

February 2005

SKILL SHORTAGE ASSESSMENT OCCUPATION: CABINETMAKER

Current situation: Skill shortage
Short term outlook: Skill shortage

Executive summary

1. The Survey of Employers who have Recently Advertised (SERA) indicates that there is currently a severe shortage of cabinetmakers. Only 32% of vacancies were filled within six weeks of being advertised, and for every 10 positions advertised, there was an average of only 3 suitable applicants. This report considers the survey results in the context of trends in the demand for and supply of cabinetmakers.

Table 1: employer survey indicators, 2004

	Fill rate	Average number of suitable applicants per vacancy
Cabinetmakers	32%	0.3
All trades surveyed	41%	0.7

Source: Department of Labour, SERA

2. A shortage exists despite the fact that demand for cabinet makers has been decreasing. Employment of cabinetmakers declined between 1996 and 2004, due to the uptake of labour-saving computer numerically controlled machinery. This decline occurred despite strong output growth in the three main employing sectors for cabinetmakers: *furniture manufacturing, wood and paper manufacturing, and personal and household goods retailing*, over the same period. Ongoing technological advances will continue to dampen demand for cabinetmakers, despite strong demand for wooden products. The Department of Labour (DoL) concludes that demand for cabinetmakers will be subdued in the short term.
3. The supply of cabinetmakers has been declining over time. The inflow of newly qualified cabinetmakers has been at a level (between 20 and 30 each year) that is far short of the estimated number of retirements each year (approximately 70). Net outward migration and the movement of cabinetmakers into related industries such as construction and boat building have further depleted the stock. While the number of training achievements may rise in the next few years, the increase will be far short of the levels required to stem the decline in the supply of cabinetmakers.
4. DoL predicts that the acute shortage is likely to persist because of low training levels and the loss of cabinetmakers through retirement and movement into other occupations.

Introduction

The purpose of this report is to investigate shortages of cabinetmakers in New Zealand. This report aims to provide an assessment of whether there is a shortage of cabinetmakers, the factors contributing to this situation and the outlook for shortages.

Cabinetmakers are skilled tradespeople who produce furniture, kitchen cabinets, musical instruments and other fabricated wood products. Cabinetmakers work from blueprints or drawings. They measure and mark materials, cut and shape wooden parts, prepare surfaces, and assemble the parts using fasteners and adhesives to create a finished wooden product. Some cabinetmakers work in furniture manufacturing plants where much of the work is done by computer-controlled machinery. Others work in smaller shops, creating customised wooden pieces by hand. The DoL estimates that there were approximately 4,700 cabinetmakers employed in New Zealand in 2003.

A background and technical note to this report is available from DoL. The note provides an overview of the broader Job Vacancy Monitoring Programme, of which this report is an output. It also provides a brief description of the employer survey conducted for this report and explanations of indicators and definitions used in the report.

Note on occupational classification

This report presents an analysis of the 5-digit occupational category *Cabinet Makers* (code 74211 in the New Zealand Standard Classification of Occupations). However, certain data sources, such as External Migration and Household Labour Force Survey (HLFS) are only available at the broader 3-digit category of *Cabinet Makers and Related Trade Workers* (code 742). This category includes cabinetmakers and furniture finishers. According to 2001 census data, cabinetmakers comprise 87% of this broader group. Trends measured at the broader occupational level are considered to be reflective of trends in the detailed cabinetmaker occupation because of the close association of occupations in the broader category, and the dominance of cabinetmakers in this category.

Demand for cabinetmakers

Historical demand

Employment of cabinetmakers declined by 0.6% per annum between 1996 and 2001, according to the population censuses. This compares with a similar decline in employment of 0.4% per annum for all trades and contrasts with growth of 1.2% for all occupations. According to HLFS employment of cabinetmakers has declined by 5.0% per annum in the four years to June 2004.

Table 2: employment growth of cabinet makers and related workers, 2001-2004

	Average annual growth in employment
	2001-2004
Cabinet makers and related workers	-5.0%

Source: Statistics New Zealand, HLFS

Most cabinetmakers are employed in the *furniture manufacturing, wood and paper manufacturing, and personal and household goods retailing* sectors (77% according to the 2001 census). There has been strong activity in these sectors recently, with output growing by 4.5% per annum between June 2001 and June 2004. Employment of cabinetmakers declined during this period despite strong growth in the main employing sectors primarily because the emphasis on high-volume low-cost furniture production has increased. Cost reductions and production increases have been made possible by the increasingly widespread use of computer numerically controlled (CNC) machinery in large furniture manufacturing firms. This machinery is programmed to automatically perform sequences of woodworking operations, resulting in improved production speeds, and lower staff requirements. A single person is able to programme and tend to several machines at once. As one employer interviewed during the SERA noted, 'the only reason we are doing ok at the moment is that advances in technology mean that we can get a machine to do the job'.

Future demand

Despite the availability of furniture products made from plastics and other materials, demand for wooden furniture is expected to continue growing as the population grows, personal income rises, and exports increase. The *wood, building and interiors* sector has been identified by New Zealand Trade and Enterprise (NZTE) as a growth sector. Their long-term vision for the sector is to develop value-added processing initiatives that will maximise the value of the existing radiata pine resources.¹ An increase in demand for wooden furniture will not however translate into a similar increase in demand for cabinet makers. Continuing technological advances, particularly in large furniture manufacturing firms and increasing volumes of imported low-cost wooden furniture will prevent employment of cabinetmakers from increasing significantly. The DoL concludes that demand for cabinetmakers will be subdued in the short term.

Summary

Demand for cabinetmakers declined between 1996 and 2004 due to technological changes and the uptake of computer numerically controlled machinery which reduced the input required from skilled tradespersons in the manufacture of wooden furniture. This decline occurred despite strong output growth in the three main employing sectors for cabinetmakers, *furniture manufacturing, wood and paper manufacturing, and personal and household goods retailing* over the same period. Demand for wooden products is expected to be strong in future, but ongoing technological advances are expected to continue to dampen demand for cabinetmakers. DoL concludes that demand for cabinetmakers will be subdued in the short term.

Supply of cabinetmakers

Training – National certificate (Level 4) qualifications and equivalent

This section investigates the growth in supply of *fully qualified* cabinetmakers through training. It considers three sources of supply:

1. The award of the National Certificate in Cabinet Making level 4 by the Furniture Industry Training Organisation (FITO). This is the nationally recognised qualification for cabinet makers which is designed by FITO to meet the needs of employers. It takes an average of three years to achieve.

¹ Information sourced from the NZTE website, <http://www.nzte.govt.nz/section/11759.aspx>

2. The award of the National Certificate in Cabinet Making level 4 by other providers such as polytechnics.
3. The award of qualifications apart from national certificates which are deemed to be equivalent to the national certificate in terms of level and number of credits.

The vast majority of trainees are enrolled for the national certificate with FITO. The number of enrolments in the national certificate have grown moderately between 2001 and 2003 (table 3). This will probably result in a moderate increase in the number of trainees achieving the national certificate in the future. The number of achievements for the national certificate were steady but low between 2001 and 2003 (table 4). There were no non-national certificate qualifications at the equivalent level of the national certificate awarded over this time period. A list of national certificate level 4 and equivalent qualifications and the proportion of trainees enrolled for these qualifications is provided in Appendix 1.

Table 3: number of trainees enrolled for National Certificate in Furniture Making (Level 4) and other equivalent qualifications

	National Certificate in Furniture Making Level 4 (FITO)	National Certificate in Furniture Making Level 4 (Other providers)	Other equivalent qualifications	Total
2001	396	Not available	None	
2002	404	Not available	None	
2003	485	22	None	507

Source: FITO, Tertiary Education Commission (TEC)

Table 4: number of trainees achieving the National Certificate in Furniture Making (Level 4) and other equivalent qualifications

	National Certificate in Furniture Making Level 4 (FITO)	National Certificate in Furniture Making Level 4 (Other providers)	Other equivalent qualifications	Total
2001	33	Not available	None	
2002	30	Not available	None	
2003	37	None	None	37

Source: FITO, Tertiary Education Commission (TEC)

Training rate indicators are shown in table 5. A comparison of the number of trainees achieving the national certificate (NC level 4) with the number of cabinetmakers employed yields a training rate of only 0.8% for cabinetmakers (table 5). This indicator provides a crude measure of the rate at which the supply of fully qualified cabinetmakers can potentially grow through training². This training rate for cabinetmakers is considerably lower than the average training rate of 1.8% for all trades surveyed in the SERA. Training rates for all trade occupations analysed by the DoL in New Zealand are low compared with a rate of 2.8% in New South Wales (NSW), Australia. The NSW cabinetmaker training rate is 1.7%³.

² This assumes that there is full employment of cabinet makers. This is a reasonable assumption in the current environment of low unemployment and skill shortages.

³ Source: NSW Labour Economics Office, Department of Employment and Workplace Relations.

An alternative measure of training levels is the training enrolment rate (National Certificate Level 4) which compares the number of trainees enrolled for the national certificate with the number of cabinetmakers employed. The enrolment rate for cabinetmakers was 10.4% in 2003 (table 5).

Training – Other related qualifications and courses

While the level 4 national certificate may be regarded as the qualification required to be a fully qualified cabinet maker, there are other lower level cabinet making courses and qualifications (such as the Certificate in Furniture Making – Level 2). These qualifications may be regarded as adequate to some employers of cabinet makers, especially during times of acute skill shortages. They are also of significance as these qualifications may staircase trainees towards the national certificate level 4 qualifications. Credits obtained in these qualifications may be recognised towards a national certificate level 4, should the trainee later wish to become a fully qualified tradesperson. A list of these qualifications and the number of trainees enrolled in courses leading to these qualifications is provided in Appendix 1.

Training in these courses is reflected in the training enrolment rate (all related training) which compares the number of trainees enrolled in all furniture making-related training with the number of employed cabinetmakers, and is measured at 17.1% in 2003 (table 5).

A number of other government-funded vocational educational and training programmes (including Training Opportunities, Youth Training and Skill Enhancement Training) offer trades related training which lead to credit achievement on the National Qualifications Framework⁴. A further 60 people were enrolled for this training in 2003 (see Appendix 2).

Table 5: training rates for cabinet makers, 2003

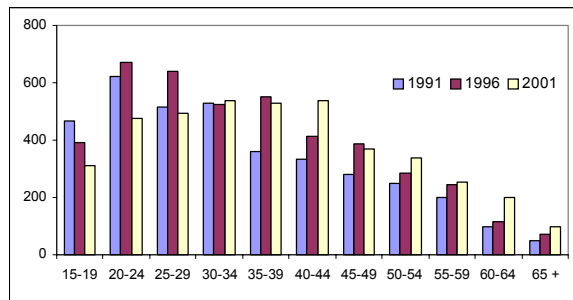
Indicator	Explanation	Cabinetmakers (NZ)	All SERA trades surveyed (NZ)	Cabinetmakers (NSW, Australia)	All trades (NSW, Australia)
Training rate (national certificate L4 and equivalent)	Number of trainees achieving relevant national certificates (level 4) and equivalent non-national certificate qualifications expressed as a percentage of employment in that occupation.	0.8%	1.8%	1.7%	2.8%
Training enrolment rate (national certificate L4 and equivalent)	Number of trainees enrolled for relevant national certificates (level 4) and equivalent non-national certificate qualifications expressed as a percentage of employment in that occupation.	10.4%	16.4%		
Training enrolment rate (all related training)	Number of trainees enrolled in all relevant courses expressed as a percentage of employment in that occupation.	17.1%	30.5%		

Source: Department of Labour (New Zealand), Department of Employment and Workplace Relations (Australia)

⁴ Enrolments in these programmes are not included in the training enrolment rate (all related training).

There are not enough apprentice cabinetmakers qualifying, even though wage increases have made the trade more attractive...

Figure 1: age profile of cabinet makers



Source: Statistics New Zealand, Census

Employers interviewed in SERA confirmed the low number of people completing their cabinetmaking qualifications. They reported that insufficient numbers of apprentices were qualifying as cabinetmakers and that there were not enough skilled cabinetmakers available to train apprentices. Figure 2 shows the large decline in young cabinetmakers between 1991 and 2001. The percentage of cabinetmakers aged 15 to 19 years decreased from 13% to 7% over this period while the proportion aged 20 to 24 years fell from 17% to 11%.

years fell from 17% to 11%.

Employers said that young people have other options to going into the trades, but noted that because wages were increasing, trades might become more attractive again.

Migration

Migration data for cabinetmakers, like HLFs data, is presented at the broader occupational group level of *cabinetmakers and related workers*.

Between 1998 and 2003, New Zealand experienced a net outflow of 209 cabinetmakers and related workers (table 6), which accounted for approximately 4% of the total cabinetmaker workforce. This trend reversed in 2004, with a small net gain of 14 cabinetmakers and related workers. With overall net inward migration expected to slow considerably over the next year, DoL concludes that migration is unlikely to significantly boost the supply of cabinetmakers in the short term.

Table 6: permanent and long-term (PLT) annual arrivals, departures and net migration of cabinetmakers and related workers, June years

	1998	1999	2000	2001	2002	2003	2004
PLT annual arrivals	58	51	52	37	46	57	61
PLT annual departures	80	101	109	92	65	63	47
PLT annual net migration	-22	-50	-57	-55	-19	-6	14

Source: Statistics New Zealand, External Migration

Retirement

It is estimated from the 2001 population census that approximately 1.4% of the cabinetmaker workforce retires each year. This amounts to a loss of approximately 70 cabinetmakers each year.

Occupational wastage

There is anecdotal evidence that cabinetmakers have been moving into other occupations. Employers interviewed for the SERA reported that higher wages offered by the construction and boat building industries have depleted the stock of cabinetmakers in the furniture manufacturing and shop fitting industries.

Summary

The supply of cabinetmakers has been declining over time. The inflow of newly qualified cabinetmakers has been at a level (between 20 and 30 each year) that is far short of the estimated number of retirements each year (approximately 70). Net outward migration and the movement of cabinetmakers into related industries such as construction and boat building have further depleted the stock. While the number of training achievements may rise in the next few years, the increase will be far short of the levels required to stem the decline in the supply of cabinetmakers.

Employer recruiting experiences

Is there a shortage of cabinetmakers?

The SERA results suggest that there is a severe shortage of cabinetmakers in New Zealand. Employers included in the survey filled only 32% of their positions within six weeks of advertising and had only three suitable applicants for every 10 vacancies (see table 7). These figures are somewhat lower than the average for all trades surveyed in the SERA.

Table 7: employer recruitment experiences

	Number of employers	Number of Positions	Positions filled	Fill rate	Suitable applicants	Average number of suitable applicants
Cabinetmaker	18	31	10	32%	10	0.3
All trades surveyed	240	453	186	41%	337	0.7

Source: Department of Labour, SERA

What are employers paying?

Cabinetmaker wage rates offered by employers included in the SERA were slightly lower than the average wage for all trades in the survey, but considerably higher than the average wage for cabinetmakers measured in the Labour Cost Index (LCI).

Table 8: cabinetmaker wage rates

	Mean
SERA – cabinetmakers	\$19.47
SERA – all trades surveyed	\$20.60
LCI – cabinetmakers	\$15.44
LCI – all trades	\$19.54

Source: Statistics New Zealand (LCI), Department of Labour (SERA)

Changes in market conditions

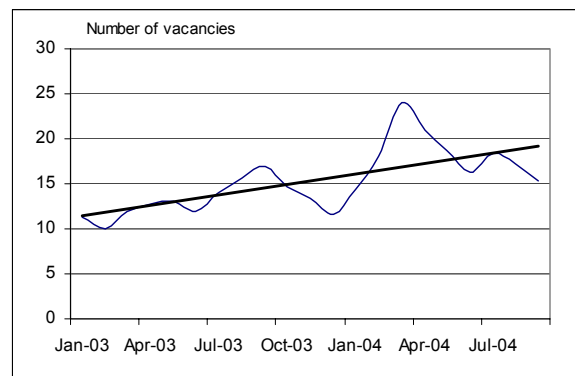
The number of advertised vacancies recorded in the Department of Labour's Job Vacancy Monitor has fluctuated over time but has shown an upward trend (figure 2). This suggests that recruitment conditions have become increasingly difficult for employers since the beginning of 2003. This is confirmed by SERA results in which employers were

asked whether it was easier or harder to fill a vacancy compared with twelve months earlier. A net 75%⁵ felt it was more difficult.

Outlook

The acute shortage of cabinet makers is likely to persist over the next twelve months. This is despite the fact that labour-saving technological developments will continue to dampen demand for cabinetmakers. The shortage will be driven by a continuing decline in the supply of fully qualified cabinet makers. Current and future training at national certificate level 4 will be insufficient to compensate for the loss of cabinetmakers from retirement, movement into other occupations and net migration.

Figure 2: number of advertised vacancies



Source: Department of Labour, Job Vacancy Monitor

For further information, contact:

Hamsa Lilley, ph. 04-915 4465, hamsa.lilley@dol.govt.nz

Andrew Whiteford, ph. 04-915 4568, andrew.whiteford@dol.govt.nz

Disclaimer: The Department of Labour has made every effort to ensure that the information contained in this report is reliable, but makes no guarantee of its accuracy or completeness and does not accept any liability for any errors. The information and opinions contained in this report are not intended to be used as a basis for commercial decisions and the Department accepts no liability for any decisions made in reliance on them. The Department may change, add to, delete from, or otherwise amend the contents of this report at any time without notice. The material contained in this report is subject to Crown copyright protection unless otherwise indicated. The Crown copyright protected material may be reproduced free of charge in any format or media without requiring specific permission. This is subject to the material being reproduced accurately and not being used in a derogatory manner or in a misleading context. Where the material is being published or issued to others, the source and copyright status should be acknowledged. The permission to reproduce Crown copyright protected material does not extend to any material in this report that is identified as being the copyright of a third party. Authorisation to reproduce such material should be obtained from the copyright holders.

⁵ The net estimate is calculated by subtracting the percentage of employers who found it harder to fill the vacancy from the percentage of employers who found it easier to fill the vacancy. This sum is then divided by one, less the percentage of employers who did not answer this question.

Appendix 1: TRAINING ENROLMENTS FOR CABINETMAKER TRADE: 2003

Enrolments in National Certificate Level 4 and equivalent qualifications: 2003

Qualification Title	Qualification Code	Provider Name	Level	Credits	Share of Enrolments (%)
NC in Furniture Making	NC5228	Furniture ITO	4	144	95.7%
NC in Furniture Making	NC5228	Christchurch Polytechnic Inst of Tech	4	144	4.3%
					100.0%

Enrolments in other qualifications

Qualification Title	Qualification Code	Provider Name	Level	Credits	Share of Enrolments (%)
MIT Certificate in Furniture Making	MN4433	Manukau Institute of Technology	2	60	2.9%
NC in Furniture Trades (Intro to Manufacturing)	NC5226	Christchurch Polytechnic Inst of Tech	2	56	10.7%
NC in Joinery - Cabinetry	NC5566	Joinery ITO	3	88	64.8%
NC in Furniture Making	na	Furniture ITO	3	104	3.3%
LCP Furniture Making	na	Furniture ITO	4	na	1.2%
LCP Furniture Making	na	Furniture ITO	4	na	11.5%
LCP Furniture Making	na	Furniture ITO	4	na	5.7%
Total					100.0%

Enrolments in Training Opportunities Programme, Youth Training and Skill Enhancement Training related to the cabinetmaker trade

Course name	Programme type	Share of Enrolments (%)
Cabinet Making & Joinery	YOUTH	26.7%
Cabinet Making & Joinery	YOUTH	31.7%
Carpentry & Furniture making	YOUTH	41.7%
Total		100.0%