% of therapists were 20 to 29 years of age, 35.4% were 30 to 39 years of age, 45.8% were 40 to 49 years of age and only 2.1% were 50 years old or over. Queensland was the only State to have a mean age below the total mean age of 37.9 years. Only 2.4% of respondents were male.

Table 2:	Table 2: Practising therapists, age group by           State/Territory, 2000								
	NSW	Vic	Qld	SA	WA	Tas	NT	ACT	Total
20–24	8	N/A	10	6	_	2	_	_	26
25–29	21	N/A	73	12	48	6	2	-	162
30–34	21	N/A	52	18	56	4	2	3	156
35–39	59	N/A	104	15	46	8	2	7	241
40–44	85	N/A	104	50	120	21	8	7	395
45–49	19	N/A	12	25	53	6	1	2	118
50+	3	N/A	6	2	8	3	1	-	23
Total	216	N/A	361	128	331	50	16	19	1,121
Mean age	38.1	N/A	35.9	38.9	38.4	39.1	40.6	39.2	37.9
Note: N/A den	Note: N/A denotes data not available, Victoria was included in the 2000 collection.								

The vast majority of practising therapists practise in the State/Territory in which they initially qualified (89.8%). Only 2.9% were trained overseas (Table 3).

Table 3: Practising therapists, place of qualification by State/Territory, 2000									
Place of qualification	NSW	Vic	Qld	SA	WA	Tas	NT	Act	Total
NSW	198	N/A	8	_	3	4	2	4	219
Vic	-	N/A	6	1	2	_	_	2	11
Qld	-	N/A	333	_	_	_	_		333
SA	5	N/A	4	126	5	6	8	3	157
WA	-	N/A	2	_	311	_	2		315
Tas	5	N/A		_	_	39	1	9	54
New Zealand	5	N/A	8	1	10	1	3	1	29
Other overseas	3	N/A	-	-	-	_	_	_	3
Total	216	N/A	361	128	331	50	16	19	1,121
Note: N/A denotes data not available, Victoria was not included in the 2000 collection.									

The largest group of practising therapists completed their initial qualification in the years 1975 to 1979 (31.5%); the next largest group was those therapists who qualified in the years 1980 to 1984. Only 8.3% of all practising therapists qualified in the five years prior to the collection (Figure 1).



## **Practice activity**

Hours dedicated to various areas of practice were totalled for all reported work locations. The vast majority of hours (80.9%) were dedicated to clinical practice. Small amounts of time were dedicated to administration/management (10.7%) oral health promotion (3.2%), teaching/research (3.2%), and chairside assistance (1.2%).

Most therapists practise in the school dental service (73.4%). In Western Australia, the only State in 2000 to allow therapists to practice in the private sector, 40.8% of therapists reported that their main practice location type was private practice (Table 4). Only 1.6% of therapists reported working in public hospitals.

	practice by State/Territory, 2000									
	NSW	Vic	Qld	SA	WA	Tas	NT	АСТ	Tota	
Public:										
School										
dental	112	N/A	351	121	178	37	16	8	823	
Community										
centre	74	N/A	-	2	5	13	_	11	10	
Hospital	11	N/A	4	-	3	-	-	-	18	
Teaching										
institution	8	N/A	6	5	5	_	_	_	24	
Private	_	N/A	_	_	135	_	_	_	13	
Other	11	N/A	_	-	5	_	_	_	10	
Total	216	N/A	361	128	331	50	10	19	1,12	

Table 5 shows the number of hours worked per week. The largest proportion of practising therapists (36.8%) worked 30 to 39 hours per week, 21.7% worked 20 to 29 hours, 19.3% worked 10 to 19 hours, 17.7% worked 40 hours or more, and only 4.6% worked less than 10 hours per week. Just over half of all practising hygienists worked part-time (55.2%). With the exception of the Northern Territory (mean number of hours worked per week 39.0), there was little difference between States/Territories in the mean number of hours worked per week; the overall mean was 28.8 hours worked per week (Table 5).

Table 5:         Practising therapists, hours worked           by State/Territory, 2000									
Hours per week	NSW	Vic	Qld	SA	WA	Tas	NT	АСТ	Total
<10	5	N/A	14	3	28	2	-	-	52
10–19	33	N/A	69	29	79	6	-	-	216
20–29	60	N/A	72	36	49	15	2	9	243
30–39	77	N/A	89	49	156	23	9	9	412
40+	41	N/A	117	11	19	4	5	1	198
Total	216	N/A	361	128	331	50	16	19	1,121
Part-time <37.5 hrs	142	N/A	192	106	222	35	10	16	723
Full-time 37.5+ hrs	74	N/A	169	22	109	15	6	3	398
Mean	29.3	N/A	29.8	27.6	27.3	29.6	39.0	30.4	28.8
col	collection.								

Figure 2 shows practice status by age group. Therapists in the 20 to 29 years age group were more likely to work full-time than part-time, whereas those in the 30 years or older age groups were more likely to work part-time.

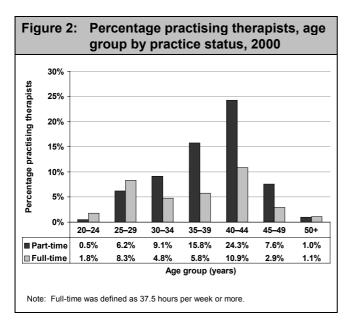
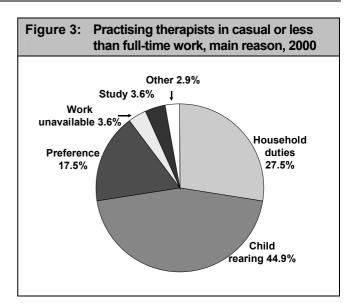


Figure 3 shows the main reasons given for working in casual employment or less than 35 hours per week. Child rearing responsibilities were cited by 44.9% of practising therapists as their main reason, followed by household duties (27.5%) and personal preference (17.5%). Only 3.6% cited work unavailability and 3.6% cited undertaking further study as a main reason.



#### **Oral health therapists**

Oral health therapists are qualified to work in the public sector as an oral health therapist or dental therapist. They are also qualified to work in the private sector as a dental hygienist. The first graduates of this hybrid qualification (Bachelor of Oral Health) graduated in 1999 from the University of Queensland. It is anticipated that other similar hybrid courses will become available in the near future. Of the 51 graduates, only 31 could be contacted and 27 responses were achieved. Of those, 7 were working in oral health/dental therapy only, 16 were working in oral health/dental therapy and hygiene, and only 3 were working solely in dental hygiene (Table 6).

Table 6: Oral health therapists									
Work status	Full-time	Part-time	Unknown	Total					
Working in oral health/ dental therapy only Working in oral health therapy and dental	4	3	_	7					
hygiene	11	5	-	16					
Working in dental hygiene only	1	2	_	3					
Not working	_	_	1	1					
Not stated	-	-	24	24					
Total			25	51					

## Labour force changes

Victoria was omitted in the 2000 collection; hence for the purposes of comparing the 1997 collection with the 2000 collection, an estimate for therapists practising in Victoria was imputed. The total number registered in Victoria for 2000 (260 therapists) was multiplied by the 1997 therapist labour force participation rate (53.9% practising therapists). Nationally, there was a 4.8% decrease from an estimated 1,324 therapists in 1997 to 1,261 practising therapists in the year 2000. However, as reported above, dental therapy services can also be provided by oral health therapists, hence the decline in the number of practising therapists would be slightly less if the numbers of oral health therapists practising as dental therapists were included.

Total number practising was divided by 100,000 estimated resident population in order to calculate the practising rate per 100,000 population and is shown in Figure 4 for 1997 and 2000. Overall the practising rate per 100,000 decreased from 7.1 therapists in 1997 to 6.6 therapists in the year 2000.

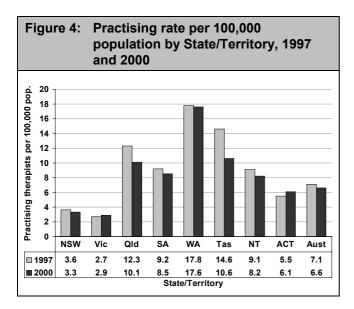
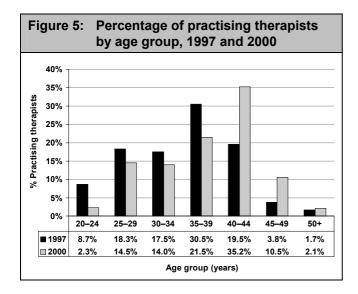


Figure 5 compares the age distribution of practising therapists in 1997 with the age distribution in 2000. It can be seen that the percentage of therapists in the older age groups has increased. The total percentage of therapists in the 40 years or older age groups has increased from 25.0% to 47.8% of all practising therapists.



#### Summary

- Western Australia had the highest rate of practising therapists per 100,000 population (17.6); however, 40.8 % of practising therapists in Western Australia worked in private practice.
- Overall, it was estimated that there were 7.8 practising therapists per 100,000 estimated resident population.
- Just over half of practising therapists were between 35 and 44 years of age (56.7%).
- Only 8.3% of practising therapists qualified in the 5 years prior to the collection.
- Nearly three-quarters cited school dental service as their main practice type (73.4%).
- Just over half of all practising therapists worked part-time (64.5%).
- Therapists in the 20 to 29 years age group were more likely to work full-time than part-time, whereas those in the 30 years or older age groups were more likely to work part-time.
- There was an estimated 4.8% decrease in the number of practising therapists since the 1997 collection.
- The percentage of therapists 40 years or older had increased from 25.0% in 1997 to 47.8% in the year 2000.

#### References

Australian Bureau of Statistics (ABS) June quarter 2000. Australian Demographic Statistics. Canberra: ABS Cat. No. 3101.0.

Szuster FSP & Spencer AJ 1997. Dental therapist labourforce, Australia, 1997. AIHW Cat. No. DEN 51. Adelaide: AIHW DSRU.

#### Acknowledgements

The assistance of the responding dental therapists, the ADTA and the State/Territory dental registration boards is greatly appreciated.

The AIHW Dental Statistics and Research Unit (DSRU) is a collaborating unit of the Australian Institute of Health and Welfare established in 1988 located in the Australian Research Centre for Population Oral Health, Dental School, The University of Adelaide. The DSRU aims to improve the oral health of Australians through the collection, analysis and reporting of information on oral health and access to dental care, the practice of dentistry and the dental labour force in Australia.

Email:	aihw.dsru@adelaide.edu.au
Phone:	61 8/(08) 8303 4051
Fax:	61 8/(08) 8303 4858
www.ade	laide.edu.au/socprev-dent/dsru
	Phone: Fax:

© AIHW Dental Statistics and Research Unit, October 2002 AIHW Catalogue No. 110 ISSN 1445-7441 (Print) ISSN 1445-775X (Online)