

THE AUSTRALIA-BORN IN NEW ZEALAND

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TABLE OF CONTENTS

<u>Chapter</u>		<u>Page</u>
	ACKNOWLEDGEMENTS	v
	LIST OF FIGURES	vi
	LIST OF TABLES	viii
	ABSTRACT	x
	INTRODUCTION	1
ONE	THE AUSTRALIA-NEW ZEALAND RELATIONSHIP	5
	Origins of the Trans Tasman Relationship	5
	- The Early Settlers	7
	- The Nature of Trans-Tasman Links	8
	The Federation Issue	11
	Relationships in the Twentieth Century	14
	The Trans Tasman Travel Arrangement	16
	- Origins	17
	- Post-War Extensions	18
	- Concern for Control	19
	The Present Situation	20
	Statistics and Migration Studies	22
TWO	METHODOLOGICAL CONSIDERATIONS	25
	Data and Definitions	25
	Age-Specific Rates of Migration	29
	Internal and International Characteristics of Migration	29
	Return Migration	32

<u>Chapter</u>		<u>Page</u>
	New Zealand International Migration Data	33
	- Categories of Migrants	34
	- Category Jumping	36
	- Census Data on International Migration	37
	- The Birthplace Question	39
THREE	THE AUSTRALIA-BORN POPULATION, 1961-1981	41
	The Population Base	41
	Age-Sex Characteristics	44
	- Age Composition	44
	- Sex Ratios	50
	Duration of Residence	52
	Statistical Area of Residence	54
	Industrial Division	56
	Conclusion	61
FOUR	THE AUSTRALIA-BORN MIGRANT FLOWS 1981-1986	63
	Migrant Flows	64
	Age-Sex Characteristics	69
	- Population Age Structures	71
	- The Australia-born Residents and Migrants	72
	- Indices of Dissimilarity for the Australia-born	75
	- Sex Ratios	76
	Occupation Characteristics of the Australia-born	79
	- Proportions of the Australia-born, 15-64 employed	79
	- Occupation Structure	81
	Conclusion	86

<u>Chapter</u>		<u>Page</u>
FIVE	THE AUSTRALIA-BORN RESIDENTS 1981 AND 1986	88
	Age-Sex Characteristics	89
	- Age Structure	89
	- Sex Ratios	93
	- Usual Residence Five Years Previously	95
	Occupational Structure	100
	- Labour force Participation	102
	- One digit occupation codes	104
	Conclusion	109
	CONCLUSION	111
	The Importance of a Historical Framework	111
	The Migration Process	113
	Data Limitations	113
	- Problems with definitions	114
	- Changes to statistical data	115
	- Problems of inter-relating the census and migration data	115
	Future Research Priorities	116
	BIBLIOGRAPHY	117
	APPENDICES	122

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LIST OF FIGURES

<u>Figure</u>		<u>Page</u>
1.1	Australia-born, New Zealand-born and total overseas-born in New Zealand, 1867-1986.	9
1.2	Australia-born and a percentage of the Total Overseas-born, Total Overseas-born as a percentage of the Total population, 1867-1986.	13
3.1	Resident Australia-born and Total Resident Population as percentages of respective Total Populations, 1976 and 1981.	42
3.2	Profiles of the Australia-born, New Zealand-born and other overseas born, 1961-1981.	46
3.3	Sex Ratios of the Australia-born, New Zealand-born and other overseas-born, 1961-1981.	51
3.4	Percentage of each Birthplace resident in Statistical Areas.	53
3.5	Industry Division of Australia-born, New Zealand-born and other overseas-born males and females, 1961-1981.	57
4.1	Age-Sex Structure of the Australia-born Residents, 1981; and Australia-born Total Arrivals and Departures, 1981-1986.	70
4.2	Age Composition of the Australia-born and New Zealand-born Residents, and other overseas-born, 1981; and Total Australia-born Arrivals and Departures, 1981-1986.	73
4.3	Occupation Structure of Australia-born, New Zealand-born, Residents, 1981; and PLT Arrivals and Departures, 1981-1986.	82
5.1	Age Composition of the Australia-born, New Zealand-born and other overseas-born Residents, 1981 and 1986; Total Australia-born Arrivals and Departures, 1981-1986.	90

<u>Figure</u>		<u>Page</u>
5.2	Age-Sex Structure of the Australia-born aged 5 years and over by country of Usual Residence 5 years ago, 1986.	99
5.3	One digit occupation codes of the Australia-born New Zealand-born and other overseas-born, 1981 and 1986.	105
5.4	Stated Occupations of Employed Australia-born Residents 1981 and 1986; and PLT Migrants 1981-1986.	108

LIST OF TABLES

<u>Table</u>		<u>Page</u>
3.1	Index of Dissimilarity for the Australia-born and (a) New Zealand-born, (b) other overseas-born Age Groups; 1961 and 1976.	49
3.2	Percentage of Birthplace Population Resident in Auckland, 1961 and 1976.	55
3.3	Index of Dissimilarity for the Australia-born and (a) New Zealand-born, (b) other overseas-born distribution by Statistical Area, 1961 and 1976.	56
3.4	Australia-born, New Zealand-born and other overseas-born males employed in Industry Division 1 expressed as a percentage of 15-64 year olds, 1961 and 1981.	59
3.5	Index of Dissimilarity for the Australia-born and (a) New Zealand-born, (b) other overseas-born by Industry Divisions; 1961, 1971, 1981.	60
4.1	Net migration of the Australia-born migrants by migrant categories, 1981-1986.	65
4.2	Differences in the values between PLT and Total Arrivals/Departures, 1981-1986.	68
4.3	Index of Dissimilarity for the Australia-born migrants, Age Structures 1981-1986, compared to the Australia-born Residents, 1981.	75
4.4	Sex Ratios for migrant categories, 1981-1986.	78
4.5	Proportion of Employed Australia-born, New Zealand-born residents, 1981 and Australia-born PLT Arrivals and Departures, 1981-1986.	80
4.6	Percentage difference for one digit occupation codes for the Australia-born, Residents and PLT Australia-born Arrivals and Departures, 1981-1986.	84

<u>Table</u>		<u>Page</u>
5.1	Sex Ratios of the Australia-born, New Zealand-born and other overseas-born Residents 1981 and 1986; and Total Australia-born Arrivals and Departures, 1981-1986.	94
5.2	Sex Ratios of the Australia-born Residents, 1981 and 1986; and Total Arrivals and Departures, 1981-1986, by Age Group.	96
5.3	Australia-born aged 5 years and over by place of Usual Residence 5 years previously.	98
5.4	Australia-born and New Zealand-born Residents, proportion employed, 1981 and 1986.	103

ABSTRACT

This thesis examines the characteristics of the Australia-born population in New Zealand with particular reference to the intercensal period of 1981-1986. Growth in the Australia-born population is placed in the context of links between New Zealand and Australia since the early twentieth century. Two types of statistical data (cross-sectional and longitudinal) are utilised to provide information on both the resident and migrant component of this population. An analysis of the contribution of migrant flows to the population stock enumerated at each census provided an insight into the evolution of the Australia-born population over time.

The "uniqueness" of the characteristics of the Australia-born population is examined by contrasting this population with the New Zealand-born and other overseas-born populations. The characteristics of Australia-born migrants, and their unrestricted access to New Zealand, mean that theories of internal rather than international migration may be more appropriate to analyse trans-Tasman population movements. In this regard the distinction between internal and international migration is not particularly suitable and the types of migration should be viewed more as a continuum.

INTRODUCTION

This research aims to explore aspects of the geography of the Australia-born population in New Zealand, with special reference to the period 1981-1986. Relatively little has been written on the impact of the Australian component on trans-Tasman movements on the population geography of New Zealand. The characteristics of trans-Tasman migrants have been examined in some detail (see Farmer and Andrew, 1980 and Bedford and Brown 1986) but the resident populations of Australia-born in New Zealand and the New Zealand-born in Australia have received only passing attention from geographers and others (see Hugo, 1987 and Borrie, 1987).

In this thesis characteristics of the Australia-born in New Zealand will be examined using the 1981 and 1986 census data and international migration statistics for the intercensal period. In order to link the census and international migration data it is necessary to utilise birthplace data rather than "resident" or "nationality" status. Birthplace provides the only locational link between the census material and the international migration data obtained from arrival and departure cards. Birthplace is therefore the most useful variable to use in a study of the geographical implications of an overseas-born group in New Zealand. Also, in the case of the Australia-born, the majority of migrants come from Australia, i.e. in 1983-1984 88.4% of the Australia-born arrivals stated their

last country of permanent residence was Australia (Unpublished table, Department of Statistics).

Andrew (1980) attempted to assess some of the implications of trans-Tasman migration for population change in New Zealand. This thesis differs substantially from his approach by focusing on the characteristics of a migrant population in a country rather than the characteristics of a population moving between two countries. Differences also exist between the two theses in terms of the statistical data used. Andrew placed a heavy reliance on international migration data; in this thesis statistical data from two sources are used in an attempt to link much more closely New Zealand census data with New Zealand international migration statistics.

A strictly demographic approach to this international population movement would not do justice to many of the relevant concepts and theories which are discussed in Chapter two. This is particularly true concerning the trans-Tasman movement which has unique aspects to it concerning the low level of policy interference by governments on both sides of the Tasman.

The influence of the Australia-born in New Zealand is not a recent phenomenon as far as pakeha history is concerned, and yet the close association between New Zealand and Australia, created in part by the Australia-born resident in New Zealand and the New Zealand-born resident in Australia, has often been ignored.

This tendency to underplay the importance of the Australia-born was noted in the late 1940s by Andrew H. Clark (1949,74) -

Despite the evidence of continuing and increasing movement of men (sic) and skills from the Australian colonies to New Zealand, both before and after 1840, interest in the origin of the earliest organised (pakeha) settlements has been concentrated too closely on the British Isles. It is essential that we be familiar as well with contemporary circumstances across the Tasman Sea.

A major objective of this thesis is to attempt to link the characteristics of the Australia-born resident in New Zealand to the characteristics of the Australia-born migrants, 1981-1986.

THESIS OUTLINE

The thesis is organised into five substantive chapters, two of which deal specifically with the period 1981-1986.

Chapter One: Historical Overview. This chapter outlines the importance of Australian links with New Zealand since the beginning of pakeha history. Not only has Australia had a profound influence on the development of a great deal of New Zealand policy relating to immigration and trade but the numbers of the Australia-born in New Zealand although unresearched until recently have also had an important effect on New Zealand.

Chapter Two: Methodological Issues. This chapter explores definitions of the migration phenomenon and relates this to data available on trans-Tasman migration. Concepts relevant to this study such as internal/international migration and return/repeat migration are examined in the context of research on the Australia-born in New Zealand.

from 1961 to 1981 using available census data to examine characteristics such as age-sex selectivity, duration of residence, areal distribution throughout New Zealand and the occupation structure of the Australia-born compared to the New Zealand and other overseas-born.

Chapter Four: Migrants 1981-1986. In Chapter Four international migration data is utilised for 1981-1986, the period between the 1981 and 1986 census of population and dwellings, to provide information on the age-sex and occupation structure of the Australia-born permanent and long-term migrants as well as total arrivals/departures.

Chapter Five: Residents 1981-1986. Chapter five then re-examines the census data for the same period, 1981-1986, in order to place the evolving Australia-born subgroup within a context of the New Zealand resident population as a whole.

CHAPTER ONE

THE AUSTRALIA-NEW ZEALAND RELATIONSHIP

It seems reasonable to assume as McCaskill (1982, 6) does that prior to the coming of white people there was no human contact between the Australian continent and the islands of New Zealand. The indigenous Aboriginal and Maori populations have quite different cultural heritages and histories: there are no links through oral tradition or customs between these peoples. The trans-Tasman population exchanges were initiated by European commercial and imperial expansion in the late eighteenth century, and the British Government's decision to "dump convicts", who could no longer be sent to former colonies in North America, on Australia's east coast at Botany Bay in 1788 (Howe, 1984, 91) was particularly significant in this regard. The penal colony in New South Wales could not produce enough food for its own requirements and the neighbouring islands of New Zealand and the tropical Pacific became the colony's first resource frontier. In this chapter the history of links between Australia and New Zealand is outlined to provide a background to contemporary trans-Tasman population movements.

ORIGINS OF THE TRANS-TASMAN RELATIONSHIP

The first Europeans to spend some time in New Zealand were the transient sailors who came, via Australia usually, for supplies of timber and flax in order to satisfy the ship

building demands of the Northern Hemisphere. New Zealand, far from being an important source of these raw materials, was just part of the Antipodes reached through Australia. The next important group of transients were the sealers and whalers of the 1820s and 1830s. Possibly their stays in New Zealand were of longer duration due to the processing of seal and whale culls.

Even at this early stage of pakeha history, it is possible to see a core-periphery relationship developing between New Zealand and Australia (McCaskill, 1982, 6) which was part of a larger core-periphery relationship existing between the United Kingdom and the Antipodes. New Zealand was the furthest flung outpost in this system, and ships to New Zealand were generally directed through the developing ports of Australia's eastern seaboard. It is possible to see a number of reasons why the British interests in New Zealand were channelled through the fledgling port of Sydney especially. In Sydney provisions such as fresh produce and a range of services to obtain more sophisticated repairs than could be carried out during voyages were available by the early nineteenth century. Even rudimentary financial services were on offer, and many of the whaling and sealing companies operating in the South Pacific had an office in Sydney.

In 1839 New Zealand was annexed by the British Government as part of New South Wales. In November of 1840 it was declared a colony separate from New South Wales by charter which became legally effective in 1841 (McCaskill, 1982, 7). After this time migration as a means of organised settlement of the newly acquired lands began in earnest.

An immigration policy encouraging settlement of Europeans in New Zealand had its origins in the 1840s.

The Early Settlers

For most of last century and perhaps much of the present, New Zealanders have clung tightly to the assumption that they are superior to their Tasman neighbours. This began with a belief in New Zealand's white population that they were of selected stock compared to the Australians, even if the settlement by Europeans of New Zealand actually had its beginnings as part of the Australian frontier (Olssen, 1987, 35).

The British settlers coming to New Zealand were not only British, but "best British" (Sinclair, 1959, 305) and they tended to ignore the large numbers of settlers either coming via Australia or as Australia-born people. During the early promotion phase of New Zealand for settlers (approximately 1840-1879) it is not surprising that no New Zealand settlement looked to Australia to provide people - the much feared taint of conviction and the squattocracy (Borrie, 1987, 204) were in direct conflict with the mainstream middle-class ideals and aspirations that ruled New Zealand. The migrants to New Zealand from Britain were almost overwhelmingly from the "middle-class" and a relatively narrow band of settler selection helped reinforce ideas and assumptions held by the majority. Few Europeans were present to challenge the image of New Zealand as a British middle-class rural utopia.

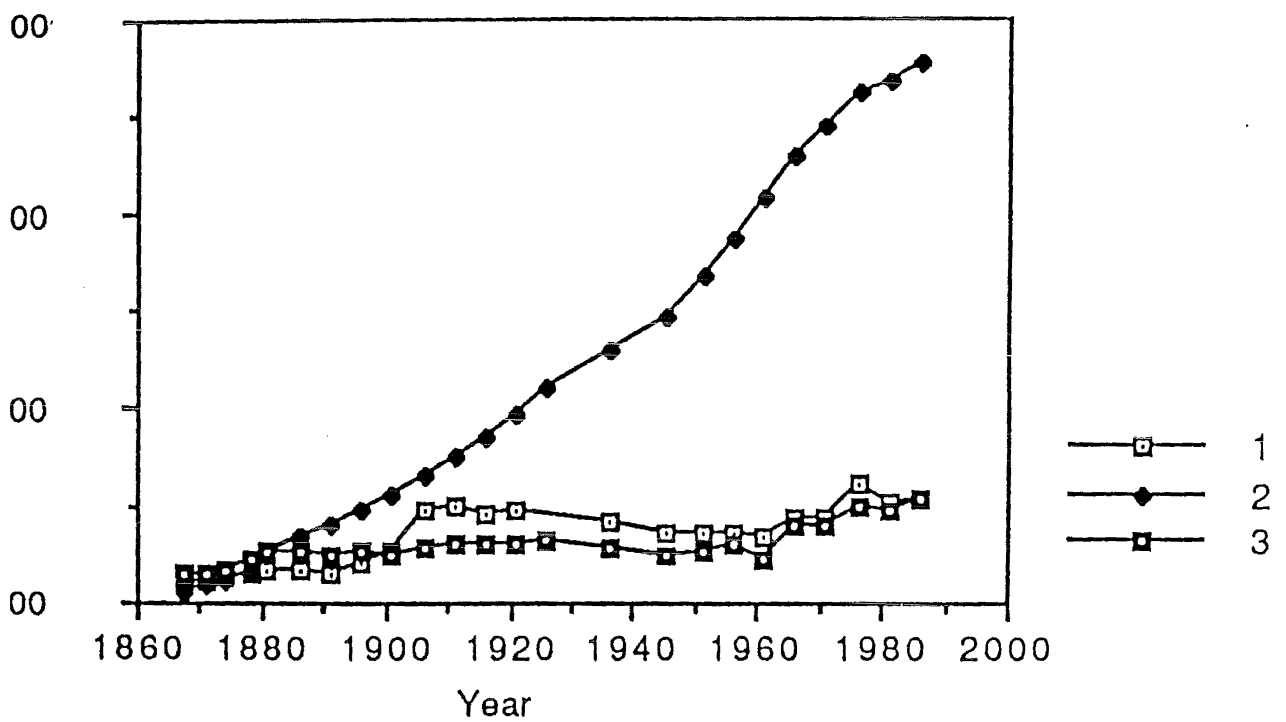
Despite this orientation towards England, links across the Tasman were strong and much of New Zealand's development in the nineteenth and early twentieth centuries can be

attributed at least in part to development in Australia. The gold rushes of the 1850s in Victoria and New South Wales conveniently supplied a market for much of New Zealand's semi-perishable produce from the planned settlements. Australia also provided fine examples of what New Zealand's planners wished to avoid, i.e. Wakefield's perfect societies were shaped in part by the worst in New South Wales and the North American West (Olssen, 1987, 36). The rapid growth of pastoralism, particularly in the South Island, can also be linked to the Australian experience. Australian sheep, and Australian-created financial and marketing arrangements were tapped into by New Zealanders, thus strengthening the core-periphery relationship referred to earlier (Olssen, 1987, 39). Despite the heavy emphasis on British-born migrants, the previously Australian resident component was important to New Zealand. The gold rushes in New Zealand in the 1870s are just one example of what attracted the migrants from Australia to New Zealand. While many of the early trans-Tasman migrants were British-born, by the late nineteenth century the colonial born including those born in New Zealand came to dominate. In 1881 the New Zealand-born excluding the Maoris totalled 267,501, the Australia-born were 17,277 while the total overseas-born excluding the Australia-born numbered 248,419 (see also Price, 1980, 66 and Figure 1.1).

The Nature of Trans-Tasman Links

The Tasman Sea was crossed for many reasons, both by those wishing to create as well as to sever links between Australia and New Zealand. Those wishing to create bonds on an organised level included banking and insurance firms,

Figure 1:1. Numbers of the Australia-born, New Zealand-born and other overseas-born (Total Population) 1867-1986.



1 Australia-born (x 10)
 2 New Zealand-born
 3 Total overseas-born

or more informally educators and clergy. Those wishing to sever bonds were bigamists, blacklisted, divorced, deserters, bankrupts or people "known to the police" (Arnold, 1987, 53). Many careers were dependant on trans-Tasman migration due to the core-periphery relationship between the more urbanised Australia (Sydney and Melbourne especially) and the more rural New Zealand. This highlights the fact that New Zealand and Australia were rarely seen as distinct or separate. The "constant" (Sinclair, 1986, 96) or "perennial" (Arnold, 1987, 53) interchange was very much a part of a colonial common labour market that meant unrestricted movement between New Zealand and Australia for anyone able to afford their passage (Boyd, 1979, 47).

Sinclair (in Hearn, 1982, 61) argues that much of the impetus of trans-Tasman migration stemmed from the Australian and New Zealand economies being out of phase. During New Zealand's depression of the late 1870s and 1880s, Melbourne was experiencing a building boom, in the 1890s New Zealand was undergoing an upturn in fortune while Victoria's economy was depressed. At the turn of the century, the time of the "Federation" issue, much of Australia was in the grip of a severe drought while the New Zealand economy was expanding.

The 1870s and 1880s were an important period in the nineteenth century for New Zealand. The depression years of the 1870s and 1880s are reflected in the drop in the Australia-born percentage in the population from 7.6 in 1874 to 6.2 percent in 1891. The depression, particularly in the 1880s, meant restrictions on immigrants. Generally the restrictions were on entry of people of non-British or Irish parentage or birth, primarily the Chinese many of whom were

not interested in permanent settlement (Farmer, 1985, 59-60). **Farmer** (1985, 59) states that this is when a "white New **Zealand**" sentiment first appeared on the Otago goldfields, **influenced** by similar anti-Chinese feelings in Australia.

THE FEDERATION ISSUE

n the 1880s the issue of federation of the New **Zealand** and Australian colonies was first raised. In Sydney **in 1883** a decision by representatives of all colonies, **including** New Zealand, to set up a federal council was **reached**. At subsequent meetings in Melbourne in 1890 and Sydney in 1891, the New Zealand delegates showed little support for the idea. At the 1891 meeting New Zealand was no longer represented at the federal conferences (Sinclair, 1986, 110). The reasons for New Zealanders lack of interest are many. Sinclair (1959, 280) pinpoints the beginnings of national consciousness during the 1880s and 1890s as an important reason. As noted earlier, in the late 1880s the local-born population began to outnumber the immigrants to New Zealand slightly lessening the direct British influence gained through the arrival of British-birth.

The feelings of New Zealanders regarding their identity as New Zealanders, Australians or transplanted British was not the only issue that was involved. New Zealand at that time eschewed federation with the Australian colonies partly in the hope of becoming part of an "Imperial Federation" with Britain, and partly because of fears of being swallowed up in the new Australian federation. As Sinclair (1982, 17) states, Australian-New Zealand relations in the 1890s and the early twentieth century were pulled

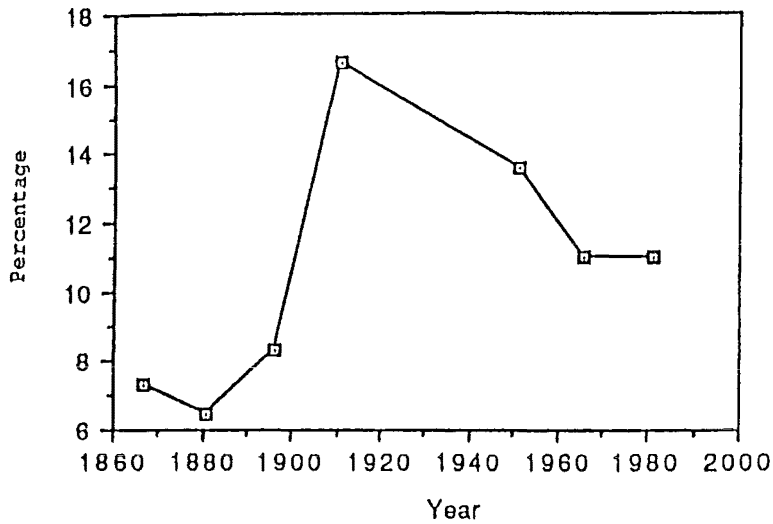
together by geographical closeness and a British background to their white settlements but pulled apart by economic fortunes and nationalism.

The waxing and waning of the fortunes of New Zealand and Australia in the late nineteenth century created an ebb and flow of migrants across the Tasman. The economies were not compatible, they were in fact rivals in terms of markets and many of their exports (Sinclair, 1987, 100). What was a loss for one country signalled a gain for the other, not only in terms of markets, but also in population numbers. At the time that the federation issue was being debated, the Australia-born as a percentage of the total overseas-born increased dramatically from 6.2 percent in 1891 to 16.8 percent in 1906 (Figure 1.2). In terms of actual numbers the increase was from 15,943 Australia-born in New Zealand in 1891 to 47,256 Australian-born in New Zealand in 1906.

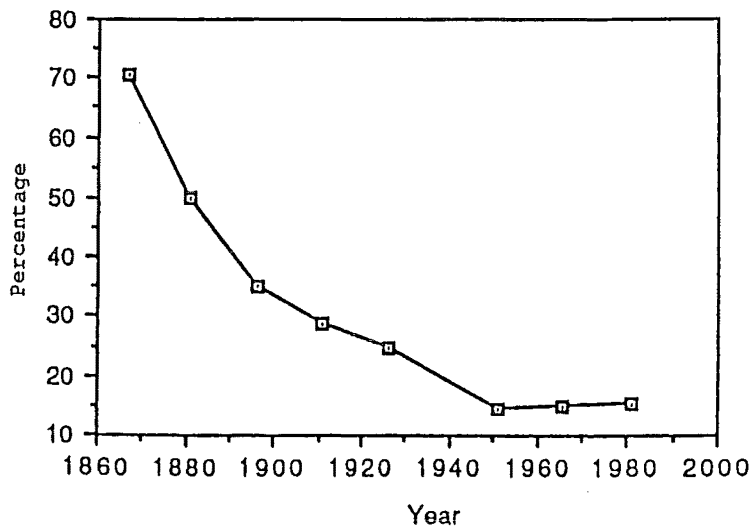
Federation in turn accentuated social contrasts between the two countries particularly over the issues generated by the proposal to form a national federation of unskilled workers in 1909 in New Zealand. The idea of an organised group such as a national federation of labour to support the working class was anathema to much of the rural-based middle-class in New Zealand. The "red feds" behind this proposal were commonly portrayed in newspapers as socialists, catholics and foreigners from Europe even though many of the accents were Australian. This encouraged fears in New Zealand of possible absorption by an Australia that seemed suddenly to be radically different from New Zealand (Arnold, 1987, 67). In turn this helped push the governments of the two countries further apart politically during the early twentieth century, coming together only in

Figure 1:2. Australia-born as a percentage of the Total Overseas-born, and the Total Overseas-born as a percentage of the Total Population, 1867-1986.

Australia-born as a Percentage of the Total Overseas-born



Total Overseas-born as a Percentage of the Total Population



times of war and then only as "indivisible parts" of the imperial forces (James, 1982, 8; also see Holmes, 1966, 39).

With the rejection of federation, political relations between New Zealand and the Australian colonies were reduced. This does not mean that they were totally unfriendly, rather that each country was closer to Britain than to their respective near neighbour. At the same time trans-Tasman flows continued between the two countries unabated and the history of migration policy relating to these flows is a history of special arrangements.

RELATIONSHIPS IN THE TWENTIETH CENTURY

The initiative for making the New Zealand and Australia relations closer in the post federation years has come mainly from New Zealand (Burnett, 1972, 38). There have been three major agreements for this purpose in the twentieth century, the Canberra Pact of 1944, the Nafta Agreement signed in August 1965, and Closer Economic Relations (CER) signed in 1983.

The Canberra Pact of 1944 was initially thought of as a way of asserting Australian and New Zealand political views in a world forum, acting together and in consultation over mutually important matters. However, as the spirit of co-operation during World War Two faded so did the spirit of co-operation at a political level. The 1950s saw the growing imbalances of trade in favour of Australia, with some clashes of interest between New Zealand and Australia. At the same time the numbers of Australia-born within New Zealand dwindled from 42,009 in 1936 to 35,412 in 1961, despite the fact that the post war years saw major growth in both Australia and New Zealand.

The next major attempt at more formal co-operation over trade was the Nafta Agreement of the mid 1960s. Nafta came into force on the 1st of January 1966 initially for a 10 year period. Nafta however failed to live up to expectations regarding free trade. It resulted in institutional protectionism on some goods while allowing limited free trade on others. The outcome was rancour on both sides of the Tasman and claims that the other partner benefitted significantly from the relationship.

The most recent effort to improve trade relationships has been Closer Economic Relations, or CER. The major objective of CER is free trade in all products by the mid 1990s. Since CER has been in place the New Zealand and Australian economies have become increasingly interdependent. CER is bringing about a liberalisation and expansion of trans-Tasman investment, processes which are benefitting both countries. Labour flows have intensified as a result of the economic linkages fostered by trade, investment and tourism. CER can be seen as an important facet of New Zealand's history "because it is about distance and our response to it" (James, 1982, 15), as New Zealand seeks new markets and attempts to trade with new partners closer to New Zealand.

While the New Zealand Government has looked to Australia in terms of closer formal trade relations, New Zealand's immigration policies from the 1940s continued to have a heavy reliance on Britain and Europe. Britain provided the bulk of migrants for the assisted passage schemes of the late 1940s and 1950s (Belshaw, 1952, 6).

Possibly one of the most important factors concerning immigration was the 1947 British Commonwealth scheme of

reciprocal legislation (Burnett and Burnett, 1978, 67).

This legislation allowed for common status as British subjects throughout the Commonwealth as well as separate national citizenship. Australia and New Zealand now focus on residence as a more important test of citizenship.

In 1974 controls were imposed on all migrants coming to New Zealand except those entering under the Trans-Tasman Travel Arrangement or TTTA. Immigration policy after 1974 placed emphasis on work skills, while provision was made for New Zealand's "special relationship" with some countries in the South Pacific. While this change does not necessarily point to closer ties to Australia at the expense of other countries, the New Zealand government has formally made a gradual move away from the almost total reliance on the Northern Hemisphere for migrants and markets.

THE TRANS-TASMAN TRAVEL ARRANGEMENT

The migration of people between New Zealand and Australia is governed by special conditions in both countries. There are two main reasons for this special relationship. The first is the geographical proximity of Australia and New Zealand to each other compared to the rest of the world and more especially to another country where white people so significantly outnumbered the indigenous races. Secondly, as has been shown in previous sections, there has been considerable interdependence in the development of the two countries - an interdependence fostered by the free and frequent movement of people across the Tasman. The relative ease of crossing the Tasman meant that close personal ties were formed by families, businesses and institutions.

Origins

The Trans-Tasman Travel Arrangement can be seen as a formal recognition of the links between the two countries. It is perhaps a more sensitive and accurate measure of Tasman relations than many other agreements. The original exchange of notes between the two Prime Ministers occurred in 1920 before Australia or New Zealand citizenship was created in the 1940s (New Zealand Department of Labour, Immigration Division file). Originally travellers were divided into three basic groups:

- (i) natural-born British subjects (and wives) requiring no documentation;
- (ii) British subjects by naturalisation upon whom no entry restrictions were placed; and
- (iii) aliens with consular representatives in Australia.

There were also aliens with no consular representation in Australia who were prohibited from landing in either country. The undesirables included Russians, Germans, Austro-Germans, Bulgarians, Hungarians and Turks of the Ottoman race. Chinese and "coloureds" also had difficulty in entering either country. The New Zealand immigration legislation preceding the 1920 arrangement can be seen as a reflection of Australian immigration legislation, most particularly the Australian Immigration Acts of 1901, 1920 and the Australian Passports Act of 1920.

Before and after the Trans-Tasman Travel Arrangement of 1920, the white British received significantly better treatment from the immigration officials on both sides of the Tasman than aliens did. There was a clear distinction between the British and the aliens who had their passports held by immigration authorities for the limited periods that

they were allowed to remain in either country. This differentiation is also shown by the fact that ship log books distinguished between British subjects, British subjects resident in either New Zealand or Australia, and aliens.

Post-War Extensions

After World War Two it was recognised by Australian and New Zealand officials that there was a need for change. Australian immigration officials wished to extend the Trans-Tasman Travel Arrangement to its naturalised citizens, while New Zealand officials wanted better treatment for Maoris and Polynesians. By 1948 Maoris and Aborigines were explicitly included in the Arrangement, their inclusion had been implicit before this (New Zealand Department of Labour, Immigration Division file). It is not clear at which stage the rights of the Trans-Tasman Travel Arrangement were extended to include naturalised citizens of Australia and New Zealand. Records maintained by the Immigration Division of the New Zealand Department of Labour suggest that Australia extended the arrangement to encompass naturalised New Zealanders in 1955, while New Zealand reciprocated in the early 1960s.

While these changes represented a move forward in terms of acceptance of other citizens by officials, the permission to land in Australia or New Zealand for non-white New Zealanders and Australians was given on condition that the stay was to be no longer than six months and evidence of a fully paid outward passage was shown.

The 1960s can be seen as a time of significant change within New Zealand. World-wide air travel was rapidly developing, and within New Zealand an industrial boom was taking place. Not only was air travel in the 1960s greatly facilitating the movement of people across the Tasman, but there was also an increased demand for skilled workers in New Zealand that could not be met by the local population. During the 1960s there was an increase in the Australia-born population within New Zealand from 35,412 in 1961 to 44,084 in 1971. This "boom" is examined in more detail in Chapter 3.

Concern for Control

The demand caused by skilled labour shortfalls in New Zealand put increased pressure on the Trans-Tasman Travel Arrangement. By the early 1970s both countries had proponents of identification cards, passports or some sort of documentation check for trans-Tasman travellers. New Zealand officials were particularly enthusiastic about these changes following the increased numbers of unemployed in Australia in 1974 and the possibility of migration to New Zealand generated by employment pressures within Australia. On the other side of the Tasman, Australian officials were keen to introduce some measures to reduce numbers of "would-be" migrants possibly using New Zealand as a "back door" to Australia. Despite these concerns, the Prime Ministers of both countries reaffirmed the Trans-Tasman Travel Arrangement in 1973.

New immigration controls were imposed by New Zealand in April 1974 and Australia in January 1975 with a view to

restricting citizens of other Commonwealth countries seeking entry to either Australia or New Zealand. This restriction was brought about partly because of a perceived need to preserve employment opportunities for their own citizens (this change did not affect Irish or British subjects resident in either New Zealand or Australia). By mid 1975 government officials in Australia and New Zealand were again dissatisfied with the Agreement. This time the Australian government was even more concerned over the possibility of new settlers entering Australia via New Zealand and wished to control the flow rather than attempt to completely stop it. By mid 1975 an impasse between Australia and New Zealand governments appeared to be looming. This problem continued to attract attention in the respective Immigration Divisions throughout the 1970s, until Australia decided passports (and visas for non New Zealand citizens resident in New Zealand) for those entering Australia would be necessary from 1981. The New Zealand government introduced a similar requirement in 1987 following the introduction of a new Immigration Act (1987).

THE PRESENT SITUATION

Currently the trans-Tasman situation regarding New Zealanders or Australians entering either country is that they must present passports. The Australia-born wishing to enter New Zealand, unlike the majority of other immigrants or visitors, are exempt from permit or visa requirements. Under a 1948 Social Security Agreement the Australia-born within New Zealand and New Zealand-born within Australia qualify for various benefits such as

unemployment or pensions after a shorter period of residency than other migrant groups.

Apart from the suspension of the Trans-Tasman Travel Arrangement during World War Two, when both countries required travellers to carry travel documentation and exit permits, this agreement has permitted free movement of people between the two countries. It has undergone some modification since its inception, primarily to allow for more categories of people to be covered by the Arrangement. Some technical requirements have been imposed recently such as the need for passports to be carried. However the basic premise of the Trans Tasman Travel Arrangement allowing for unregulated movement of Australasian citizens still holds true. Despite the interest in the New Zealand media from time to time arising over the "brain drain" of New Zealanders to Australia, and the Australian media's complaints over the numbers of New Zealanders there, neither government has seriously questioned the utility or desirability of the Trans Tasman Travel Arrangement.

Indeed, in both countries recent reviews of immigration policy have stressed the significance of retaining the Trans Tasman Travel Arrangement. In the Labour Government's Review of Immigration Policy, August 1986, it is stated that

New Zealand considers the Trans Tasman Travel Arrangement to be of fundamental importance. It is both a reflection of and a stimulant to the closeness of ties between the two countries and is underpinned by various other reciprocal arrangements in fields such as health and social security benefits.

(Burke, 1986, 12)

In Australia, a wide-ranging review of immigration policy in 1987 by the Committee to Advise on Australia's Immigration

policies (the Fitzgerald Report) recommended that the relationship maintained by the unrestricted movement of New Zealanders and Australians across the Tasman "is profound and binding and must be preserved" (Fitzgerald, 1988, 98). The Trans Tasman Travel Arrangement is unlikely to be disturbed by the respective governments, although certain anomalies in the ways in which New Zealand and Australia deal with immigration matters are likely to be the subject of continuing bilateral talks.

STATISTICS AND MIGRATION STUDIES

In both countries migration statistics that show the trans-Tasman flows are based on the declarations of passengers gathered from information on arrival and departure cards. Any person intending to move for more than one year is considered a migrant. Migrants can in turn be divided into subgroups, i.e. those who wish to reside permanently in the country of next residence and those who wish to either return to the previous country, or move on after a stay of twelve months (Lloyd, 1975, 21).

Immigration and emigration refer effectively to movement for periods of twelve months or more. Immigration is usually subject to control and is deemed to be a "privilege", whereas emigration from a country is usually unconstrained by regulation and considered a basic human right (Farmer and Andrew, 1980, 32).

Fortunately migration statistics of immigration and emigration are assiduously collected in New Zealand, although this does not mean that a study of immigration and/or emigration is clear-cut as there may be problems with the data.

Despite the importance of the Australian ties, and the large amount of material that could possibly be used, not a great deal has been written about the Australia-born in New Zealand. Work has been done on the New Zealand-born in Australia (e.g. McCaskill, 1982; Hugo, 1987; Borrie, 1987), and there have also been some studies of the characteristics of the trans-Tasman migrants themselves (e.g. Andrew, 1980). However, scant attention has been paid to the Australia-born population in New Zealand apart from some recent work by Bedford and Brown (1988). A study of the Australia-born in New Zealand is useful for a number of reasons.

Firstly the Australia-born in New Zealand are an important component of the resident population. From 1901 the proportion of overseas-born that are Australia-born residing in New Zealand has never fallen below 10% in the census figures. Bedford and Brown (1988) also show that the Australia-born population differs significantly from the rest of the overseas-born population in a number of ways such as their sex ratios and age composition, and changes to these through time. Not only are the Australia-born a significant group in the population that have not been studied in any great detail (they comprise 1.6% of the total New Zealand population, and are second only to the United Kingdom birthgroup in terms of numbers of overseas-born), but they also appear to have distinct population characteristics.

Secondly the Trans Tasman Travel Arrangement is worthy of study alone. The unrestricted movement of people from one country to another over such a long period of time is

nusual, particularly in times of increasingly stringent measures for controlling immigration to countries. This also raises a theoretical question as to whether this trans-Tasman flow is more of an example of internal migration than international migration (to be discussed in Chapter 2).

Thirdly choice of a migrant subgroup such as the Australia-born in New Zealand that has not experienced adjustment problems is something of a departure from the norm in recent literature. In the 1970s particularly, migration studies in New Zealand focused on the "fit" of ethnic groups into contemporary New Zealand society, i.e. the Asians, Yugoslavs, Greeks, Poles, Dutch and some Polynesian groups.

This thesis attempts to explore aspects of a migrant group which is difficult to identify outside of the statistical record. Attention is focused on the characteristics such as age-sex composition, location throughout New Zealand and occupation and employment status. A primary objective is to establish whether the Australia-born component of New Zealand's population differs substantially from either the New Zealand-born or the other overseas-born components.

CHAPTER TWO

METHODOLOGICAL CONSIDERATIONS

The impetus for migration is often ascribed to differences in opportunity. Voluntary migration results from lack of satisfaction with the contemporary environment, the perception of better opportunity or like elsewhere and the possibility of attaining this through movement to another location (Willis, 1974, 1). Elizaga (1972, 22) outlines three basic problems for migration study;

- (i) lack of a consistent and satisfactory system of operational definitions for measuring migration phenomena,
- (ii) the available published data (censuses, vital statistics) are not normally adequate for a thorough study of the phenomenon,
- (iii) there is a lack of a comprehensive theory or a systematic reference framework for the orientation, organisation, and evaluation of investigations.

These problems will be reviewed briefly before examining in greater detail three significant conceptual issues.

DATA AND DEFINITIONS

Much migration research undertaken has been constrained by the information available. There are two

basic types of study: one which uses aggregate data such as census and/or international migration statistics, and the second which uses information obtained from sample surveys or case studies. The former tend to focus on patterns of population movement and characteristics of the migrants, while the latter often deal with behavioural issues such as the decision to migrate or choice of a new residential location. Roseman (1971, 589) identifies three main perspectives on migration;

- (i) migration as movement from one areal unit to another,
- (ii) migration as an end result of the act of movement affecting an area or migrant/s,
- (iii) migration as a process changing an area/migrant over a period of time.

The term "migration" can also be used to denote a "move", a "mover" or a "migrant". A person can be either a "mover" and/or a "migrant". A "move" on the other hand is an event or occurrence undertaken by a mover (Rogers and Willekens, 1986, 163). The difference between all three becomes important when considering data options. For example, the Australia-born people resident in New Zealand at the time of a census are "migrants", whereas moves made by Australia-born people are recorded in the New Zealand international migration statistics. The differences between these types of statistics will be examined further later in the chapter. Kammeyer (1972, 55) disagreed with the classification put forward by Rogers and Willekens and contends instead that rather than "migrants" being a subgroup of "movers", "migrants" and "movers" are separate.

He defines a migrant as someone who shifts to a new residence away from the old environment or community for some substantial period of time, whereas the mover remains within the original areal or political unit. This distinction ignores the return migrant - someone who sets out to live elsewhere, but eventually returns to the original area, which relates to a problem raised by Shaw (1975, 3) who asks;

Is migration best described as a recurring or non-recurring type of event, a unique phenomena or process? Should migration be viewed as a stream or flow? Should migration be expressed as a rate, and if so as net immigration, a net outmigration, or as a gross migration rate.

The question is raised over whether to include return, cyclical and serial migration, which will be discussed later in this chapter. One of the criticisms often levelled at the field of migration research is that it concentrates on moves rather than impacts (Spengler and Myers, 1977, 12). This criticism partly arises from the problems associated with the limited amount of information that can be collected from available data and also relates to workable definitions.

Migration is usually described as one of three components of population change, birth, death and migration. While births and deaths are clear-cut statistically, and can supposedly happen only once to every individual within a population, migration may happen often or not at all (Jones, 1981, 201). Like fertility migration can add to a population, and like mortality, migration can also remove people. The ability of migration to both add and subtract from a population is a characteristic that Bogue (1959, 486) states makes it central to population analysis in general.

The comparison of migration with fertility and mortality raises problems, because while migration shares some characteristics with fertility and mortality, it has unique features of its own. Woods (1979, 165-6) sees migration occupying the position of a balance in the demographic equation.

Unlike a migrant moving from one area to another, a birth does not automatically mean a loss or death to a population in another. It is this potential to influence the populations of several areal units that makes migration different from fertility and mortality. Rogers (1984, 3) contends that it is understandable that migration theory has similarities with the theories of fertility and mortality, and he adds that as migration is a potentially repetitive event, a fertility approach is not entirely inappropriate. This does mean that a focus on counts rather than durations occurs. Duration however is an extremely important component of migration - not only should a question concerning when a migrant becomes a resident be asked (this is particularly relevant with regard to census statistics and international migration), but the measurement of duration is also vital in order to make any comment on the stability of the population stock within an area. It is also necessary in order to examine the interaction between an already resident population and a migrant population in terms of social mixing or occupation.

Despite there being little in the way of cohesive theory to act as a focus for a migration study, there are some generally recognised phenomena relating to this process which can be studied. For this study, three basic sub areas of migration theory have been chosen for examination in

Further detail;

- (i) age specific rates of migration,
- (ii) characteristics of internal/international migration,
- (iii) repeat/return migration.

AGE SPECIFIC RATES OF MIGRATION

It is generally recognised that the process of migration is selective in terms of characteristics people added to or subtracted from a population (Rogers and Castro, 1984, 157; Elizaga, 1972, 139). One of the most consistently noted patterns of selectivity in migration is that related to age (Rogers and Willekens 1986, 188; Rogers 1984, 4; Shaw, 1975, 18; Eldridge, 1965, 445; Barclay, 1958, 257). This is reflected in age-specific migration profiles which are recognised as having a characteristic shape, with a major peak during early adulthood, troughs for early adolescence and middle age. Lesser peaks for early childhood and retirement age are also well documented (Rogers, 1984, 5). These patterns reflect lifecycle changes with the rates of young children and the rates of adolescents reflecting the mobility levels of their parents. Thus, the profile of a migrating population may be studied in its own right, independantly of migration levels.

INTERNAL AND INTERNATIONAL CHARACTERISTICS OF MIGRATION

It is conventional to divide the field of migration research into two general components: internal and international migration. Bogue (1969, 752) classifies

internal and international migration purely on the basis of whether migration takes place within national boundaries or crosses them, but for other migration researchers the issue is not that simple. Lee (1966, 49) points out that "considerations of internal migration have been divorced from considerations of immigration and emigration...." The classification of dividing migration into internal and international migration is often cited as arising purely from convenience. Unfortunately problems arise from this neat classification because this division does not always work out in reality. Bogue (1959, 486) points out that internal and international migration are certainly not independent of each other, and in fact have a strong influence on each other. This is echoed by Pryor (1978) and also by Muo and Potter (1980, 135) who state;

One point that deserves emphasis is the close relationship that often exists between internal and international migration.... Both form part of the migration 'process' in a given country, and it is usually advantageous to incorporate them in the same theoretical framework.

If international and internal migration categories are based purely on frontier crossings, then the very important variable of distance is ignored. While the boundary distinction makes statistical evaluations of international migration relatively easy, it does not necessarily have much relevance for analysis of other aspects of migration. Often international migration is taken to suggest greater complexity in the adjustment process for migrants because of cultural, political and language differences to be overcome (Beaujeu-Garnier 1966, 169). Internal migration is considered to be an

easier movement for the migrant in terms of adjustment, but a more difficult process to measure.

In the case of trans-Tasman migration many of the stereotype views of international migration are not relevant. As Poot and Brosnan (1986) state;

It is particularly interesting that the determinants of trans-Tasman migration are similar to those reported in studies of internal migration within Australia and New Zealand... Given the relative freedom of trans-Tasman migration, this suggests that migration within Australia and New Zealand and between the two can be seen as adjustments within one population system and a common labour market... While the long run consequences of migration on a nationwide basis have received renewed attention in both Australia and New Zealand... the results presented here suggest it would be fruitful to consider the two as being part of one population system in the analysis of interaction between population growth and demographic change.

Technically trans-Tasman migrants are travelling between national units rather than within a state. The trans-Tasman population exchanges can also be viewed as internal migration (Andrew, 1980). The constant stream of seasonal labour migration between New Zealand and Australia was recognised as early as the 1940s (McBean, 1946, 94-5). The cyclical migration related to economic fortunes in New Zealand and Australia, the ease of travel between the two countries under the Trans Tasman Travel Arrangement and the relatively cheap fares serve as strong evidence to support Andrew's claim (1980, 166-7) that while technically the trans-Tasman movement is international there is also room to view the movement of people as internal, with New Zealand assuming the status of a "defacto state of Australia" (Andrew, 1980, 167).

RETURN MIGRATION

Before the 1960s there was little or no reference to return migration made in the literature on international migration. Reference is made to counterstreams by Ravenstein last century, but it is a matter of conjecture whether Ravenstein meant counterflows or return migration (King, 1978, 3; King, 1986, 1). Part of the reason for return migration being ignored for so long, is that it is such a difficult process to track (King, 1986, 1). Not only are the problems in obtaining data, but there are also entrenched ideas about migration processes that assume one-way flows such as rural-urban "drift". Despite the difficulties involved in examining return migration, this type of movement is important especially in the context of international population flows which are relatively uninhibited by regulation, such as in the trans-Tasman case.

The ease of travel for migrants has implications for the quality of collected statistics such as the New Zealand international migration series that are based in part on declared intentions (Gould, 1984, 32-3), a migrant may leave Australia with the intention of settling in New Zealand permanently, but leave within a month. This leads to problems such as "category jumping" that are difficult to overcome with some of the categories of migration. This problem is discussed further later in the chapter. As with other characteristics of migration (such as age specificity) there is evidence to support the idea of return and repeat migration being selective amongst the migrating population. Goldstein (1954) in a

study of in and out migration of Norristown, Pennsylvania 1910-1950 noted that out migration for Norristown residents was consistently higher for in migrants, compared to long-term residents or those who had been born there. Therefore it is possible also with trans-Tasman movement that a relatively small core of migrants are doing most of the moving across the Tasman.

It also seems reasonable to assume that many of the Australian residents crossing the Tasman to New Zealand are in fact New Zealanders returning with the Australia-born offspring. The high proportion of dependant children to adults in the Australia-born migrant population entering New Zealand does not seem consistent with fertility levels for either Australian residents or New Zealand residents. This issue will be discussed further in Chapter Three.

NEW ZEALAND INTERNATIONAL MIGRATION DATA

International migration statistics in New Zealand are divided into five classes, on the basis firstly of residence status (New Zealand resident or visitor) and secondly on the basis of the duration of stay intended in New Zealand by visitors or the duration of study overseas by residents. If an intended stay is under twelve months, the move is regarded as temporary or short term. If the stay is intended to last longer than twelve months, then it is considered to be long term. Immigrants are generally those persons arriving in New Zealand to stay for twelve months or more (including permanent arrivals) plus New Zealand residents returning after an absence of

twelve months or more. Emigrants are New Zealand residents who are departing for a period of twelve months or longer (including permanent departures) as well as overseas visitors departing New Zealand after a stay of twelve months or more.

Categories of Migrants

It should be noted that the same person can be grouped under more than one class of migrant within the same year, as an arrival and as a departure - this happens when the actual length of stay differs from the original intention or when the visit was short term. The classification system however, excludes all members of the Armed Forces on duty, crew of aircraft or ships and through passengers. The Department of Statistics collects information on international migration from arrival and departure cards. The major categories are formed from three basic categories;

- (i) Permanent migrants - people intending to settle either in New Zealand or overseas.
- (ii) Long-term migrants - people intending to stay or staying in New Zealand or overseas for a period of twelve months or longer, but not intending permanent settlement.
- (iii) Short-term migrants - people intending to stay or staying in New Zealand or overseas for a period of less than twelve months.

With long term and short term categories, travellers are divided further into New Zealand residents and non-residents or visitors. The five categories of migrants in New Zealand statistics are;

- (i) Permanent migrants - non-residents arriving to settle in New Zealand, and New Zealand residents departing intending to settle overseas.
- (ii) Long-term migrants - New Zealand residents. Residents arriving who have spent the last twelve months or longer overseas before re-entering New Zealand, or residents intending a stay of twelve months or more overseas, but not intending to leave permanently.
- (iii) Long-term migrants - non residents (visitors). Non-residents who intend to stay for twelve months or longer in New Zealand but are not intending to stay permanently, or non residents who, on departure, had spent twelve months or longer in New Zealand.
- (iv) Short-term migrants - New Zealand residents. Residents arriving back in New Zealand who have spent a period of less than twelve months overseas, or residents who intend to be absent from New Zealand for less than twelve months.
- (v) Short-term migrants - non residents (visitors). Non-residents arriving with the intention of staying for less than twelve months in New Zealand, or non residents departing after a stay of less than twelve months.

Commonly migration data is divided into short-term/temporary and long-term/permanent migrants. Not only are many of the tables arranged in this way, but much research of trans-Tasman flows has been focused on the permanent/long-term migrants as a group (e.g. Andrew, 1980; Brosnan

and Poot, 1986). This division of migrants also takes into account the sampling procedure of the arrival and departure cards. With permanent and long-term migrant declarations there is a full enumeration, so sampling errors do not arise. With short-term migration, which includes tourist and business trips, there is a systematic sampling of 25% of all short-term migrant declarations (brought into force July 1976). There is a possibility of sampling error for short-term or total migration figures arising from this.

Category Jumping

The major problem arising from the international migration data is "category jumping". This occurs when stated intentions do not match with actions undertaken. It happens most frequently when studying specific groups such as permanent/long-term and temporary/short-term migrants. Gould (1984, 33) prefers the use of data on total arrivals and departures when studying international migration. He does not discount the possible usefulness of categories such as permanent/long-term as he believes that a comparison between total arrivals/departures with permanent and long-term migration can show interesting and revealing discrepancies between the expected experience and actual experience of a new residence, providing a measure of a destination living up to migrant expectations (Gould, 1984, 34).

Bedford (1986, 21) however believes that there are good reasons why total arrival and departure figures should be used with caution. On arrival in New Zealand, New Zealand residents record their actual residential experience,

while non residents record their intentions. When departing from New Zealand, New Zealand residents record their intentions while non residents record their actual experience. So not all long-term migrants are consistently identified on the basis on intentions alone. It therefore makes sense to differentiate between various migrant groups recording different intentions or experiences.

Census Data on International Migration

The migration of people can also be studied by the use of census data, either alone or in combination with migration statistics. When used in conjunction with migration series statistics it is possible to gain an idea of the characteristics of the migrants arriving and departing (from the migration series statistics) as well as the stock (residents show in the census). Then to compare the evolution of the resident, previously migrant population with the changes to the composition of arrivals and departures over a period of time. Which means a comparison of data that is longitudinal and cross sectional is possible. Longitudinal data such as that contained in the New Zealand international migration series, is data that is collected over a continuous period of time, even though it is commonly published in year-long chunks. Cross-sectional data is the type of data collected in a census, this is a survey of the whole resident and/or usually resident population of a given area at a discrete point in time. In New Zealand this is usually conducted at five yearly intervals. Data from the census puts migrants or other specific groups within a wider population into a

broader perspective by relating their characteristics to characteristics of the population as a whole. Data from a census allows the study of net migration and the areal distribution at a particular time. It does not permit the delineation of specific individual acts of migration or relate successive moves of individuals. Both census and international migration series data have points in their favour, and both have significant shortcomings, but they can be usefully combined to give a fuller picture of a migrant population than is possible with just one of these types of data.

Census data has the advantage of comparing migrant to non-migrant populations over large areas (Kosiński, 1975, 108). However the census data can only provide retrospective information for those left alive and still resident in the area at the time of observation. Those who have died or are living overseas during enumeration are difficult to account for. It is also difficult to make adjustments for those born to migrant families (Kosiński, 1975, 109), such as the New Zealand-born offspring of the Australian-born resident in New Zealand and vice versa. One of the most successful and most commonly utilised links between census data on migrants and migration series data is the variable of birthplace. Birthplace can be used to divide a population into discrete groups which are consistent and unambiguous through time. A migrant cannot be born in two places. A question on birthplace also has the advantages of being easily defined and generally understood.

The Birthplace Question

A question on birthplace has been asked in the New Zealand census since 1851, the only exception being 1926, when duration of residence was asked only (New Zealand Department of Statistics, 1961). Data on birthplace have also been collected for many years on arrival and departure cards.

Internationally the birthplace variable is regarded as one of the core variables for population analysis (Bedford, 1988). Unfortunately for population research in New Zealand, a Government Interdepartmental Committee decided in 1987 to remove the birthplace question from arrival and departure cards. This decision removed the only link available for tying population movements (flows) to cross-sectional census data (stock). Birthplace is the only variable which can be used to identify particular subgroups in the census and international migration data.

Birthplace is particularly important in the analysis of trans-Tasman population movement and the definition of Australians and New Zealanders. In both New Zealand and Australia it is possible to carry a passport of the other country, as well as to retain dual citizenship in New Zealand. For example, a United Kingdom-born person granted Australian-resident status could migrate to New Zealand. New Zealand-born, former Australian-residents returning to New Zealand with the Australia-born offspring should also be considered. This population subgroup it is suspected is becoming particularly significant to New Zealand, but it is impossible to identify such a group without the variable of birthplace. Birthplace data also figure prominently in the bulk of trans-Tasman population

exchange research that has been carried out (for example Andrew, 1980; Brosnan and Poot, 1986, 1988; Pool, 1980; Bedford and Brown, 1988). The loss of birthplace information in the international migration statistics means comparable population subgroups cannot be isolated using the arrival/departure cards and the census. There is no longer any direct link between the two data sources for particular population subgroups.

CHAPTER THREE

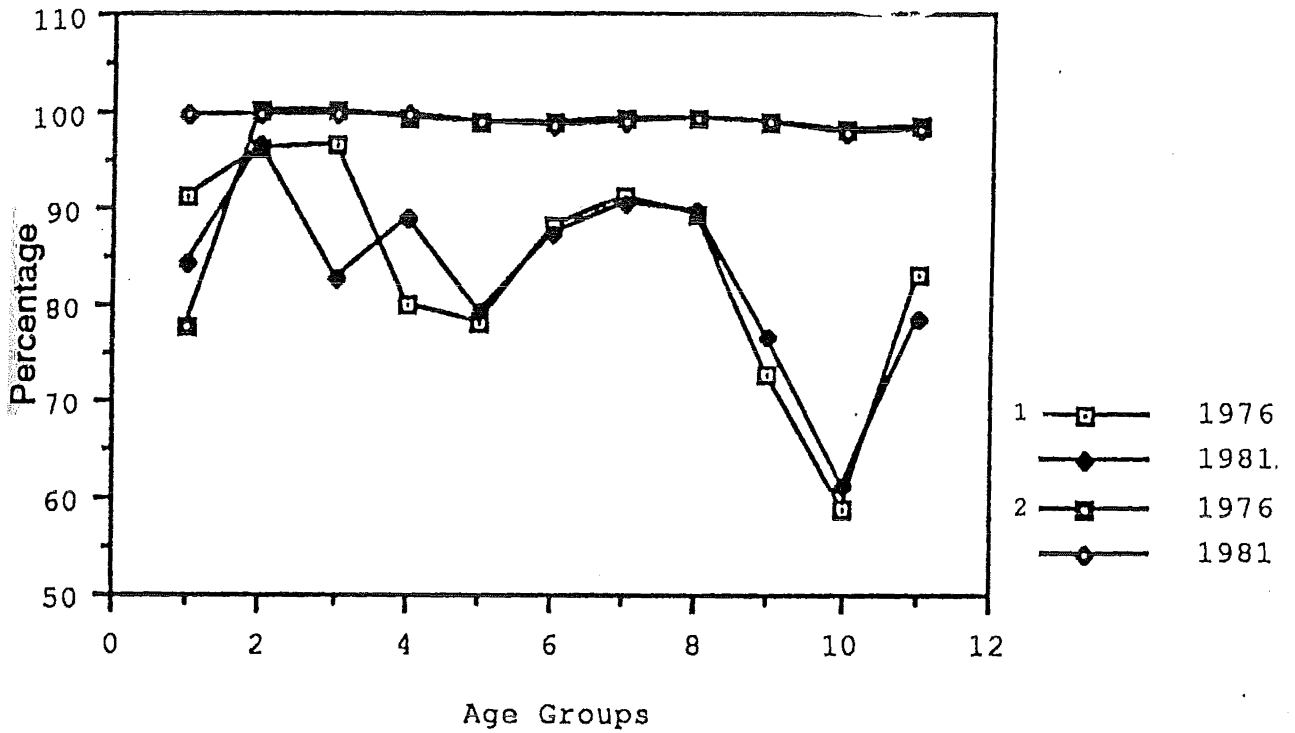
THE AUSTRALIA-BORN POPULATIONS, 1961-1981

This chapter utilises published census data for the years 1961, 1966, 1971, 1976 and 1981, to provide an overview of the characteristics of the Australia-born population living within New Zealand. A comparison with two other birthgroups is made to enable changes in the Australia-born population to be seen in a wider perspective. This chapter begins with a brief examination of the population base which can be derived from available census statistics and then focuses on changes in some specific characteristics of the Australia-born population.

THE POPULATION BASE

In this analysis of changing population characteristics the "de facto" Australia-born population is used. Before 1976 the "resident" population base, which is conceptually more satisfactory for a migration study was not available. From 1976 census volumes have contained some birthplace data for resident and total populations. The use of resident or total populations can have a marked effect on the actual number and their interpretation. This is illustrated in Figure 3.1 which shows the resident population as a percentage of the total population, for a range of age groups in the Australia-born population, especially those aged between 15 and 30, 35 and 64 years. The reason for the discrepancies lie in the exclusion of short-term visitors (especially

Figure 3:1. Australia-born and all Birth Populations Resident in New Zealand expressed as a percentage of the Total Population, by 5 Year Age Groups.



Age Group

- 1 0-4
- 2 5-9
- 3 10-14
- 4 15-19
- 5 20-24
- 6 25-29
- 7 30-34
- 8 35-44
- 9 45-54
- 10 55-64
- 11 65+

1 Australia-born

2 Total Population

tourists) from the resident population.

Recognition of problems arising from the use of total population data in the study of migrant subgroups is not recent. The introductory notes to the 1961 birth-place census volume indicate an awareness of the problems caused:

all persons who are in New Zealand at census data are enumerated, irrespective of whether they are residents or visitors. But while the census count includes many on temporary visits, it also excludes New Zealand travellers overseas at census date, and these two figures for population count purposes are offsetting. However, statistics of birthplaces and duration of residence are affected by the floating population; tourists within New Zealand swell the numbers of foreign-born persons, while New Zealanders travelling or soldiering overseas decrease the total of New Zealand-born.

(Department of Statistics, 1961, 3)

It can be seen that not only are the age cohorts distorted to some degree by using total population numbers, but also the duration of residence figures are affected too, with the short-term periods of stay swelled by tourists and other visitors intending only a brief stay.

The selection of variables chosen for the study of the Australia-born population within New Zealand is dependant on the contents of the birthplace statistics volume of successive censuses 1961-1981. Four basic variables have been chosen to represent the Australia-born over this period, sometimes in conjunction with the New Zealand-born and other overseas-born. The four variables in order of analysis are;

- (i) age/sex composition;
- (ii) duration of residence;
- (iii) statistical area of residence; and
- (iv) the industrial division of the employed.

These variables represent measures of the population stock, its stability in New Zealand, its spatial distribution and its involvement in the New Zealand economy. Industrial division has been used rather than occupation group because data on occupation for birthplace groups were not published until the 1981 census. While occupation is the "job, trade, profession or type of work in which a person is employed" (Department of Statistics, 1983, 6), industry is more related to the activity of the organisation or business a person is employed within. Occupation provides a closer measure of what people are actually doing in the economy. The reason why industry divisions were used is because of their continuity through all the birthplace volumes between 1961-1981.

AGE-SEX CHARACTERISTICS

Age Composition

Between 1961 and 1981 the total Australia-born population within New Zealand grew from 35,412 to 52,605 (a rise the equivalent of 48.6 percent of the 1961 figure). This compares with an increase of 29.3 percent in the New Zealand-born population and 44.6 percent in the other overseas-born. Two of the most common variables used for describing population characteristics are age and sex. Usually these are depicted in the form of population pyramids. However population pyramids cannot be derived from the census data on birthplace prior to 1976, because the age groups are too broad. In this descriptive analysis the following groups have been used;

- (i) 0-14 juvenile dependants;
- (ii) 15-34 young-early mature adults, independant and of income earning age, pre or early family formation,
- (iii) 35-64 mature adult, independant and of income earning age, late or post family formation; and
- (iv) 65+ retirement age, independant, often post income earning age, independant family.

Using cumulative frequency graphs of the age composition of the Australia-born, New Zealand-born and other overseas-born (Figure 3.2) various changes in the three populations over the twenty year period can be seen. The relative degree of change in the age groups for each population can be identified and compared with the other two.

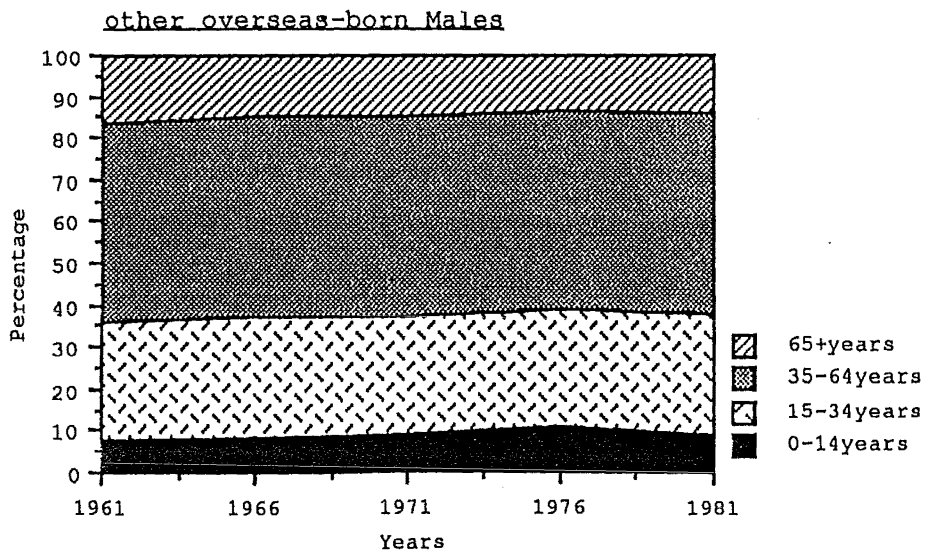
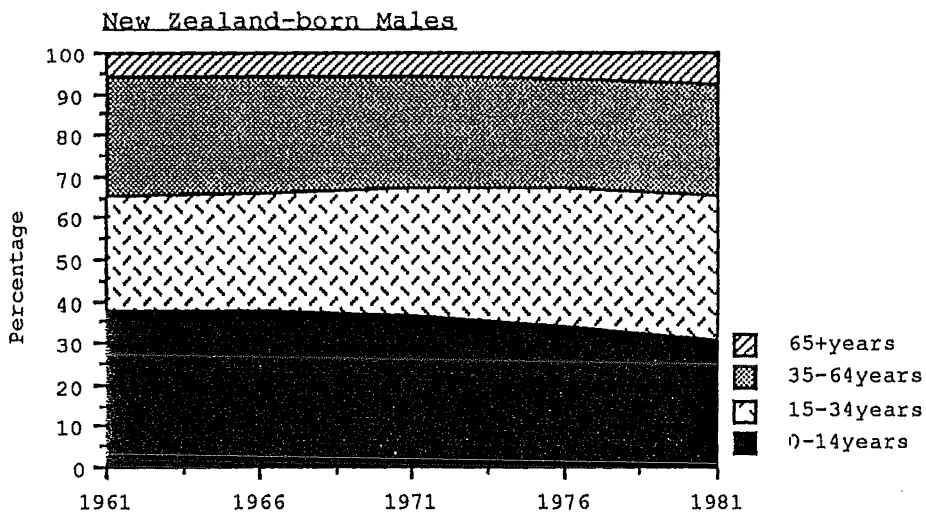
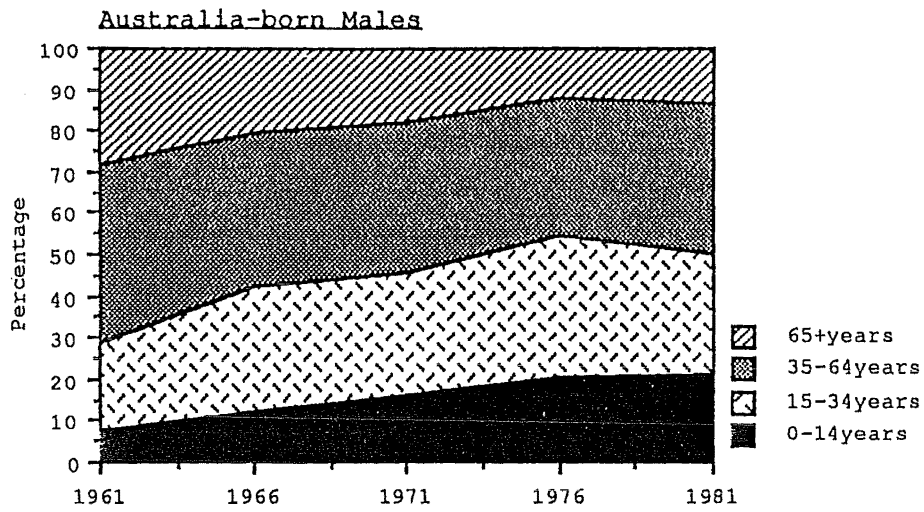
The Australia-born male and female populations have changed a great deal from 1961 to 1981. One of the most significant changes is in the population aged 0-14 years. From 1961 to 1981, this child component increased from 7.8 percent to 20.8 percent of males and 6.5 percent to 16.9 percent of females. In the early 1960s this group was very small, typical of a migrant population, but unlike the other overseas-born and the New Zealand-born populations the Australia-born children have become much more prominent.

This would suggest that Australia-born children crossing the Tasman to New Zealand with their New Zealand-born parents, have been becoming an increasingly important component of the migration flows from Australia. This issue is examined more closely in subsequent chapters.

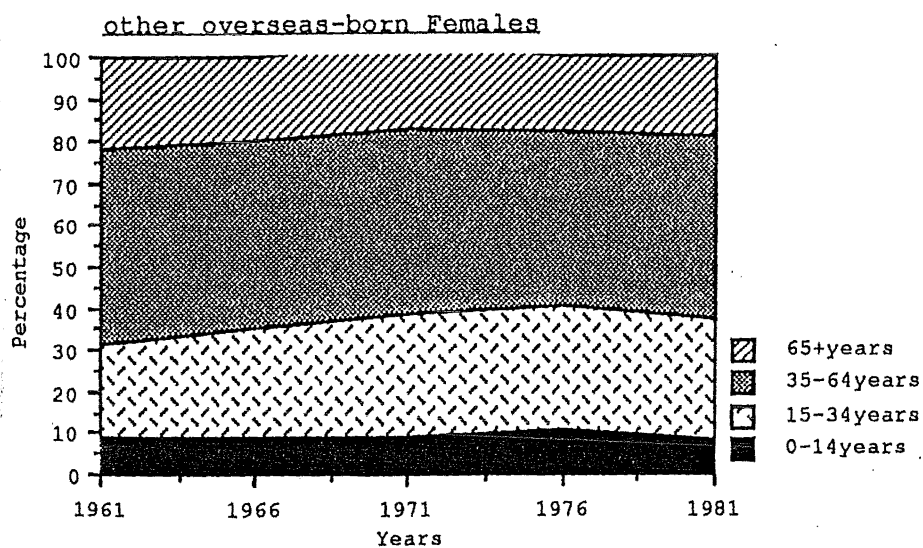
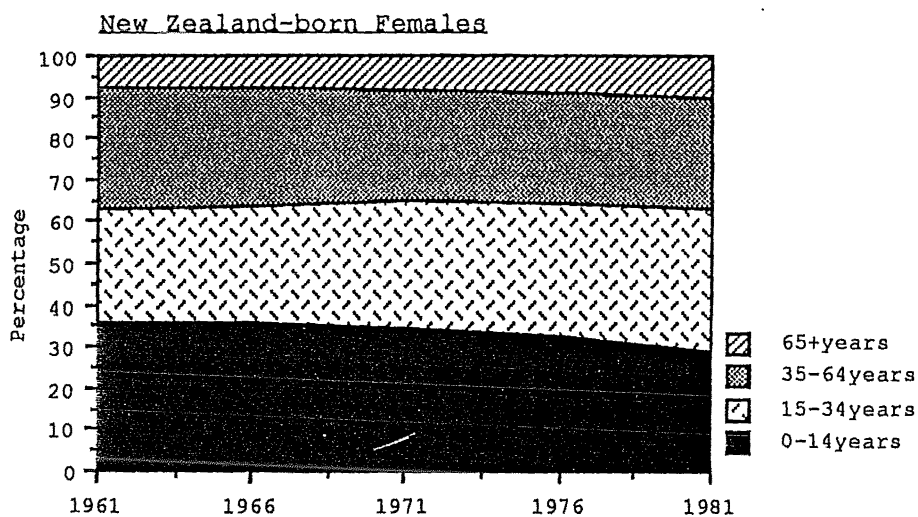
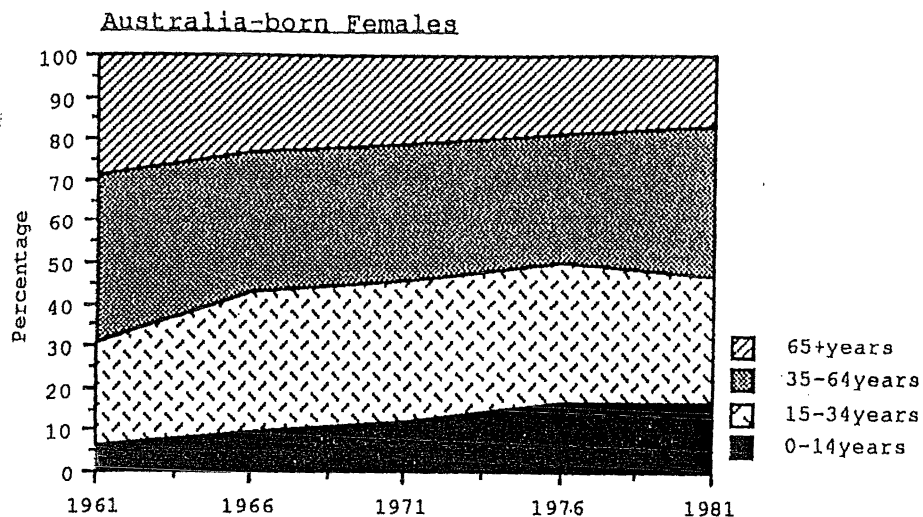
From 1961 to 1981 the New Zealand-born males and females aged 0-14 years fell from 38.1 percent to 30.8 percent and 36.2 percent to 29.0 percent of the population respectively. This drop may seem dramatic but it should be

Figure 3:2. Australia-born, New Zealand-born and other overseas-born (1961-1981), 4 Age Groups.

Males



Females



noted that just under one-third of the New Zealand-born population is still in this dependant age group. It is important to note that these are children born in New Zealand to parents born anywhere, i.e. the Australia-born and other overseas-born adults contribute to this stock. New Zealand-born adults may have dependants born outside this country who are resident within New Zealand. When this is the case the adults are classified in separate birthgroup populations to their offspring. There are probably significant numbers of Australia-born affected by these distinctions. This would arise because of the ease of travel between New Zealand and Australia. Not only has there been a gradual reduction in the numbers of the New Zealand-born aged 0-14 years, but there has also been slight growth in the numbers of those aged 65 or above, this is especially noticeable for females, increasing from 7.8 percent in 1961 to 10.1 percent in 1981. Overall the New Zealand-born populations have changed only a small amount over this twenty-year period.

Another unusual feature of the Australia-born population in New Zealand from 1961 to 1976 is a reduction in the proportion aged 65 years and over. There is a decrease in absolute numbers for both males and females in this age bracket from 1961 (males 4,690, females 5,383 to 1981 males 3,204, females 4,767).

The other overseas-born, unlike the Australia-born population, shows only little change in basic age structure over time. This would indicate that the Australia-born population has become much more affected by changes in the age composition of migrants compared to the other overseas-born.

Table 3:1. Index of Dissimilarity for the Australia-born and a) New Zealand-born and b) other overseas-born. 1961 and 1981.

1961									
Age Group	Aus-born		NZ-born		Diff	oseas-born		Diff	
		%		%	(%)		%	(%)	
0-4	716	2.02	287648	13.87	11.85	3709	1.22	0.8	
5-9	1020	2.88	252555	12.17	9.29	8126	2.66	0.22	
10-14	796	2.25	231004	11.14	8.89	7168	2.35	0.10	
15-19	1012	2.86	172723	8.33	5.47	12484	4.09	1.23	
20-24	2212	6.25	139975	6.75	0.50	15876	5.20	1.05	
25-29	2214	6.25	119369	5.75	0.50	22190	7.27	1.02	
30-34	2618	7.39	97813	4.71	2.68	27418	8.99	1.60	
35-44	4182	11.81	245782	11.85	0.04	52894	17.34	5.53	
45-64	10569	29.85	357526	17.23	12.62	90478	29.66	0.19	
65+	10073	28.45	140064	6.75	21.70	58242	19.09	9.36	
Total	35412	100.01	2074509	98.55		305063	97.87		
Total Differences (ignoring -ve/+ve)					73.54				21.10
Index of Dissimilarity (1/2 Total Difference)					36.77				10.55

1981									
Age Group	Aus-born		NZ-born		Diff	oseas-born		Diff	
		%		%	(%)		%	(%)	
0-4	2154	4.09	245160	9.14	5.05	5322	1.21	2.88	
5-9	3933	7.48	273552	10.20	2.72	12585	2.85	4.63	
10-14	3741	7.11	282213	10.52	3.41	19920	4.52	2.59	
15-19	2817	5.36	280164	10.45	5.09	24939	5.66	0.30	
20-24	3822	7.27	240609	8.97	1.70	28893	6.55	0.72	
25-29	4491	8.54	204393	7.62	0.92	33051	7.50	1.04	
30-34	4470	8.50	193896	7.23	1.27	41694	9.46	0.96	
35-44	7458	14.18	282984	10.55	3.63	73260	16.61	2.43	
45-64	11748	23.33	444888	16.59	5.74	127372	28.89	6.56	
65+	7971	15.15	234303	8.74	6.41	73917	16.76	1.61	
Total	52605	100.01	2682165	100.01		440958	100.01		
Total Differences (ignoring -ve/+ve)					35.94				23.72
					17.97				11.86

Source:

Table 7. Birthplaces by Age of Persons. New Zealand Population Census 1961, Volume 6. Birthplaces and Duration of Residence of Persons Born Overseas. Department of Statistics, Wellington, 1964.

Table 9. Total Population, Birthplace by Age Groups. New Zealand Census of Population and Dwellings, 1981. Volume 7, Birthplaces and Ethnic Origin. Department of statistics, Wellington, 1983.

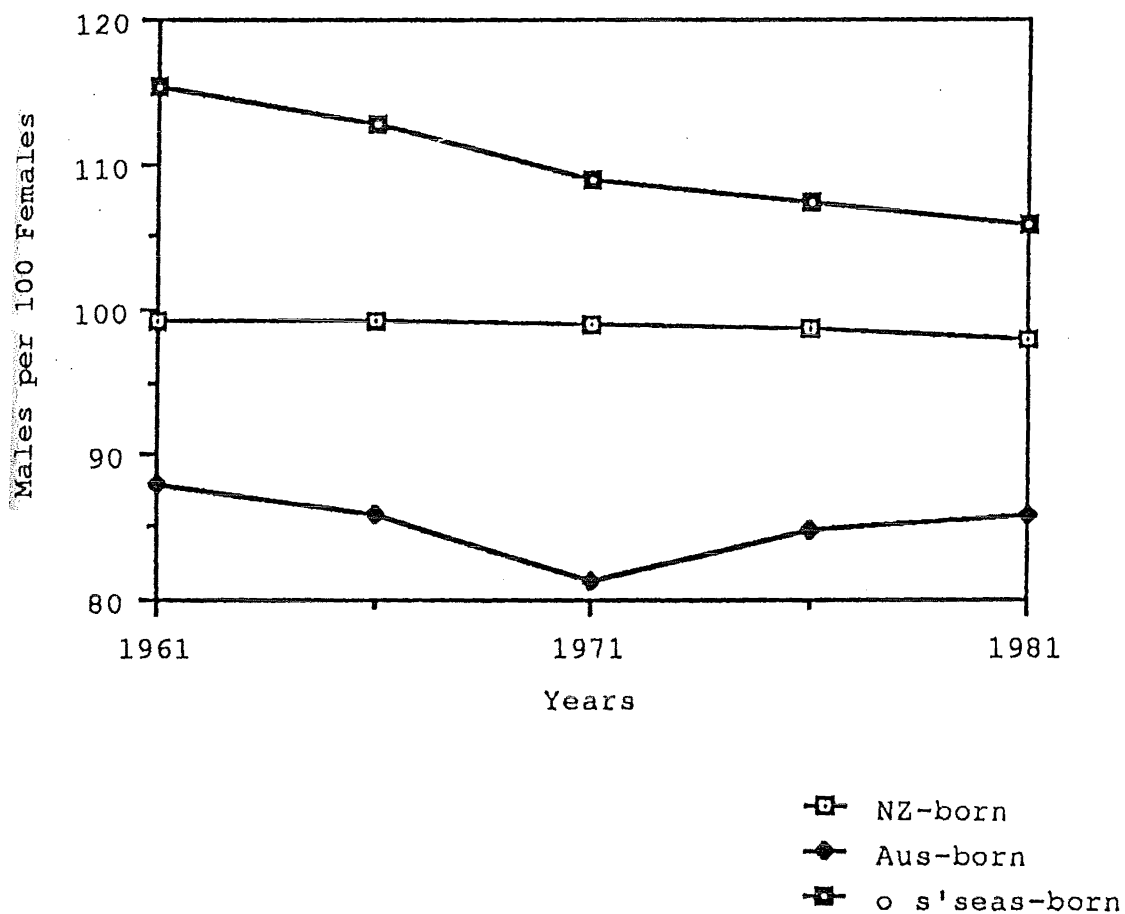
Another method of looking at differences in age composition between groups is by using a simple index of dissimilarity such as that outlined by Rowland (1979). Table 3.1 shows indices of dissimilarity for the Australia-born, New Zealand-born and other overseas-born for the years 1961 and 1981. In 1961 the Australia-born and other overseas-born are much more similar in age structure than the New Zealand-born and Australia-born. In 1981 this position still holds true, but it can be noted that the Australia-New Zealand-born index has practically halved in value since 1961. This is the result of the much higher proportions of children in the Australia-born population in 1981. The Australia-born-other overseas-born dissimilarity index on the other hand has increased slightly. This suggests that for age structure at least the Australia-born and New Zealand-born populations are becoming more similar in composition.

Sex Ratios

The sex ratios for the Australia-born, New Zealand-born and other overseas-born have been graphed and appear in Figure 3.3. For the period 1961-1981 the Australia-born other overseas-born index of dissimilarity is lower than that of the Australia-New Zealand-born (28.0 and 34.3 respectively). However the Australia-born and New Zealand-born have higher percentages of females than males unlike the other overseas-born. The two overseas-born groups both show much more change in sex ratios over time than the New Zealand-born population. The Australia-born in 1961 had a sex ratio of 87.8 males per 100 females, and a low of 81.3 in 1971. By 1981 the ratio had risen again to 85.9

Figure 3:3. Sex Ratios of the (Total) Australia-born, New Zealand-born and other overseas-born resident in New Zealand in each Statistical Area. 1961 and 1976.

Sex Ratios of the Resident Population, 1961-1981



reflecting the increasing proportion of children in the population.

The other overseas-born show a regular downward trend in sex ratios from 115.3 in 1961 to 105.9 in 1981, despite some major influxes of immigrants during the early 1970s. By 1981 their sex ratio was approaching that for the New Zealand-born population.

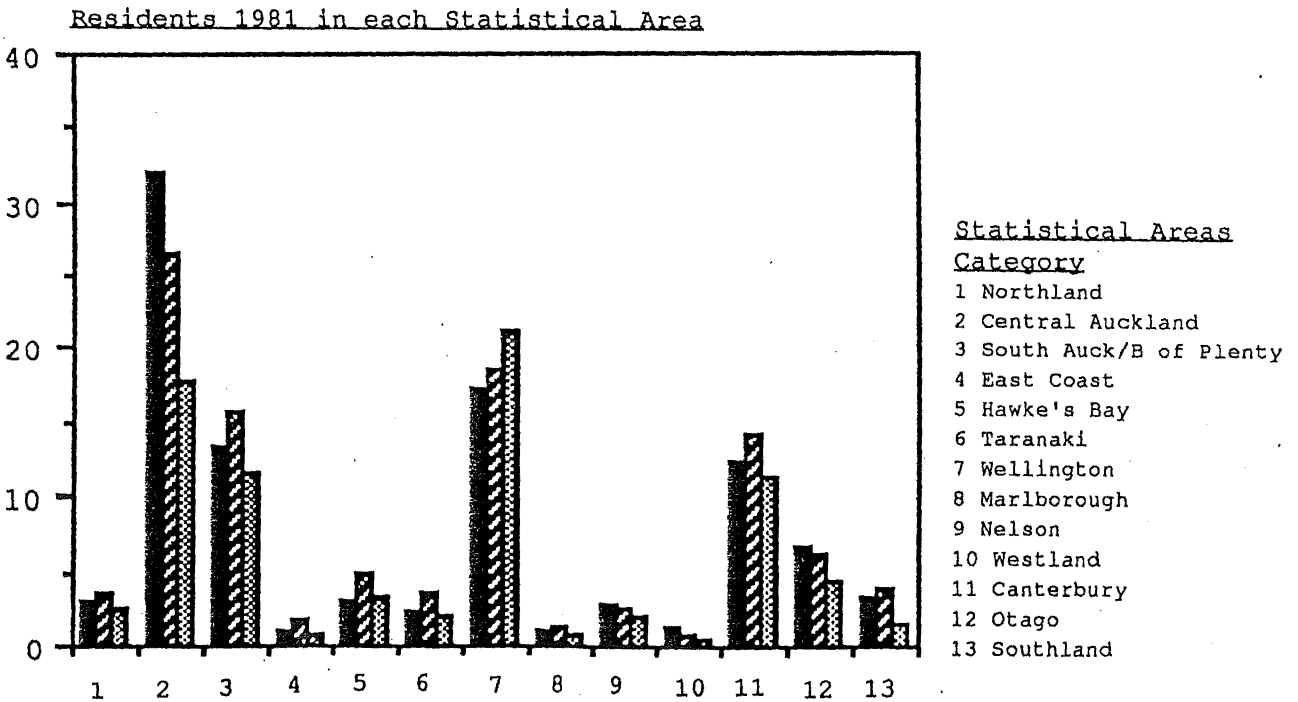
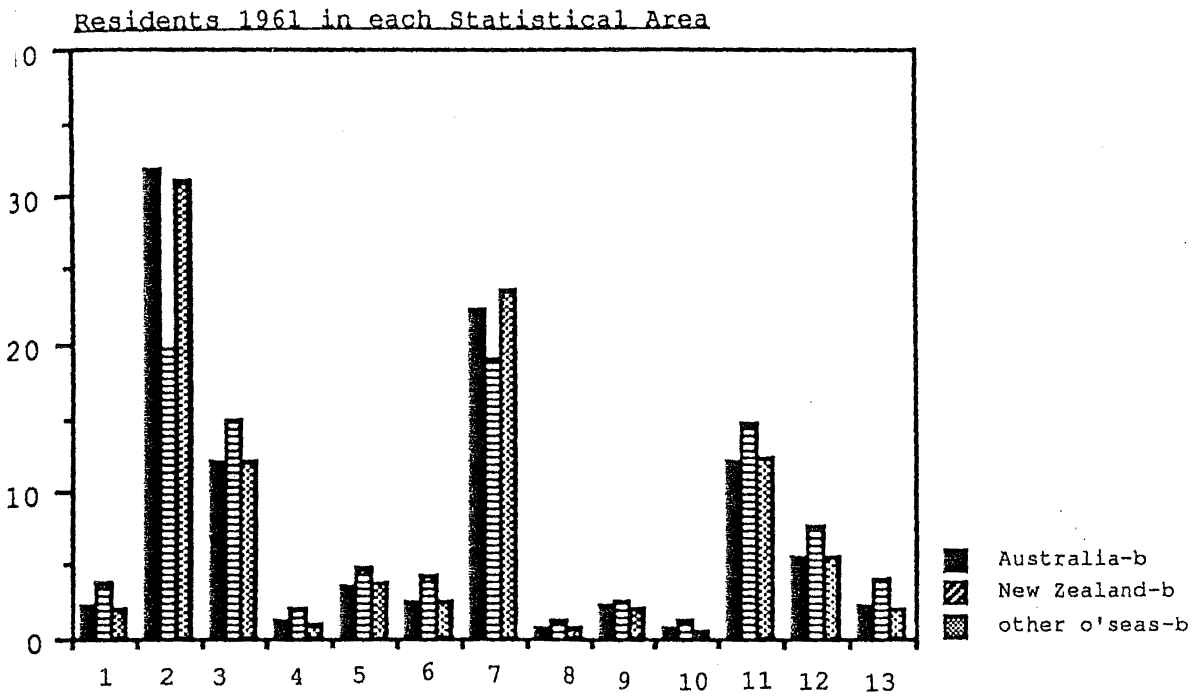
The age-sex data show that the Australia-born population has been more volatile than the New Zealand-born or other overseas-born. This suggests the ease of adding to, or subtracting from the Australia-born resident in New Zealand, and supports the idea that trans-Tasman migration is more like internal population movement than the classic international flows.

DURATION OF RESIDENCE

This section examines changes in period of residence for the Australia-born and other overseas-born populations from 1961 to 1976. Data for the total population by duration of residence in 1981 are not available.

It can be seen in Figure 3.4 that the duration of residence profiles for the two groups differ markedly. It should be noted that these figures are for the total population, therefore short-term visitors such as holiday-makers and those on business trips are included within these numbers. The proportion of the Australia-born population who had been resident for less than one year is much higher than the equivalent group of other overseas-born. Between 1961 and 1976 the Australia-born male and female populations in this residence category increased markedly reflecting the

Figure 3:4. Percentage of the Australia-born, New Zealand-born and other overseas-born resident in New Zealand in each Statistical Area. 1961 and 1976.



rapid growth in trans-Tasman population movement (Figure 3.4). Whereas by 1976 almost 60 percent of the Australia-born population had been in residence for less than 10 years, the other overseas-born had a bulge in the 10-19 years duration. This was due to the steady net migration gains to New Zealand's population from the mid 1950s to the mid 1960s (Farmer, 1985).

While the proportion of the Australia-born population which had been resident for 20 or more years between 1961 and 1965 decreased rapidly, this was not the case for the other overseas-born (Figure 3.4). The change in the Australia-born in this regard is due more to the significant increase in numbers resident for under one year than in extensive emigration of long-established Australia-born residents.

STATISTICAL AREA OF RESIDENCE

Similar to the duration of residence data contained within the census birthplace volumes, the information on the statistical area of residence for those usually resident is from 1961-1976 inclusive. From 1981 on, the statistical area of residence tables are published for the usually resident population only.

One of the most interesting observations when comparing profiles of where the three birthplace populations live is their similarity. Auckland in particular has a prominent share of all three populations, and for each the dominance of Auckland is increasing (Table 3.2).

Table 3.2 Percentage of Birthgroup Resident in Auckland
1961 and 1976

<u>Birthgroup</u>	<u>1961</u>	<u>1976</u>	<u>Change</u>
Australia-born	31.9%	32.1%	0.2
New Zealand-born	19.7%	23.1%	3.4
Other overseas-born	31.1%	38.2%	7.1

Source: Table 5. New Zealand Population Census 1961. Volume 6, Birthplaces and duration of residence of persons born overseas. Department of Statistics, Wellington 1964.

Table 6. New Zealand Census of Population and Dwellings 1976. Volume 7, Birthplaces and ethnic origin. Department of Statistics, Wellington 1980.

This can also be seen in the graph of the Australia-born, New Zealand-born and other overseas-born by statistical area of residence for 1961 and 1976 (Figure 3.4).

Of the three populations, the New Zealand-born is the most evenly spread throughout New Zealand, with the smallest range in its values, in contrast the other overseas-born are the most extreme in range, and the most heavily concentrated in Auckland central. From 1961 to 1976 differences between the Australia-born and other overseas-born became more noticeable, especially for the Auckland and Wellington areas.

Using the index of dissimilarity it can be seen that the Australia-born have a more similar spatial distribution to the other overseas-born, rather than the New Zealand-born (Table 3.3).

Table 3.3 Index of Dissimilarity Between Australia-born and (a) New Zealand-born and (b) other overseas-born, 1961 and 1976.

<u>Birthgroups</u>	<u>1961</u>	<u>1976</u>
Aus-born/NZ-born	15.7	11.9
Aus-born/o'seas-born	2.3	14.3

Source: Table 5. New Zealand Population Census 1961. Volume 6, Birthplaces and duration of residence of persons born overseas. Department of Statistics, Wellington 1964.

Table 6. New Zealand Census of Population and Dwellings 1976. Volume 7, Birthplaces and ethnic origin. Department of Statistics, Wellington 1980.

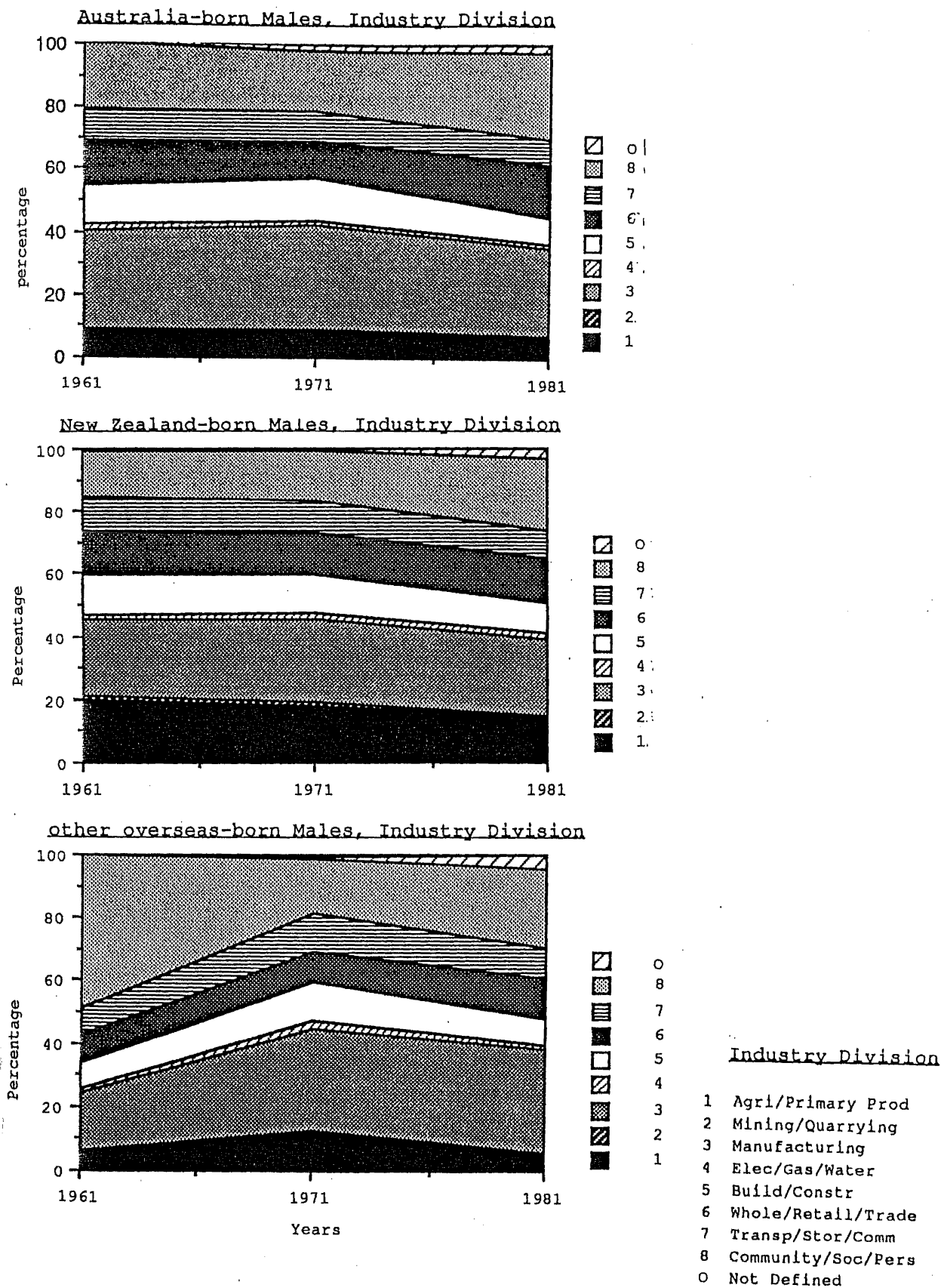
While the difference between the Australia-born and New Zealand-born population is decreasing, the difference between the Australia-born and other overseas-born is increasing. Gradually the Australia-born population and New Zealand-born are becoming more similar in character, while the opposite is true for the Australia-born and other overseas-born populations (Table 3.4).

The trend shown in the statistical area data is a two-fold one; (a) there is a concentration in the north for all three populations and (b) there is a strong urban bias in the distribution of the three populations.

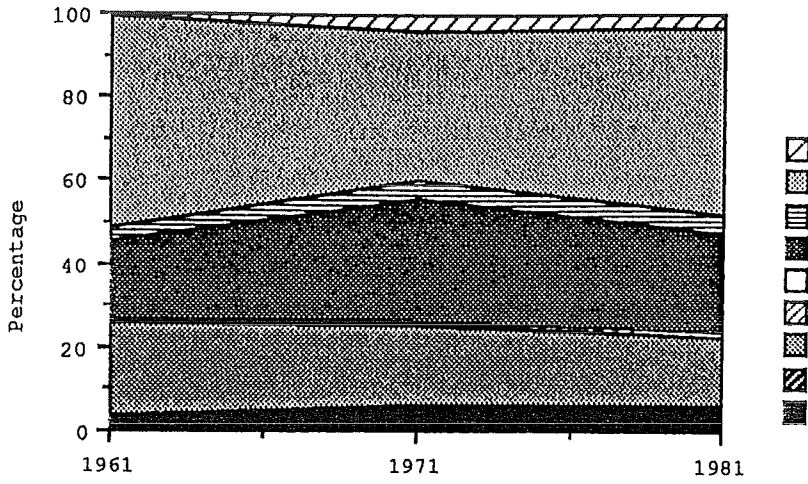
INDUSTRIAL DIVISION

The industrial groups of the New Zealand-born, Australia-born and other overseas-born have been separated into male and female components and graphed for the years 1961-1981, Figure 3.5. The data in the census volumes

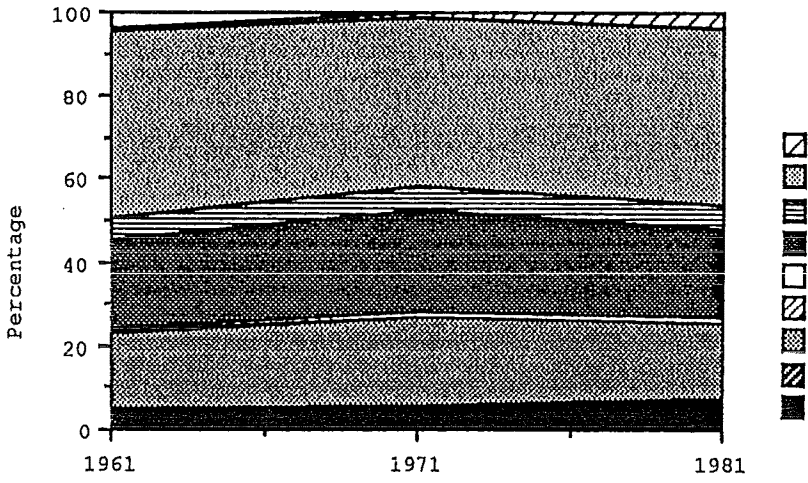
Figure 3:5. Industry Divisions of Full-Time Employed Males and Females, Aged 15-64. Australia-born, New Zealand-born and other overseas-born. Total 1961-1976 and Residents 1981.



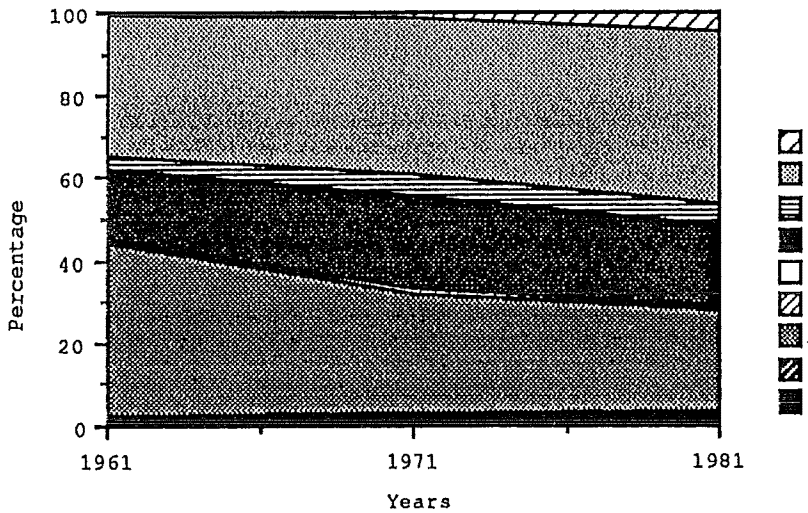
Australia-born Females, Industry Division



New Zealand-born Females, Industry Division



other overseas-born Females, Industry Division



- 0
- 8
- 7
- 6
- 5
- 4
- 3
- 2
- 1

- 0
- 8
- 7
- 6
- 5
- 4
- 3
- 2
- 1

- 0
- 8
- 7
- 6
- 5
- 4
- 3
- 2
- 1

Industry Division

- 1 Agri/Primary Prod
- 2 Mining/Quarrying
- 3 Manufacturing
- 4 Elec/Gas/Water
- 5 Build/Constr
- 6 Whole/Retail/Trade
- 7 Transp/Stor/Comm
- 8 Community/Soc/Pers
- 0 Not Defined

concerning industry were not without problems. Between 1961 and 1981 the composition of the one digit industry codes changed, and this meant that two digit codes were summed in some instances to provide comparable groupings. No account is taken of whether migrants entered New Zealand with the same job skills that they now use or whether they changed their job after, or on entry. Nor does this classification take into account degrees of skill.

The industrial groups of the Australia-born, New Zealand-born, and other overseas-born males are graphed for the 20 year period. One of the most obvious features of these three male birthgroups is the differences in the proportions employed in division 1 which comprises agriculture, hunting, forestry and fishing (Table 3.4).

Table 3.4 The Australia-born, New Zealand-born and other overseas-born males (15-64 years) employed in division 1, expressed as a percentage of the respective male birthgroups employed.

<u>Birthgroup</u>	<u>1961</u>	<u>1981</u>	<u>Change</u>
Australia-born	8.3%	6.4%	1.9
New Zealand-born	19.9%	14.5%	5.4
Other overseas-born	5.5%	5.2%	0.3

Source: Table 9. New Zealand Population Census 1961. Volume 6, Birthplaces and duration of residence of persons born overseas. Department of Statistics Wellington 1964.

Table 13. New Zealand Census of Population and dwellings 1981. Volume 7, birthplaces and ethnic origin Department of Statistics Wellington 1980.

While the New Zealand-born had the largest percentage employed in this division, it also had undergone the largest decrease. The other overseas-born have the smallest

percentage value and degree of change, fitting in between these two populations values are the Australia-born figures.

The female industrial division profiles highlight the significance of manufacturing. In common with the male profiles the Australia-born and New Zealand-born females are more similar than is the case with the other overseas-born (Figure 3.5b).

The indices of dissimilarity for the Australia-born - New Zealand-born and the Australia-born and the other overseas-born comparisons show that differences between the birthplace populations have been reducing over time (Table 3.5). While the Australia-born and other overseas-born males in 1981 have become more similar than the Australia-born and New Zealand-born males, the Australia-born and New Zealand-born females in 1981 were still more alike than the Australia-born and other overseas-born females (Table 3.5).

Table 3.5 Index of dissimilarity calculated for all industrial divisions 1961, 1971, 1981 for the Australia-born and (a) New Zealand-born and (b) other overseas-born.

<u>Birthgroup and Sex</u>	<u>1961</u>	<u>1971</u>	<u>1981</u>
<u>Males:</u>			
Aus-born/NZ-born	12.6	12.0	10.6
Aus-born/o'seas-born	27.5	8.1	7.9
<u>Females:</u>			
Aus-born/NZ-born	7.7	7.7	4.9
Aus-born/o'seas-born	20.4	11.9	9.7

Source: Table 9. New Zealand Population Census 1961. Volume 6, Birthplaces and duration of residence of persons born overseas. Department of Statistics, Wellington, 1964.

Table 3.6 (Continued)

Source: Table 9. New Zealand Census of Population and Dwellings 1971, Volume 7, Birthplaces and ethnic origin. Department of Statistics, Wellington 1975.

Table 13. New Zealand Census of Population and Dwellings 1981, Volume 7, Birthplaces and ethnic origin. Department of Statistics, Wellington 1983.

CONCLUSION

It is difficult to take analysis of the census data much further as none of the variables chosen are cross-classified with one another. The industrial divisions cannot be broken down into age/sex cohorts and duration of residence information cannot be examined for specific locations. This sort of analysis is possible for the period 1981-86, especially with regard to age-sex and occupation characteristics of the Australia-born.

The main function of this chapter has been to provide a background for a more detailed examination of characteristics of the Australia-born in chapters 4 and 5. One of the most noticeable points about the overseas-born and Australia-born populations is the extent to which they have changed between 1961 and 1986. This suggests that in and out migration play an important role in altering the composition of these populations. It also suggests that the migration streams themselves are subject to flux.

There are special features evident in the Australia-born population which separates this group from the New Zealand-born and other overseas-born, most obviously the high proportion of Australia-born children, and the relatively large numbers of those staying for only a short period of time. Not only do the Australia-born have their

own special characteristics as a population, but when an index of dissimilarity is used it can be seen that they occupy a position between the New Zealand-born and other overseas-born profiles. This suggests that there is some basis for considering the Australia-born as an "internal" migrant population rather than a group owing its origin and characteristics to international migration.

CHAPTER FOURTHE AUSTRALIA-BORN MIGRANT FLOW 1981-1986

This chapter examines the characteristics of the Australia-born migrants arriving and departing from New Zealand over the period 1/4/81 - 31/3/86. This migrant group will at times be compared to the Australia-born and New Zealand-born population resident within New Zealand at the time of the 1981 census. At other times the migrants are divided into subgroups for further examination. For this purpose the subgroups are;

- total arrivals or departures,
- permanent and long-term New Zealand resident arrivals and departures,
- permanent and long-term non-resident arrivals and departures,
- short-term New Zealand resident arrivals and departures,
- short-term non-resident arrivals and departures.

Some of these groups are also at times be compared to the 1981 Australia-born and New Zealand-born resident populations.

In this chapter three specific characteristics of the Australia-born migrant population are examined in detail,

- (i) the migrant flows for the different subgroups listed above,
- (ii) the age sex composition of the total arrivals and departures compared to the Australia-born resident population. The age composition of migrant subgroups

is also considered for males and females, along with the sex ratios for the subgroups,

(iii) the occupational characteristics of the Australia-born population employed full-time aged 15-64.

In this section males and females are considered separately.

MIGRANT FLOWS

Between 1981 and 1986 the 43,809 Australia-born population usually resident in New Zealand in 1981 received a net gain of 4,384 people or slightly over 10 percent of the 1981 stock. Of this total the resident male population of 20,229 gained 2,293 or 11.3 percent while the resident female population of 23,585 gained slightly fewer people, 2,091 or 8.9 percent (Table 4.1). While these figures indicate the gains to the resident population, they do not show anything about the differences between permanent and long-term and short-term intentions of these new migrants. For this reason a break-down of the total arrivals and departures into New Zealand residents and non-resident groups is useful (Table 4.1).

It can be seen from Table 4.1 that there was a substantial loss of 5,885 to New Zealand of Australia-born New Zealand residents between 1981 and 1986. Of these 525 or 8.9 percent were intending to be absent for only short-term or temporary stays overseas. Conversely it is apparent that there are larger gains to New Zealand in the non-resident Australia-born; 10,269 in total. In this group there was a net loss of short-term or temporary migrants (-1863).

Table 4.1 Net migration of Australia-born New Zealand residents and non-residents by migrant category, 1 April 1981 - 31 March 1986.

Migrant Category	Males	Females	Total
<u>New Zealand residents</u>			
Permanent and long-term	-2583	-2777	-5360
Short-term	-409	-116	-525
Total	-2992	-2893	-5885
<u>Non residents</u>			
Permanent and long-term	5919	6213	12132
Short-term	-634	-1229	-1863
Total	5285	4984	10,269
<u>All Australia-born</u>			
Permanent and long-term	3336	3436	6772
Short-term	-1043	-1345	-2388
Total	2293	2091	4384

Source: Unpublished tables, Migration Statistics Section,
Department of Statistics, Dunedin.

While a net loss of all short-term migrants (male and female, resident and non resident) of 2388 for this period may seem small in the context of the total population, it accounts for the equivalent of 5.5 percent of the Australia-born stock usually resident in New Zealand in 1981.

It should be remembered that a figure for "short-term" net emigration represents the balance of arrivals and departures of non resident Australia-born visitors, as well as the balance of short-term departures of Australia-born New Zealand residents and short-term arrivals of Australia-born New Zealand residents after a period of less than 12 months' absence. This figure also includes a number of "category jumpers" who may have arrived in New Zealand intending to stay permanently or long-term but instead departed soon after arrival. Conversely this group may have gained some migrants arriving in New Zealand for a short-term stay but who have since decided to stay permanently or long-term.

The permanent and long-term net gain of 6772 to New Zealand is the balance of Australia-born who are usually New Zealand residents arriving in New Zealand after a period of twelve months or more resident elsewhere; Australia-born residents also departing for a period of twelve months or over, new arrivals intending to stay for at least twelve months and non residents who are departing after a long-term stay of at least twelve months. In addition there are some "category jumpers" originally classified as short-term migrants who have changed their intentions regarding their period of stay within New Zealand.

Gould (1984) contends that measures of total arrivals and departures (Total A/D) are superior to other data for an analysis of migrant populations (particularly in relation to migration effects on a resident population). He argues that permanent and long-term migration figures (PLT) are measures of intention only and that permanent and long-term statistics are best used in conjunction with total arrivals and departures as a measure of intention versus reality.

A comparison of the two migrant populations (PLT and total) provides an insight into a migrant's "experience" of New Zealand. If the permanent and long-term migrant numbers are greater than those of total arrivals/departures, then New Zealand as a migrant destination proves less attractive in reality to the migrant than imagined. However, total arrivals and departures only measure previous movements, while "permanent and long-term migration" is a mixture of intentions and actions of migrants (Bedford, 1987, 21). The differences between total arrivals and departures and permanent and long-term measures provides an estimate of "category jumping" as shown for 1981-1986 in Table 4.2.

Column four in Table 4.2 provides a measure of the non-New Zealand resident Australia-born who changed their minds and left following a short-term visit after originally intending to stay permanently or long-term. This figure is derived from the difference between the non-resident Australia-born departing after a short-term stay and the non-resident Australia-born intending only a short-term stay. Column five gives a comparison of the Australia-born New Zealand residents departing from New Zealand after a short-term stay, with the numbers of New Zealand residents intending

Table 4.2 Differences in the values between permanent and long-term (PLT) and total arrivals/departures (T.A/D) measures of male and female Australia-born migration, 1981-1986.

Sex	PLT (net) (c-f)	T.A/D (net) (A-D)	Difference (A-D) - (c-f)	Non- residents (a-d)	New Zealand Residents (b-e)
Males	3336	2293	-1043	-634	-409
Females	3436	2091	-1345	-1229	-116

- a - non-New Zealand residents, short-term arrivals
- b - New Zealand residents, returning after a short-term absence
- c - non-New Zealand residents, intending a short-term stay
- d - non-New Zealand residents, departing after a short-term stay
- e - New Zealand residents, departing for a short-term absence
- f - New Zealand residents, intending a short-term absence
- A - Total Arrivals, all migrants
- D - Total Departures, all migrants

Source: Unpublished tables, Migration Statistics Section, Department of Statistics, Dunedin.

a short-term stay excluded. These two columns cannot provide an absolute measure of migrants leaving before their originally intended departure, as some return migrants who intended to leave New Zealand but changed their minds and decided to stay longer are included. Also as Gould (1984) says in his article, these measures take no account of time lag effects that extend beyond the period of data collection.

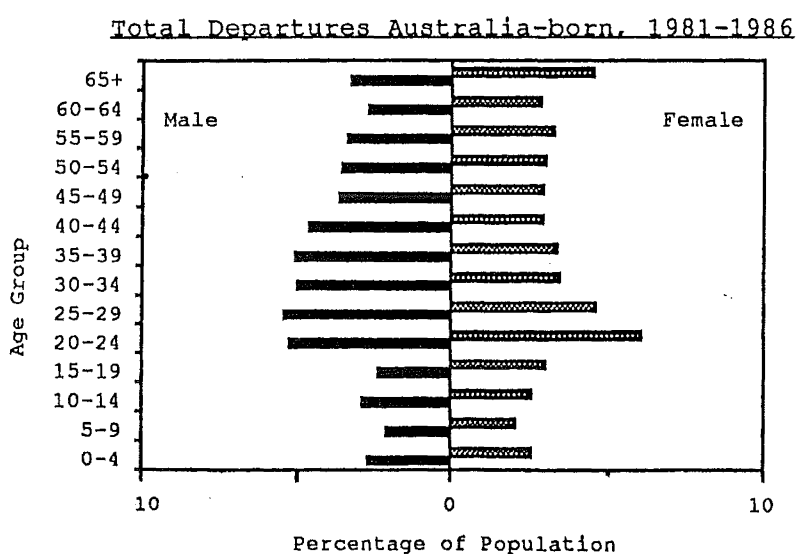
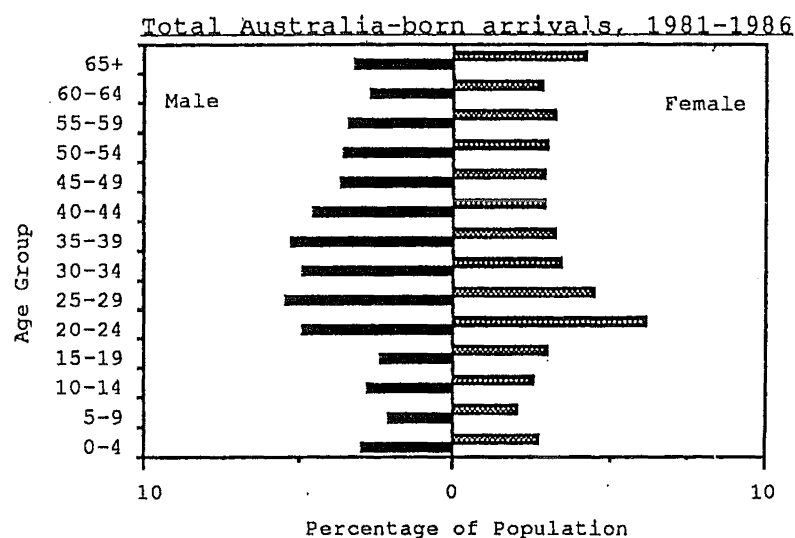
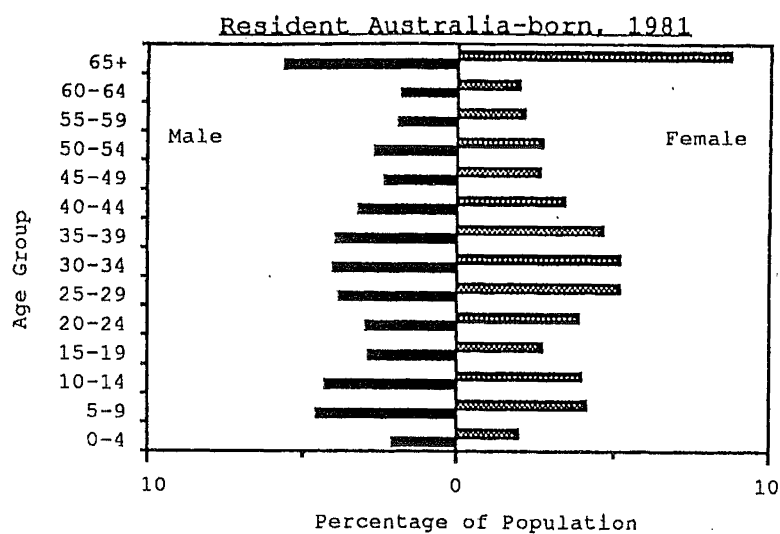
The figures in Table 4.2 indicate that the Australia-born females (resident and non-resident) make up the bulk of "category jumpers" (third column). Of this difference between measures of net permanent and long-term and total migration, two-thirds of the non-resident Australia-born are female (66%), while most of the New Zealand resident Australia-born are male (77.9%).

Once resident within New Zealand Australia-born males are more likely to leave New Zealand if dissatisfied than Australia-born females. Conversely more Australia-born female recent arrivals (i.e. not yet resident) are likely to leave New Zealand sooner than intended compared to their male counterparts (Table 4.2).

AGE SEX CHARACTERISTICS

Four basic methods are employed to examine age-sex characteristics of the Australia-born migrant and resident populations. The first is a comparison of the age sex pyramids of the Australia-born total arrivals and departures 1981-1986, and the 1981 Australia-born residents in New Zealand (Figure 4.1).

Figure 4:1. Age-Sex Pyramids of the Australia-born Residents (1981) and Total Arrivals and Departures, 1981-1986.



The second method is based around grouping the migrant and resident populations into four functional age groups:

- (i) 0-14 young dependents,
- (ii) 15-34 young adults, independent, working age,
- (iii) 35-64 mature adults, independent, working age,
- (iv) 65+ retired adults, independent, post working age.

A series of cumulative frequency bar graphs have been produced to show the composition of the migrant and resident Australia-born populations (Figure 4.2). The migrant populations will then be compared to the 1981 Australia-born usually resident population using an index of dissimilarity (Table 4.3).

The final method of looking at the composition of the Australia-born populations is a comparison of the absolute differences between the sex ratios of the migrant subgroups and the Australia-born 1981 stock. Table 4.4 shows the number of males per hundred females for a breakdown of resident and non-resident subgroups over 1981-1986.

Population Age Structures

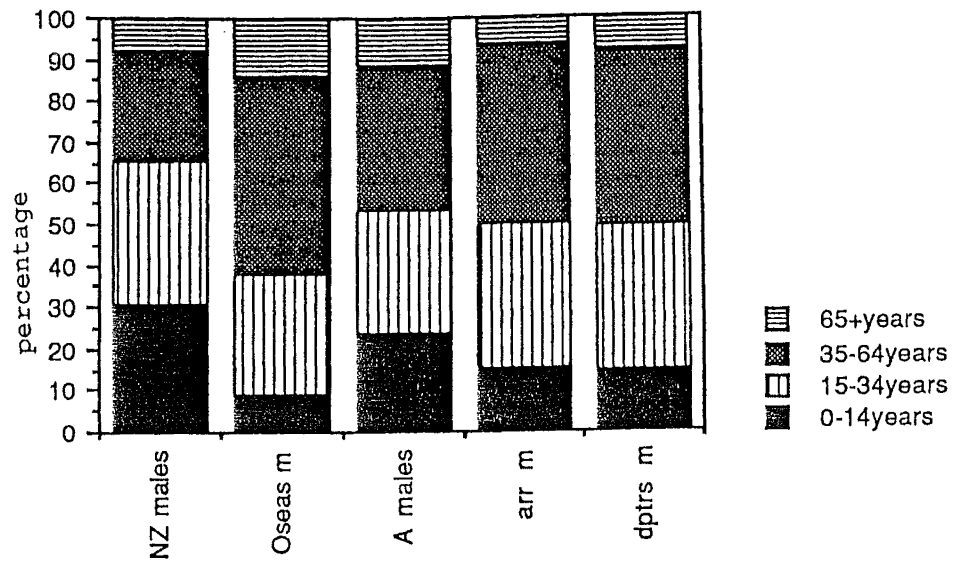
When comparing the age-sex pyramids of the total Australia-born arrivals and departures 1981-1986, and the usually resident Australia-born 1981, it is noticeable that the resident population pyramid has a significantly different shape to that of the migrant populations (Figure 4.1). The most prominent differences between the migrant and resident populations occur in the 5-14, 20-44 and 65+ age groups. The resident Australia-born population of 1981 shows very large proportions in the youth and retired age groups compared to the migrant populations with their high proportions in the 25-44 age bracket.

The resident and migrant populations show higher male numbers than females in the youthful age group. In the working age groups the migrant and resident populations show no such similarity. For the Australia-born aged 20-24, females predominate in all three populations, whereas for the Australia-born aged 25-59 the males outnumber females. Above this age group the female Australia-born again show dominance in their numbers. This is particularly so for the population aged 65 and over (i.e. residents in the total population - females 8.7%, males 5.6%; total arrivals females 4.3%, males 3.2%; total departures females 4.5%, males 3.3%). From the age group 20-24 years to the age group 40-44, the proportions of females drop much more rapidly than the male Australia-born which remains relatively unchanged. This shows that the majority of Australia-born females coming to, or leaving New Zealand are concentrated in the 20-24 age group.

The Australia-born - residents and migrant subgroups

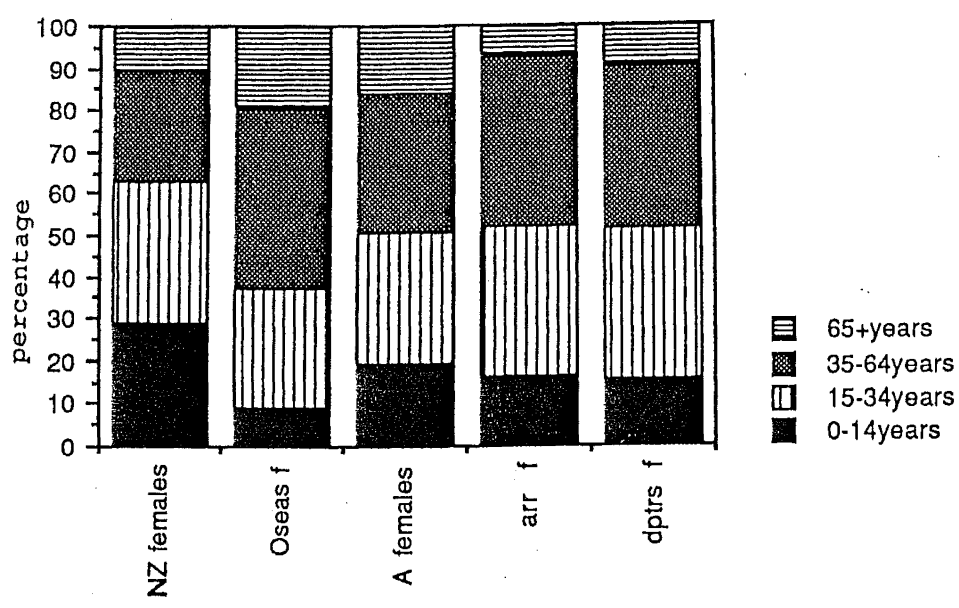
When the Australia-born migrant and resident populations are separated into subgroups and depicted in four age groups each, then, as in Chapter Three, the importance of the 0-14 age group to the resident population becomes clear. However the large proportions of juvenile Australia-born are not reflected in the total migrant population profiles (Figure 4.2). Twenty-three percent of the Australia-born male resident population is aged between 0-14, compared to 15.1 percent of the total male arrivals and 14.8 percent of the total male departures. Of the resident female population 19 percent are aged between 0-14, compared to 15.9 percent of the total female arrivals and 15.3 percent of the total female

Figure 4:2 Age Composition of the Resident Populations, 1981; and the total Australia-born Arrivals and Departures, 1981-1986.



Males

Females



departures.

The total arrivals and departures of Australia-born can be broken down into permanent and long-term, and short-term, residents and non-residents, which show interesting differences between the subgroups (Figure 4.2). Most noticeable are the large proportions of 0-14 year-olds and very small proportions of those over 64 years featuring within the permanent and long-term migrant populations. This means that these Australia-born arrivals in and departures from New Zealand are youthful populations, while the short-term resident male and female arrivals and departures have the smallest proportions of those aged 0-14 and the largest proportions of those aged 65 or older.

The permanent and long-term Australia-born (especially non-resident) arrivals are the most youthful of the population subgroups, whereas a large proportion of the Australia-born permanent and long-term (particularly non-resident) departures are of the younger working age group, 15-34 years. This could arise for three possible reasons;

- (i) adverse economic conditions in the 1980s within New Zealand,
- (ii) the Australia-born migrants in the permanent and long-term category came to New Zealand for long-term stays and have completed their intended visits to New Zealand and are now leaving,
- (iii) the Australia-born may be leaving New Zealand after coming to New Zealand as youthful dependants, and are now, like many New Zealand-born in this age group, leaving New Zealand for overseas.

Indices of Dissimilarity for Australia-born Age Groups

Using the index of dissimilarity, comparisons can be made between the age structures of the Australia-born male and female stock of 1981 and the male and female migrant subgroups (Table 4.3). This index shows that the migrant groups most similar to the Australia-born resident population within New Zealand are the total arrivals and departures; they show the lowest values, suggesting smaller differences between their age composition and the age composition of the Australia-born New Zealand residents (Table 4.3).

Table 4.3 Index of dissimilarity between male and female age structures of resident Australia-born, 1981 and migrant subgroups, 1981-1986.

Migrant Subgroup	Index of dissimilarity	
	Males	Females
Total Arrivals	14.4	9.8
Total Departures	14.6	10.0
<u>Residents</u>		
Permanent and long-term arrivals	21.9	25.3
Permanent and long-term departures	18.6	21.6
Short-term arrivals	20.9	16.2
Short-term departures	19.7	15.7
<u>Non-residents</u>		
Permanent and long-term arrivals	32.1	36.7
Permanent and long-term departures	23.9	30.0
Short-term arrivals	14.9	10.2
Short-term departures	14.6	10.0

Source: Unpublished tables, Migration Statistics Section, Department of Statistics, Dunedin 1988.

The closest subgroup to the resident Australia-born is the short-term non-resident arrivals and departures which comprises the largest number of movers. The similarity in value of total arrival and departures to the short-term non-resident indices reflects the dominance of the short-term moves in the migrant flows. The subgroup which shows the greatest difference from the Australia-born population resident within New Zealand is the permanent and long-term non-residents. They also are the most youthful population of all the migrant subgroups.

The range of values for the male index of dissimilarity is smaller than that for the female groups (i.e. 32.1 - 14.6, compared to 36.7 - 9.8). This could suggest that female migrant subgroups have a wider variation between them than the male migrant subgroups when the age data for the migrant populations are aggregated into the four age groups. Differences between arrival and departure values within subgroups show that the non-resident permanent and long-term arrivals and departures are the most dissimilar female subgroup (arrivals 36.7, departures 30.0), which could indicate a degree of "category jumping". This group also differed the most from the Australia-born resident population. The subgroup with the least variance between arrival and departure values was the male total arrivals and departures category (14.4 arrivals, 14.6 departures), the groups which were also most similar to the Australia-born New Zealand resident males (Table 4.3).

Sex Ratios

The final aspect of the Australia-born migrant age-sex composition to be examined is the sex ratios.

The resident Australia-born population of 1981 has a reasonably low sex ratio of 85.8 males per one hundred females (a low sex ratio such as this is often used to indicate an internal migrant/migration population), (Table 4.4).

The low sex ratio of the Australia-born 1981 stock is particularly noticeable when it is compared to the New Zealand-born resident population (98.1) or total Commonwealth countries (98.4). While the total arrival sex ratio (108.8) and total departure sex ratio (108.6) higher, this is due to the large numbers of short-term non-residents that have high sex ratios (arrivals 111.8, departures 111.6). The composition of the total arrival/departure migrant group varies markedly in range for the Australia-born population (from 111.8 for short-term non-resident arrivals to short-term resident departures, 77.2). The high figures for the total arrivals and departures suggest that the stock of the Australia-born residents in New Zealand, is undergoing a change to become more masculine (i.e. the sex ratio is higher for the migrants, than residents). However, this high value for total arrivals and departures is made up mainly from short-term non-resident visitors. While values for permanent and long-term resident and non-resident migrants are higher than the sex ratios for the 1981 Australia-born resident, they are not having such a dramatic impact as the total migrant values might suggest.

Table 4.4 Sex ratios for the Australia-born New Zealand residents and selected overseas-born residents, 1981 and the Australia-born migrant subgroups, 1981-1986.

Population Subgroups	Sex ratios	Difference
<u>Australia-born</u>		
Residents	85.8	
<u>Migrants</u>		
Total arrivals	108.8	23.0
Total departures	108.6	22.8
<u>Residents</u>		
Permanent and long-term arrivals	92.0	.6.2
Permanent and long-term departures	92.7	6.9
Short-term arrivals	81.7	-4.1
Short-term departures	77.2	-8.6
<u>Non-residents</u>		
Permanent and long-term arrivals	98.1	12.3
Permanent and long-term departures	105.9	20.1
Short-term arrivals	111.8	26.0
Short-term departures	111.6	25.8
<u>Selected 1981 residents birthgroups</u>		
New Zealand-born	98.1	12.3
Commonwealth-born	98.4	12.6
Other overseas-born	116.3	30.5

Sources:

Migrants

Unpublished tables produced by the Migration Statistics Section, Department of Statistics, Dunedin.

Residents

Table 10 New Zealand Census of Population and Dwellings 1981, Volume 7 Birthplaces and Ethnic Origin. Department of Statistics, Wellington, 1983.

Table 4 New Zealand Census of Population and Dwellings 1986, Birthplaces and Ethnic Origin Series C, Report 6. Department of Statistics, Wellington, 1988.

OCCUPATION CHARACTERISTICS OF THE AUSTRALIA-BORN

This section looks at the occupation structures of the Australia-born residents in 1981 and the Australia-born permanent and long-term arrivals and departures 1981-1986. In order to do this the migrants and residents aged 15-64 (i.e. the population theoretically available for full-time employment) has been compared to the numbers of people in each population group actually stating an occupation.

Secondly the one digit occupation codes have been selected to provide profiles of the Australia-born and New Zealand-born resident and the Australia-born migrant workforce. An index of dissimilarity has been applied to these percentages in order to compare the Australia-born and New Zealand-born populations.

Proportions of the Australia-born 15-64 employed

Between 1981 and 1986 the Australia-born migrants coming to and leaving New Zealand possessed a wide range of job skills. It is interesting to note that the migrants stating a full-time occupation made up a large proportion of the total 15-64 year-old Australia-born permanent and long-term arrivals and departures (Table 4.5).

Over the period 1981-1986 88 percent of the Australia-born male permanent and long-term arrivals to New Zealand aged 15-64 stated an occupation, while the corresponding male departures reported a slightly lower proportion (87.4 percent), Table 4.5.

The female Australia-born migrants have a much lower proportion reporting an occupation than the male arrivals or departures. However, it is interesting to see that for

Table 4.5 The Australia-born and New Zealand-born residents, 1981 and the Australia-born permanent and long-term migrants, 1981-1986 reporting an occupation as a proportion of those in each population aged 15-64.

Population	Male	Female
<u>1981 Residents</u>		
<u>Australia-born</u>		
Number 15-64	13026	15306
% reporting an occupation	87.5	45.6
<u>New Zealand-born</u>		
Number 15-64	820161	824316
% reporting an occupation	83.4	43.8
<u>1981-1986 Australia-born migrants</u>		
<u>PLT Arrivals</u>		
Number 15-64	5036	5491
% reporting an occupation	88.0	57.3
<u>PLT Departures</u>		
Number 15-64	4408	4709
% reporting an occupation	87.4	51.8

Sources:

Table 10 New Zealand Census of Population and Dwellings 1981, Volume 7 Birthplaces and Ethnic Origin. Department of Statistics, Wellington, 1983.

Table 4 New Zealand Census of Population and Dwellings 1986, Birthplaces and Ethnic Origin Series C report 6. Department of Statistics, Wellington, 1988.

the female migrants there is a much higher proportion stating an occupation (arrivals 57.3%, departures 51.8%) than for either the New Zealand-born (43.8 percent) or Australia-born (45.6 percent) residents.

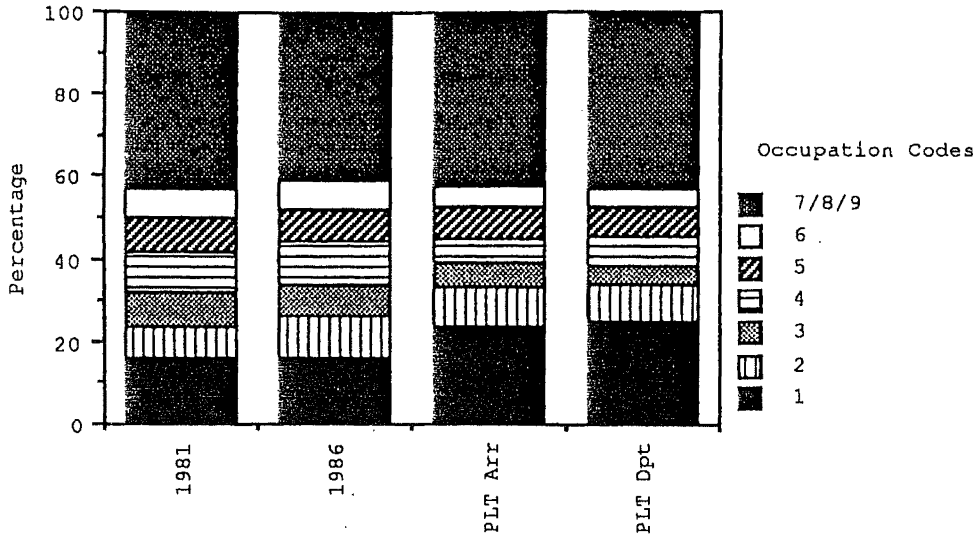
Of the male and female Australia-born migrants, it is the female workers who contributed larger numbers to their respective workforces, i.e. from 1981-1986 the female net gain of 708 provided the equivalent of 10.2 percent of the 1981 Australia-born females resident workforce, while the net gain of 582 Australia-born males to New Zealand stating an occupation was the equivalent of 5.1 percent of the resident Australia-born male workforce. As there is a smaller pool of employed Australia-born females in New Zealand compared to males, the significance of this contribution through migration is heightened.

Occupation Structure

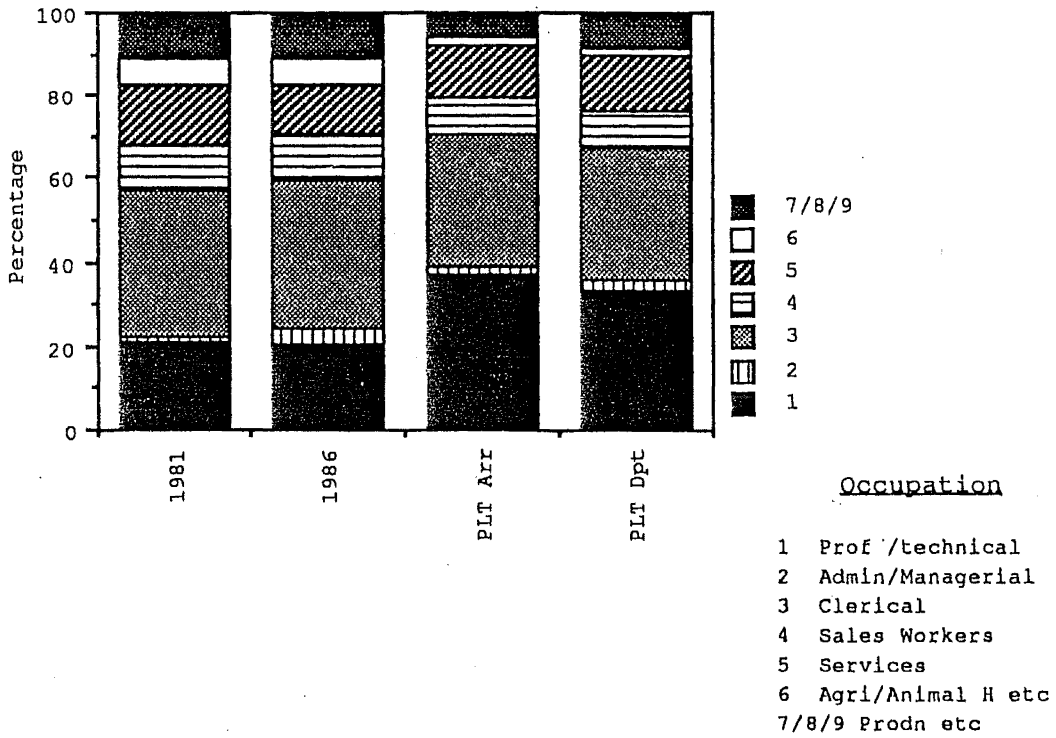
Figure 4.3 shows differences in the composition of the resident and migrant populations. Some of the most interesting differences to arise are those occurring between the male and female occupation structures. Characteristically, the Australia-born and New Zealand-born populations show high proportions in managerial and production occupations compared to the female Australia-born and New Zealand-born, Figure 4.3. The female resident Australia-born population has a large percentage employed in clerical work (34.6 percent) as to the New Zealand-born females (33.8 percent), while the Australia-born permanent and long-term female arrivals and departures also show reasonably large numbers in the clerical professions. There are noticeably high proportions in the professional, technical and related

Figure 4:3. Australia-born, New Zealand-born Residents (1981); and Australia-born PLT Arrivals and Departures (1981-1986) Occupation Codes.

Male Australia-born Residents and Migrants, 1981-1986



Female Australia-born Residents and Migrants, 1981-1986



Occupation

- 1 Prof /technical
- 2 Admin/Managerial
- 3 Clerical
- 4 Sales Workers
- 5 Services
- 6 Agri/Animal H etc
- 7/8/9 Prodn etc

professions (Australia-born residents 21.2 percent, New Zealand-born residents 18.6 percent; Australia-born migrants, arrivals 36.9 percent, departures 33.6 percent). The female workforces also show a relatively large proportion of women are working in the service category compared to the male workforces (Figure 4.3). The service occupations include motel/hotel/restaurant workers and presumably young casual workers on long-term holidays are employed.

This raises an important point to consider when examining the occupation structure of any workforce, most particularly a migrant population. A migrant highly skilled in an occupation may arrive in New Zealand on a working holiday, or because of job advancement. There is no way of dividing migrants or any other workforce group into skilled and unskilled occupations because of job changing. While the female clerical and male production migrant categories have high numbers in them and this shows the relatively large-scale movement of workforce employed, within these categories there will be "skilled" workers as well as "unskilled" or casual workers.

Using an index of dissimilarity, the occupation profile of the migrant groups and New Zealand-born can be compared to the Australia-born resident population. The male and female populations are considered separately (Table 4.6).

This table shows the overall similarity in values between the total employed Australia-born migrants and New Zealand-born residents to the Australia-born residents. It indicates that of the male populations the Australia-born arrivals are the most similar to the Australia-born residents,

Table 4.6 The difference in percentages for the one digit occupation codes between the Australia-born residents 1981 and (a) Australia-born permanent and long-term arrivals 1981-1986, (b) Australia-born permanent and long-term departures 1981-1986, and (c) New Zealand-born residents 1981.

Male occupation codes	Arrivals	Departures	New Zealand-born
1. professional, technical etc.	7.7	8.8	5.0
2. administrative and managerial	1.9	1.2	2.7
3. clerical	2.4	3.3	0.2
4. sales workers	4.1	3.3	0.7
5. service workers	0.6	0.8	2.5
6. primary production	2.2	3.1	8.2
7/8/9. production, transport, etc.	0.5	0.3	3.0
Female occupation codes			
1. professional, technical etc.	15.7	12.4	2.6
2. administrative and managerial	0.8	1.1	0.4
3. clerical	2.7	3.6	0.8
4. sales workers	2.7	2.0	0.8
5. service workers	1.5	1.2	2.0
6. primary production	4.5	4.4	1.2
7/8/9. production, transport etc.	5.2	2.4	3.7

Sources:

Migrants.

Unpublished tables produced by the Migration Statistics Section, Department of Statistics, Dunedin.

Residents

Table 4 New Zealand Census of Population and Dwellings 1981, Volume 7, Birthplaces and Ethnic Origin. Department of Statistics, Wellington, 1983.

at the same time the Australia-born male departures show only a slightly higher index figure for the total stating an occupation.

Of the one digit codes the professional/technical and related workers show the greatest variance between the Australia-born resident males and the other population groups. Other occupation categories such as the primary production, service and production codes show only low indices of dissimilarity between the Australia-born and New Zealand-born residents and Australia-born migrants. The Australia-born and New Zealand-born residents within clerical occupations show relative similarity in their share of their respective employed populations compared to the higher indice values for the Australia-born resident and migrant populations.

For the female workforces the situation is somewhat different. The Australia-born and New Zealand-born residents show the most similarity, but of the migrant populations it is the Australia-born females departing who show the most similarity to the Australia-born resident female occupation structure.

The one digit codes for the female workforces, like the male workforces, show a considerable degree of variation in the value of indices obtained for each occupation. As could be expected from the high proportion of female Australia-born migrants concentrated in the professional/technical and related occupations, the Australia-born arrival and departure indices are quite high compared to the New Zealand-born (15.7 arrivals, 12.4 departures, 2.6 New Zealand-born). Because of the large numbers of migrant females involved in this occupation category this must have a significant

effect on the indices derived for the total occupation structure of the female population groups.

It is also interesting to note the low index values for administrative/managerial workers. This category has experienced a rapid growth in numbers and proportion over 1981-1986, as will be seen in Chapter 5. Growth here is not reflected in net migration gains, nor is this increase in the proportion of women employed in this category confined to the Australia-born.

CONCLUSION

The migrant Australia-born arriving in and departing from New Zealand can be seen to differ from Australia-born residents (1981) in a number of important ways. Firstly, the age structures of the resident and migrant populations show that those living in New Zealand are generally a much more youthful population than those coming or going. This indicates that the settled Australia-born population is much more "family" oriented than the migrant Australia-born which appear to be more "workforce" motivated in their movements. Of the migrants to New Zealand (i.e. mainly the permanent and long-term categories have been used) the younger age groups can be seen to be important, however it is those people of working age who dominate overall.

The real importance of the youthful age group is shown up particularly in the permanent and long-term non-resident arrivals. The large numbers of these young, possibly first-time arrivals, probably include many Australia-born children accompanying the New Zealand-born parents to New Zealand as has been suggested by Bedford and Brown (1988, 61).

Of the migrant workforce populations, a sizeable proportion can be seen to be concentrated in the professional/technical category, and, for Australia-born males, there is also some concentration in the production category. The Australia-born female workforce is more evenly spread with significant proportions employed in clerical and service occupations. The wide range of occupations in which the Australia-born migrants specify on their arrival and departure cards, coupled with the high levels of mobility of people between Australia and New Zealand, suggest that the idea of a common trans-Tasman labour market is feasible.

CHAPTER FIVETHE AUSTRALIA-BORN RESIDENTS, 1981 AND 1986

From a population of 43,812 in 1981 the number of Australia-born residents in New Zealand grew to 47,211 by the 1986 census, an increase of 3,399 people or 7.8 percent of the 1981 stock. The net balance of total arrivals over departures of Australia-born migrants between 1 April 1981 and 31 March 1986 was 3,374 people which is very close to the intercensal change of Australia-born residents. If only permanent and long-term migration figures are considered, the net gain over the five year period is 6,752. This overstatement of the migrant contribution to the Australia-born resident population shows that the effect of "category jumping" can be a significant problem. It also shows that when examining intercensal changes and the proportion of change caused by a migrant population, it is useful to use total arrival and departure data.

This chapter examines the migrant population during the intercensal period 1981-1986 and the Australia-born census stock of 1981 and 1986 with a view to establishing whether the resident population has undergone much change to its age-sex and occupational characteristics as a result of trans-Tasman movement of the Australia-born migrants. At times the New Zealand-born and other overseas-born residents within New Zealand in 1981 and 1986 will also be included in comparisons to give a wider context to changes in the Australia-born resident and migrant populations.

AGE-SEX CHARACTERISTICS

This section considers two aspects of the age-sex composition of the Australia-born migrants, and the Australia-born, New Zealand-born and other overseas-born residents. Firstly, the male and female populations of the stock and migrant universes are compared in terms of four age groups. Secondly the sex ratios of the different populations are examined.

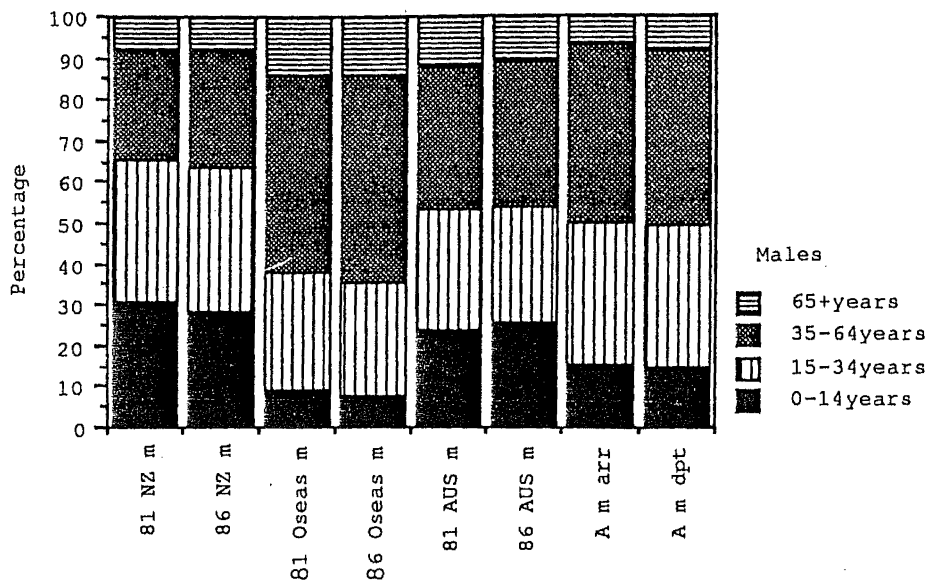
Age Structure

The Australia-born migrant and resident populations have significantly different age structures (Figure 5.1). The migrant Australia-born tend to have larger proportions in the working age groups (15-64) while the resident Australia-born have high proportions of their population in the youthful (0-14) and retirement (65+) age brackets. The net effect of migration on the resident population structure from 1981-1986 has been to raise the numbers of children (1981 males 23.5 percent, females 19 percent; 1986 males 25.6 percent, females 21 percent), and also to a lesser degree people of working age (15-64), this has meant a decrease in the proportion of Australia-born residents over the age of sixty-four years. The increasing numbers of children in the Australia-born stock gained through migration comes about from two main sources: the work-related migration of Australia-born adults to New Zealand with their dependants and also the arrival of Australia-born children with their New Zealand-born parents.

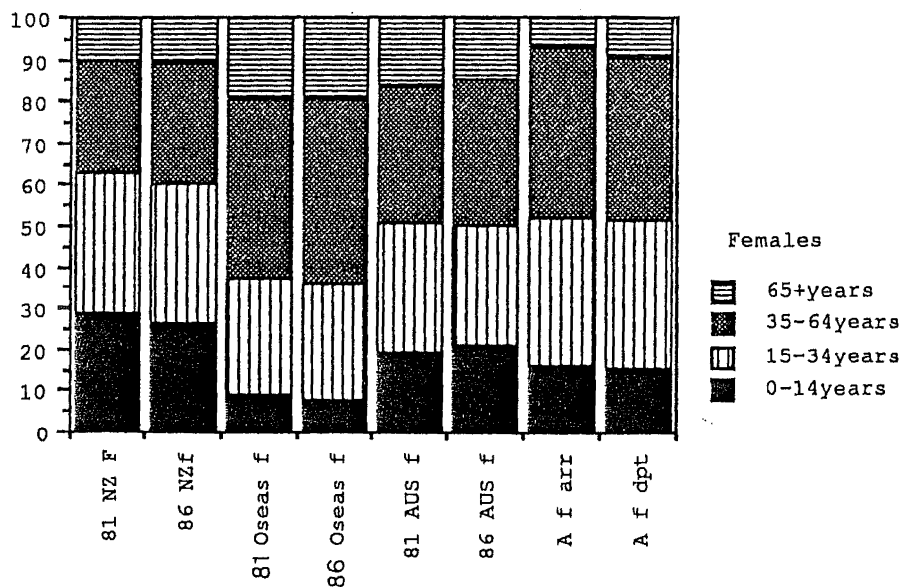
Over the 1981-1986 period the age composition of all resident populations have altered to some extent. The New

Figure 5:1. Age Composition of the Australia-born, New Zealand-born and other overseas-born Residents, 1981 and 1986; Total Australia-born Arrivals and Departures, 1981-1986.

1981-1986 Residents, and Total Australia-born Migrants



1981-1986 Residents, and Total Australia-born Migrants



Zealand-born juvenile proportion of the usually resident population has decreased (1981 males 30.8 percent, females 29 percent, 1986 males 28.1 percent, females 26.2 percent), while the child component of the other overseas-born decreased only a little. For those aged sixty-five years or over in the New Zealand-born or other overseas-born resident populations, the differences between them and the Australia-born become even more clear, because the New Zealand-born and other overseas-born populations are increasing slightly, while the Australia-born percentage in the retirement age group is decreasing (Figure 5.1).

The male and female migrant and resident Australia-born show differences in their age composition. The largest percentage differences in the male migrant/resident populations are found in the youthful (0-14) and older working age groups (35-64). Approximately one quarter of the male Australia-born stock in 1981 and 1986 were in the 0-14 years age group; this compares with 15 percent of the total male arrivals and departures. While the migrant male population had over 40 percent in the 35-64 age group, the resident males in this age group comprised 35 percent of the Australia-born male stock.

In the case of Australia-born females a slightly different picture emerges. Differences between migrant and resident groups were largest for those of early working age (15-34) and retirement age (65+). The impact of migration can be seen to be both selective and differential on the male and female age structure of the residents. This is because of the different effects that the male and female migrants have on the resident populations. In both cases, the age

groups that have the largest variations between migrants and residents of the working age (males 35-64, females 15-34) have relatively large percentages of migrants. Conversely, the males 0-14 and females 65+ have very low proportions of migrants, but high percentages in the resident populations.

One of the most noticeable findings in the age compositions of the Australia-born, New Zealand-born and other overseas-born residents and Australia-born migrants is the differences between the Australia-born and other overseas-born in the proportion in each of the four age groups. Coupled with this are the trends seen in the Australia-born age composition of increasing youthfulness which is not found in the other two resident populations. This youthfulness could in fact be another aspect of an "internal" type of migration in that family groups may find it easier and be more prepared to migrate to New Zealand rather than to more distant overseas destinations. The absence of any entry permit requirements certainly facilitates international migration of families.

The increasing numbers of children in the Australia-born resident population is a continuation of a trend first noted in Chapter Three. The Australia-born arrivals and departures, while having significantly lower numbers in the 0-14 age group, suggest that while there are relatively small proportions of Australia-born children arriving or leaving the net gain to the Australia-born population resident in New Zealand is reasonably big. This tendency of the Australia-born migrants in the 0-14 age group to contribute significant net gains to a resident birthplace population supports the idea of Australia-born children

coming to New Zealand with their New Zealand-born parents.

Sex Ratios

The sex ratios of the Australia-born, New Zealand-born and other overseas-born residents and Australia-born migrants 1981-1986 are shown in Table 5.1. It is evident that there are low proportions of males to females in the Australia-born and New Zealand-born resident populations compared to the sex ratios for the other overseas-born residents. It is also interesting to note the amount of difference between the resident populations in 1981 and 1986, the Australia-born and New Zealand-born show small changes to their sex ratios, an increase of 0.1 and a decrease of 0.5 respectively, whereas for the other overseas-born there was a decline of 2.5.

The sex ratios of the resident and migrant Australia-born populations by age group are shown in Table 5.2. Similarities exist between the 1981 and 1986 residents and also between the two migrant groups. While the resident Australia-born total population shows total sex ratios of 85.8 (1981) and 85.9 (1986) which indicate high proportions of females to males, the migrants show high proportions of males to females. i.e. 108.8 (arrivals) and 108.6 (departures).

When the resident and migrant populations are considered in four age groups interesting differences between the mobile and resident populations emerge. The residents show low sex ratios for all age groups except the 0-14 year olds which could be expected to show any selectivity from the effects of migration as they are "dependants" and "carried" by their decision-making parents.

Table 5.1 Sex ratios of the Australia-born, New Zealand-born, other overseas-born residents, 1981 and 1986; Australia-born total arrivals and departures 1981-1986.

Birthgroup	1981	1986	Difference
<u>Residents</u>			
Australia-born	85.8	85.9	+0.1
New Zealand-born	98.1	97.6	-0.5
Other overseas-born	105.6	103.1	-2.5
<u>Migrants</u>			
Total Australia-born arrivals		108.8	
Total Australia-born departures		108.6	-0.2

Sources:

Table 10 Usually Resident Population by Age Groups. New Zealand Census of Population and Dwellings 1981. Volume 7, Birthplaces and Ethnic Origin Department of Statistics, Wellington 1983.

Table 4 Population Resident in New Zealand, Birthplace by age groups and sex. 1986 New Zealand Census of Population and Dwellings Birthplaces and Ethnic Origin, Series C, Report 6, Department of Statistics, Wellington, 1988.

Unpublished tables, Migration Statistics Section, Department of Statistics, Dunedin.

In the case of the Australia-born aged 35-64 years the sex ratio is much higher (123.3 for arrivals compared to 85.8 for residents in 1986). The sex ratios for the migrants in the older working age group confirm the stereotype of high masculinity in international migration flows, while the younger working age migrants do not show this nearly so much.

The migrant Australia-born adult populations show consistently higher sex ratios than the residents but this has had little impact on the sex ratios of the resident population. Indeed between 1981 and 1986 the sex ratios for all age groups in the Australia-born resident population fell.

This lack of similarity between the migrant and resident Australia-born may suggest that most residents are "staying put" and that would confirm Goldstein's (1954) finding that most out-migration from an area is by the recent immigrants.

The lack of any significant change in the sex ratios of the resident Australia-born population over the period 1981-1986 is due in part to the relatively small net gain from migration during the intercensal period, and also in part to the fact that the net population gain was spread over all age groups.

Usual residence five years previously

Another source of data on the age-sex composition of the Australia-born migrants to New Zealand during the period 1981-1986 is the 1986 census. The census question on place of residence five years before the 1986 enumeration makes it possible to identify people, born in Australia,

Table 5.2 Sex ratios (males per 100 females) of the Australia-born residents 1981 and 1986 and the total Australia-born arrivals and departures 1981-1986.

Age group	Residents 1981	Residents 1986
0-14	106.0	104.6
15-34	79.9	83.7
35-64	90.1	85.8
65+	64.6	63.4
Total	85.8	85.9

	Arrivals 1981-1986	Departures 1981-1986
0-14	103.7	104.8
15-34	104.3	103.8
35-64	123.3	122.9
65+	73.5	73.0
Total	108.8	108.6

Sources:

Table 10 Usually Resident Population by Age Groups. New Zealand Census of Population and Dwellings, 1981. Volume 7 Birthplaces and Ethnic Origin. Department of Statistics, Wellington, 1983.

Table 4 Population Resident in New Zealand, Birthplace by age groups and sex. 1986 New Zealand Census of Population and Dwellings Birthplaces and Ethnic Origin, Series C, Report 6, Department of Statistics, Wellington, 1988.

Unpublished tables, Migration Statistics Section, Department of Statistics, Dunedin.

who were living either in Australia, or in New Zealand, or elsewhere overseas. Automatically excluded are those under the age of five years at the time of the 1986 census (Table 5.3).

Of the 21,861 Australia-born males aged five years and over in the 1986 census 70.4 percent were usually resident in New Zealand in 1981. In the case of the females, 69 percent of the 20,262 Australia-born residents in 1986 were also resident in New Zealand five years ago. The balance were resident overseas - 20 percent in Australia and 10 percent in other countries. These statistics indicate that the majority of Australia-born migrants enumerated in the 1986 census were part of the trans-Tasman flow; members of what McBean (1946, 93) regarded as a common labour market.

It should also be remembered that these people were asked to record their usual residence five years ago. This does not indicate the length of residence within New Zealand or anything about their movements between 1981 and 1986.

When age-sex pyramids are constructed for the Australia-born populations resident in New Zealand, Australia and other overseas countries five years before the 1986 census, it can be seen that the population resident in Australia had a distinctive structure (Figure 5.2). The wide base of the pyramid for the group resident in Australia in 1981 supports the argument that a significant part of the trans-Tasman migration in recent years has been of children. The fact that the greatest proportion is children aged 5-9 years in 1986 suggests that many are the offspring of New Zealanders who went to

Table 5.3 The Australia-born population (1986) aged five years and over by place of usual residence five years previously.

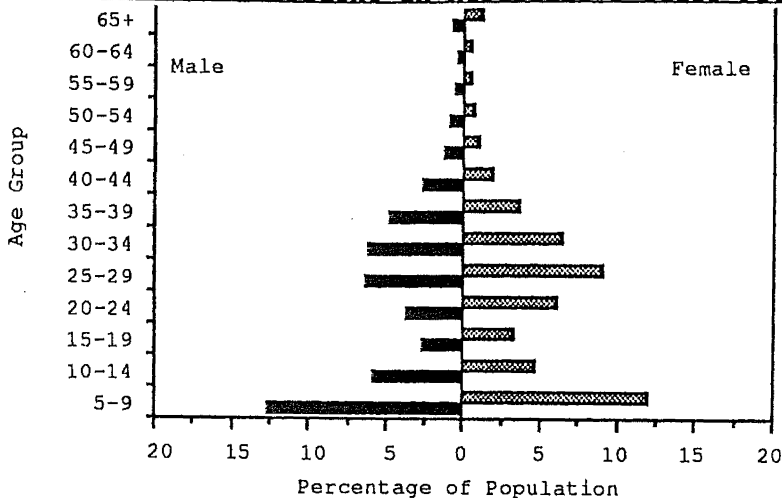
Age Group	Male	Female
<u>Usually resident in Australia in 1981</u>		
5-14	1488	1374
15-34	1524	2016
35-64	861	696
65+	57	96
<u>Total</u>	3930	4182
<u>Usually resident in New Zealand in 1981</u>		
5-14	2034	2007
15-34	9681	9105
35-64	3504	2715
65+	165	180
<u>Total</u>	15384	14007
<u>Usually resident elsewhere overseas in 1981</u>		
5-14	114	93
15-34	1101	1083
35-64	1227	771
65+	99	135
<u>Total</u>	2541	2082

Source:

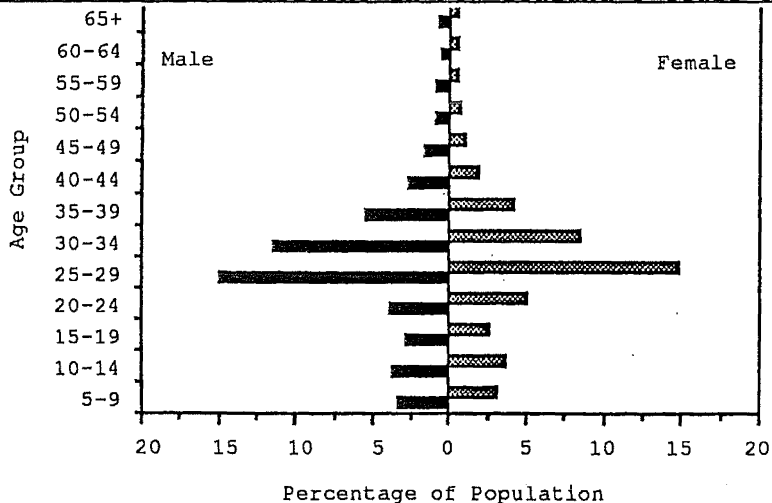
Unpublished Table 5, Population Resident Overseas 5 years ago, at 1986 census. 1986 Census of Population and Dwellings.

Figure 5:2. Age-Sex Structure of the Australia-born Residents aged 5 Years and over, by Country of Usual Residence 5 Years Ago, 1986.

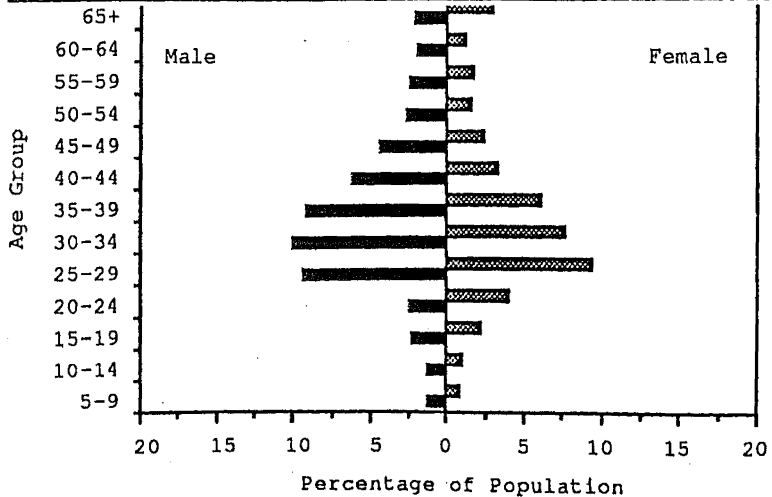
Australia-born Resident in Australia 5 Years Previously



Australia-born Resident in New Zealand 5 Years Previously



Australia-born Resident Elsewhere 5 Years Previously



Australia during the 1970s. They are part of the return migration of New Zealanders rather than a component of a new migrant Australian population. The Australia-born who were living in other overseas countries in 1981 have a much more typical migrant population structure (Figure 5.2).

It is interesting to note that while the majority of Australia-born are involved in a trans-Tasman exchange (although not necessarily a direct movement), significant differences exist in age structure between those previously resident in Australia or New Zealand (Figure 5.2).

These reflect the dominance of children in the migrant flows and the fact that children born to Australians in New Zealand are missing from the pyramid for Australia-born residents in 1986. These children would be classed as New Zealand-born.

It is noticeable the effects of the size of a migrant population can have on its composition. This is borne out by the much larger population of those aged 65 and over in the other overseas resident subgroup (Figure 5.2). In total the Australia-born usually resident in other overseas countries in 1981 numbered only 4623 or 12.5 percent of the total Australia-born in the 1986 census aged five years and over. The differences in age composition between this group and the other two populations of Australia-born should not be over-emphasised.

OCCUPATIONAL STRUCTURE

It has been established that working adults form a significant component of the Australia-born migrant population 1981-1986 (Chapter four), while the Australia-

born New Zealand resident population in 1981 and 1986 had large proportions of children. In this context it is useful to see if the occupational structure of the resident population has undergone any major change over the 1981-1986 period, and to attempt to establish what effect migration has had on these changes.

This section looks at the occupational structure of the Australia-born residents and migrants aged 15-64 reporting an occupation. Where applicable the New Zealand-born and other overseas-born resident populations in 1981 and 1986 have been included for further comparison. The occupational categories are the same as those used in Chapter four, i.e.

- (1) Professional, technical and related workers.
- (2) Administrative and managerial workers.
- (3) Clerical and related workers.
- (4) Sales workers.
- (5) Service workers.
- (6) Agricultural, animal husbandry, forestry workers, fishermen and hunters.
- (7/8/9) Production and related workers, transport equipment operators and labourers.

Firstly, the numbers of people aged 15-64 years in each population subgroup who reported an occupation are compared to the total in the age group to give an indication of participation in the New Zealand labour force. The broad employment characteristics of the male and female Australia-born, New Zealand-born and other overseas-born residents, as depicted in the one digit occupation codes 1981-1986, are then examined.

Labour force participation

In 1981, of the 13,026 Australia-born males aged between 15 and 64, resident in New Zealand, 11,529 (or 88.5 percent) reported an occupation. Compared to this, in 1986 out of the 13,887 Australia-born males in New Zealand, 10,887 (or 78.4 percent) reported an occupation, this represents a drop of 10 percent in labour force participation over the five years.

For the female Australia-born of working age there was a similar trend. In 1981 those aged 15-64 numbered 15,306 with 7,059 (46.1 percent) employed, while in 1986 when there were 16,374 Australia-born females in this age group of whom 6,471 (39.5 percent) stated an occupation. Between 1981 and 1986 the Australia-born males and females in the working age group have risen in number, while the actual numbers reporting an occupation have declined (Table 5.4).

Over the same period the New Zealand-born males and females stating an occupation, aged between 15-64 decreased their percentage employed full-time (1981-1986 males - 7 percent, females 2.7 percent), but to a lesser extent than the Australia-born residents. Of the male and female residents, the Australia-born males show the greatest decline in employment figures between 1981 and 1986, while the New Zealand-born females show the smallest percentage decline.

The smaller decrease in the employment figures for Australia-born and New Zealand-born women can be attributed in part to the uneven effects on the occupation structure of the resident New Zealand workers of the economic down-turn

Table 5.4 The Australia-born and New Zealand-born populations aged 15-64 years reporting a full-time occupation, 1981 and 1986.

	Australia-born		New Zealand-born	
	Males	Females	Males	Females
<u>1981</u>				
Number	11529	7059	690433	361947
% of age group	88.5	46.1	84.1	43.8
<u>1986</u>				
Number	10887	6471	684108	360981
% of age group	78.4	39.5	77.1	41.1
<u>Change 1981-1986</u>				
Number	-642	-588	-6325	-966
%	-10.1	-6.6	-7.0	-2.7

Sources:

Table 10 Usually Resident Population by Age Group.
 Table 14 Usually Resident Full-time Labour Force Aged 15 years and Over, Birthplace by Industry Division.
 New Zealand Census of Population and Dwellings, 1981 Volume 7: Birthplaces and Ethnic Origin.
 Department of Statistics, Wellington.

Table 4 Population Resident in New Zealand, Birthplaces by Age Groups and Sex.
 Table 7 Population Resident in New Zealand Aged 15 years and over Gainfully Employed in Full-Time Labour Force, Selected Birthplaces by Occupation (minor group level) and Sex.
 1986 New Zealand Census of Population and Dwellings Birthplaces and Ethnic Origin, Series C, Report 6,
 Department of Statistics, Wellington, 1988.

in the 1980s. Hardest hit by the recession have been the traditionally male dominated occupations concerned with production and rural activities.

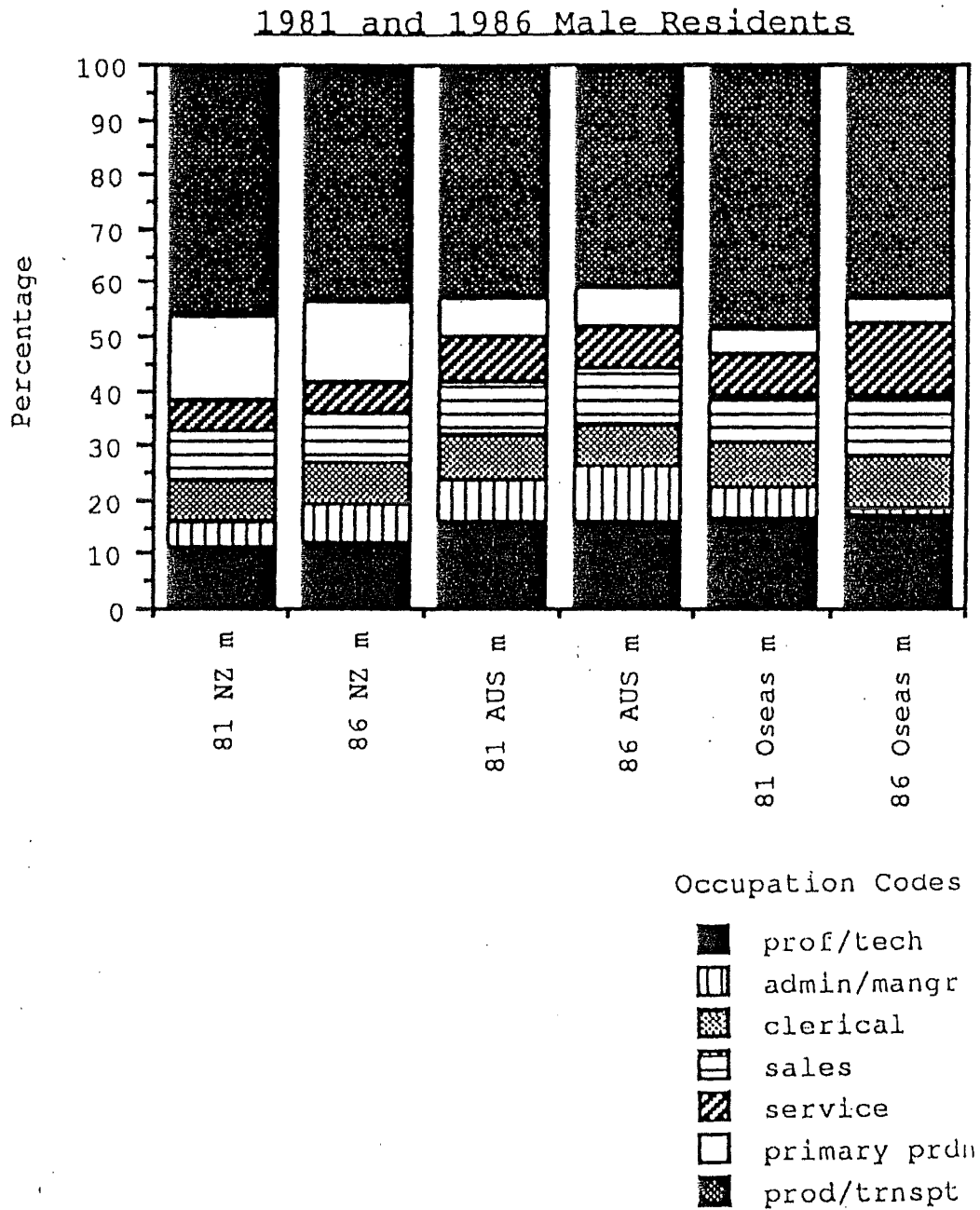
One digit occupation codes

This section looks firstly in closer detail at the occupational structure of the Australia-born, New Zealand-born and other overseas-born residents in 1981 and 1986. As with other occupation structure data, male and female populations are considered separately. Secondly the Australia-born resident populations of 1981 and 1986 and the permanent and long-term arrivals and departures for 1981-1986 are examined.

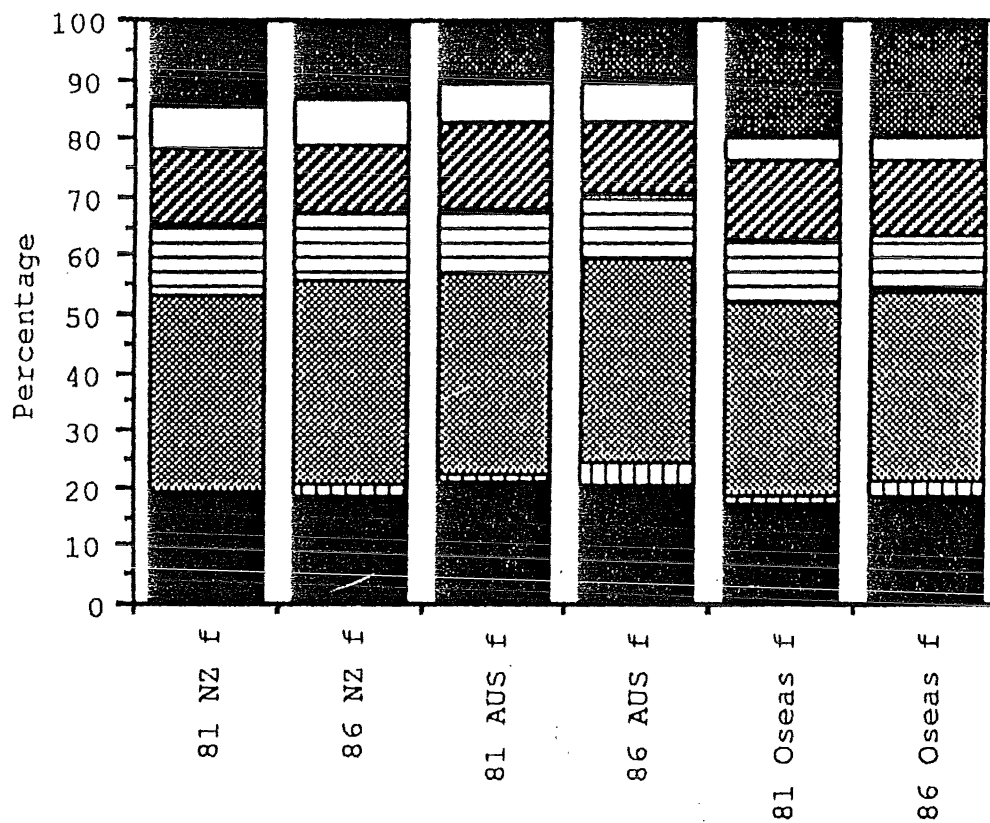
Cumulative frequency graphs for resident employed male populations, shown in Figure 5.3a, reveal some differences between the New Zealand-born, Australia-born, and other overseas-born. Most noticeable is the relatively low proportion of Australia-born males employed in production related jobs in comparison to the New Zealand and other overseas-born. Also of interest is the increasing proportion of Australia-born and other overseas-born males stating an administrative/managerial occupation compared to the smaller increase in this category of the New Zealand-born.

The Australia-born, New Zealand-born, and other overseas-born female populations stating an occupation all reflect the importance of clerical work (Figure 5.3b). It can be seen that the proportions of the women employed in administrative/managerial occupations are very small, but in all groups they have increased slightly since 1981.








Figure 5:3. Occupation codes of the Australia-born, New Zealand-born, and other overseas-born Residents 1981-1986.



1981 and 1986 Female Residents



Occupation Codes

-  prof/tech
-  admin/mangr
-  clerical
-  sales
-  service
-  primary prdn
-  prod/transpt

While the percentage employed in each category may differ from one female birthgroup to another the trends from 1981-1986 are very much the same overall.

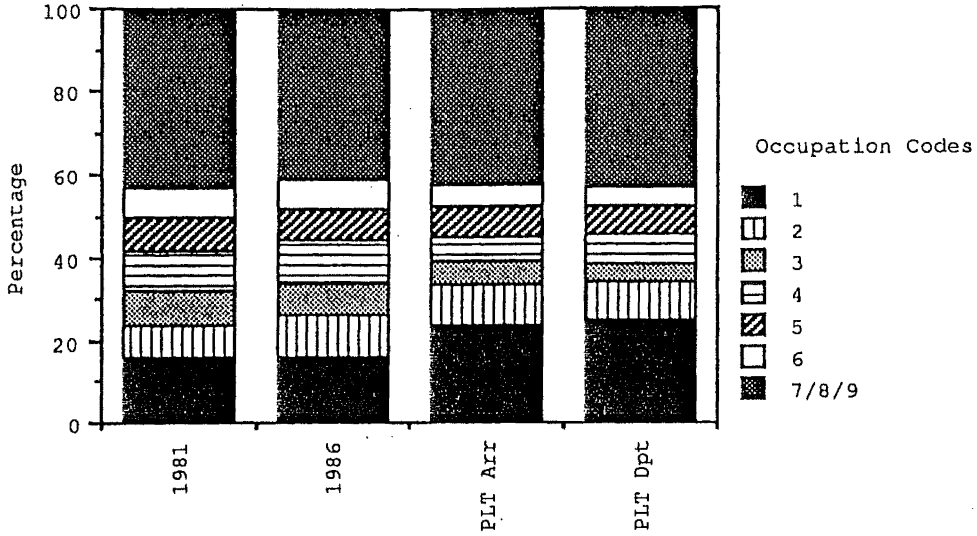
When the migrant Australia-born populations are compared with the residents it is evident that there are some marked differences in occupational structure (Figure 5.4).

Figure 5.4 highlights the differences between the migrant and resident populations. It can be seen that while there is some conformity between the two resident populations of 1981 and 1986 and between the two migrant populations arriving and departing for male and female Australia-born.

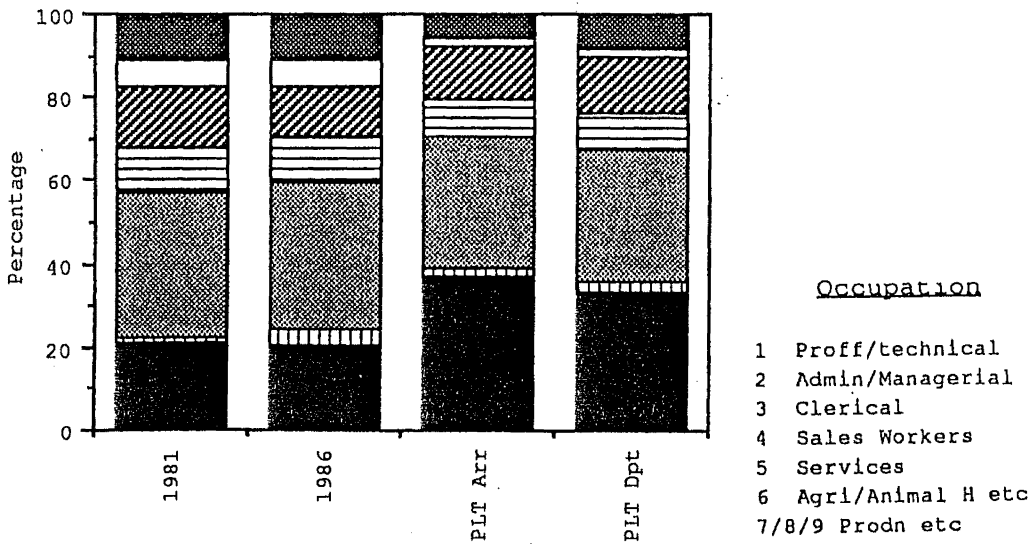
For the male Australia-born there are relatively large proportions of migrants stating a professional/technical occupation (1981 16.3 percent, 1986 16.1 percent, migrants about 25 percent), while smaller proportions of the migrant population than residents have clerical (1981 8 percent, 1986 8.2 percent, migrants about 5 percent), and agricultural occupations (1981 7.3 percent, 1986 6.6 percent, migrants about 4.5 percent). For the female Australia-born the greatest difference between residents and migrants lies in the very high proportion of migrants reporting professional or technical occupations compared to the residents (1981 21.2 percent, 1986 20.7 percent, migrants 35.5 percent). For the rest of these two profiles the proportions of those stating an occupation are very similar - large numbers of clerical workers, reasonable proportions of those stating an occupation of service, production, primary production or managerial and administrative work.

Figure 5:4. Occupation Codes of the Australia-born Residents and Migrants 1981-1986

Male Australia-born Residents and Migrants, 1981-1986



Female Australia-born Residents and Migrants, 1981-1986



CONCLUSION

This chapter has looked at the age-sex characteristics and occupation structure of the Australia-born and other New Zealand-resident populations enumerated in the 1981 and 1986 census. It has become apparent that many differences exist between not only the Australia-born and the New Zealand-born but also the Australia-born and other overseas-born birthgroups resident in New Zealand. An important aspect to consider is whether the trends noted in this chapter are new or part of a continuum of trends noted earlier (in Chapter 3).

The age structures and sex ratios of the Australia-born and New Zealand-born while being very close in character especially in relation to the other overseas-born could be an indication of the existence of an "internal" type of movement across the Tasman. If this is so then it could be expected that there would be large numbers of Australia-born migrants moving between Australia and New Zealand in proportion to the numbers of Australia-born New Zealand residents or net migration gains. This was shown to be the case in chapter 4 and is further supported by the relatively small effect of migration on the 1981 and 1986 Australia-born resident age-sex and occupational structures seen in Chapter 5. Although there are large numbers of permanent and long-term migrants arriving and departing who state an occupation, the net effect on the occupational composition of the resident population is very small and hard to distinguish from the effects of those Australia-born residents entering or already active within the New Zealand labour force.

Age-sex characteristics and occupation structure have been the focus for this study on the Australia-born in New Zealand partly because of the continuity of data in the census volumes over a reasonable period of time, and partly because these are two important features of migrants in terms of their impact on society and economy in the host country. The age-sex composition of a migrant population has been studied in the literature in order to pinpoint age-specific rates of migration and to suggest differences between various migrant typologies such as "internal" (low sex ratios) and "international" (characterised by high sex ratios) migration. In Chapters 3, 4 and 5 significant age-sex differences between the Australia-born and other overseas-born populations have emerged. In this respect the Australia-born residents and migrants are significantly more like the New Zealand-born residents than the other overseas-born.

CONCLUSION

This thesis has reviewed the migration to, and settlement in New Zealand of people born in Australia. Although the Australia-born comprised the second largest group of people born overseas in New Zealand in 1986, there have been few studies of the composition or growth of this population. The major objective of this research has been to establish characteristics of the Australia-born, both at present and through the 150 years of intensive interaction between Australia and New Zealand.

In this conclusion three specific aspects of the study are highlighted in order to illustrate some of the problems of analysing the movement of Australia-born to New Zealand. The first concerns the importance of an historical framework, the second relates to the trans-Tasman migration process, and the third concerns the availability and nature of data on birthplace in New Zealand.

The importance of an historical framework

Without recognition of the political, social and historical links between Australia and New Zealand, such as the Trans Tasman Travel Arrangement much of the context in which trans-Tasman movement takes place is meaningless. It is the long history of practically uninterrupted trans-Tasman flow that provides a basis for much of the present day movement through the existence of networks of business or social links. An historical background to the Australia-New Zealand relationship is necessary in order to appreciate

the varying perceptions of core-periphery interactions that can be related to the trans-Tasman flows.

During the early stages of pakeha settlement in New Zealand, up to and including the early twentieth century, white New Zealand was culturally dominated by links with the United Kingdom. Despite the large scale movements of people across the Tasman known to have been in existence around the turn of the century, most literature on New Zealand's international migration links focused on the United Kingdom until the late 1940s. Only scant attention was paid by academics to the Australia-born (McBean, 1946). However as New Zealand developed a national identity and government policy began to take greater account of the country's location in the South Pacific, the external relationships changed and Australia has come to play a much more important role in political and economic policy in New Zealand. This close relationship is recognised in the idea of CER and is reflected in the special characteristics of the Australia-born population now resident in New Zealand.

The Australia-born population has been shown to deviate markedly from the other overseas-born population in New Zealand for a very long time. It has always had a lower ratio of males to females than the total migrant population and, especially since the 1960s, it has become a much younger population than the overseas-born in general. The recent immigrants differ in age composition and occupation from their resident Australia-born counterparts, but the trans-Tasman migrants are also different to the total overseas-born. Return migration of New Zealanders is having an important impact on the Australia-born population in New

Zealand; many of those coming home are accompanied by children born in Australia. The freedom of movement across the Tasman facilitates family migration; indeed it is more like a form of internal migration rather than the typically regulated flows of international migration.

The Migration Process

While there is evidence to support the idea that the trans-Tasman movement of the Australia-born is part of an "internal" rather than an "international" flow as discussed in Chapters Two and Three, this categorisation of migration can be misleading.

In many parts of the world the "internal/international" categories no longer seem to fit. Two additional examples of international movement (i.e. the crossing of national borders) that could be better conceptualised as internal movement (i.e. migration within a distinct geographical unit) can be cited: the movement of Pacific Islanders from Cook Islands, Nuie and Tokelaus to New Zealand and the population movement within the European Community. It is perhaps better to play down the assumed internal/international dichotomy and instead evaluate levels of migrant risk in movement of different types, looking more closely at the idea of a sort of continuum in the scale of migration (Pryor, 1978). However, while internal/international migration classifications can distort the element of risk undertaken by a migrant there are not many broad frameworks that encompass both movement within and between states.

Data Limitations

While the focus of any study of population movement

can be influenced by the theories/methodologies used, the availability of appropriate data is of vital significance. As few data sources are ever trouble-free (particularly over long periods of time) care must be taken when using statistical information to be fully aware of possible shortcomings. Three of the data problems encountered in this thesis were;

- (i) problems with definitions,
- (ii) changes to statistical data, and
- (iii) problems of integrating the census and migrant data.

Problems with definitions

Several problems exist regarding international migration statistics. Different categories of migrant give different information on their residential intentions on arrival in, or departure from New Zealand. New Zealand residents give information on their stays overseas, while non-residents provide data on their visit to New Zealand. This may create confusion when analysing patterns of trans-Tasman movement (Bedford, 1987).

Another problem of definition is the identification of migrant universes. It is common to focus on permanent and long-term (PLT) statistics when studying international migration, but these can give a misleading impression of net gains or losses to the New Zealand resident population because of the problem of category jumping. As Gould (1984) has argued it is better to use figures for total arrivals and departures when analysing the effect of international movement on population change.

Changes to Statistical Data

Changes in the content of statistical data should be expected when analysing a population subgroup for any significant period of time. The New Zealand Census Volumes are no exception. An important change in the definition of population universes in the 1976 and 1981 censuses makes it hard to relate data on the Australia-born in 1986 to information collected before 1981. The emphasis has moved from a defacto population base to a New Zealand resident base, which excludes short-term visitors. As visitors comprise a large component of the trans-Tasman flow this change has a significant impact on the size and composition of the Australia-born population in New Zealand.

Problems of integrating the census and migration data

In a study of international movement, it is desirable to link census information with data concerning migrants obtained from arrival and departure cards (Bedford, 1988). In this way cross-sectional data and longitudinal data may be used to illustrate a very dynamic process. In New Zealand the migration and census statistics can be related for some population subgroups using the variable of birthplace to define migrant universes. This approach has been utilised in this thesis with particular reference to changes in the Australia-born population between 1981 and 1986.

Similar studies of migrant populations link census and international migration data which will not be possible in the future because of changes made in 1987 to the content of arrival and departure cards. The question on birthplace was removed at the same time as new immigration legislation

was introduced. This is a very unfortunate development, creating particular problems regarding the analysis of specific groups, such as the Australia-born within the New Zealand population.

Future Research Priorities

This thesis has explored characteristics of one of the populations which is a product of trans-Tasman migration. There is scope for a similar kind of study of the New Zealand-born in Australia.

Comment on characteristics of the New Zealand-born in Australia is common in the media, but there have been no comprehensive studies of this population subgroup. A comparative analysis of the Australia-born in New Zealand and the New Zealand-born in Australia would increase our understanding of the contribution of trans-Tasman migration to population change in the two countries.

This thesis has suggested that recent growth in the Australia-born population in New Zealand is a product of return migration of New Zealanders with children who have been born in Australia. There is scope for more intensive inquiry into this process, especially using the 1986 census data on the population which was resident overseas five years before the census. These data have never been utilised extensively in migration research in New Zealand. The flexible user-request system for special census tables operated by the Department of Statistics makes these data much more accessible and useful for migration research.

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List of Appendices.

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- i Australia-born by country of last/next permanent residence, for the year ending 31 March, 1984.
 - ii The Australia-born, New Zealand-born and Total overseas-born, 1867-1986 (total population).
 - iii Comparison of Total and Resident Australia-born and Total population by Age Group, 1976 and 1981.
 - iv New Zealand-born, Australia-born and other overseas-born (total population) by Age Group for the census years 1961, 1966, 1971, 1976, 1981.
 - v Duration of Residence, 1961-1976 for the Australia-born, New Zealand-born and other overseas-born, males and females separate.
 - vi Statistical Area of Residence, for the Total Australia-born, New Zealand-born and other overseas-born, 1961 and 1976.
 - vii Index of Dissimilarity for Appendix vii.
 - viii The Industry Division of the male and female Total Australia-born, New Zealand-born and other overseas-born, 1961, 1971 and Residents 1981.
 - ix Australia-born, New Zealand-born, and other overseas-born, 1981 and 1986 Residents, and Australia-born Arrivals and Departures, 1981-1986, in 4 Age Groups.
 - x Index of Dissimilarity for Appendix ix.
 - xi Australia-born aged 5 years and over, by place of Usual Residence 5 years ago.
 - xii Occupation codes of the Australia-born Residents and Migrants (PLT), New Zealand-born, and other overseas-born, 1981-1986.
-

Glossary

A/Aus/Austr Australia-born
Res. Resident
Oseas Overseas-born
Not Def not defined

Statistical Areas

- 1 Northland
- 2 Central Auckland (Cntrl Auck.)
- 3 South Auckland/Bay of Plenty (Sth A/B of Pl)
- 4 East Coast
- 5 Hawke's Bay
- 6 Taranaki
- 7 Wellington
- 8 Marlborough
- 9 Nelson
- 10 Westland
- 11 Canterbury
- 12 Otago
- 13 Southland

Migrant Categories

PLT res Permanent and long-term resident
PLT non res Permanent and long-term non-resident
S/T res Short-term resident
S/T non res Short-term non-resident
Arr Arrivals
Dpt Departures

Industry Division

- 1 Agriculture, Hunting, Forestry and Fishing
- 2 Mining and Quarrying
- 3 Manufacturing
- 4 Electricity, Gas and Water
- 5 Building and Construction
- 6 Wholesale and Retail trade, Restaurants and Hotels
- 7 Transport, Storage and Communication
- 8 Community, Social and Personal Services.

Occupation Codes

- 1 Professional/Technical and related workers
 - 2 Administrative/Managerial workers
 - 3 Clerical and related workers
 - 4 Sales workers
 - 5 Service workers
 - 6 Agricultural, Animal Husbandry, Forestry workers, Fishermen and Hunters
 - 7/8/9 Production and related workers, Transport Equipment Operators and Labourers.
-

App i. Australia-born by Country of Last/Next Permanent Residence, Year ending 31 march, 1984.

Country	Arrivals from	Departures to
Australia	137 541	134 301
Canada	392	369
England	292	305
Fiji	199	175
Hong Kong	189	153
New Zealand	12 524	12 909
Papua New Guinea	557	492
Singapore	153	123
United Kingdom (excl Eng)	146	160
United States of America	954	1045
not stated/others	2713	4562
Total	155 660	154 594

Source: Unpublished tables, Department of Statistics, Migration Section, Dunedin.

App ii. The Australia-born, New Zealand-born and total overseas-born 1867-1986 (total population).

Year	Australia-born			New Zealand-born			overseas-born		
	male	female	total	male	female	total	male	female	total
1867	6048	5265	11313	32397	31655	64053	99532	55084	154616
1871	6530	5896	12426	47049	46425	93474	103307	59612	162919
1874	7018	6583	13601	61779	60856	122635	109202	67677	176879
1878	8270	7821	16091	87787	86339	174126	143211	97075	240286
1881	8788	8489	17277	136772	130729	267501	156600	10996	265696
1886	8502	8743	17245	173353	168806	342159	160110	116153	276263
1891	7677	8266	15943	206462	202247	408709	148616	110309	258925
1986	10786	10845	21631	242758	238757	481515	149923	111172	261095
1901	14233	12758	26991	280940	278309	559249	147862	108309	256171
1901	27472	19784	47256	329514	324464	653978	166716	115143	281859
1911	28185	22508	50693	378662	373961	752623	179255	125655	304910
1916	23643	21942	45585	408349	435566	843915	168549	135153	303702
1921	25566	22479	48045	477059	481975	952034	173720	138257	311977
1926	no data given			526267	528699	1094966	179367	144588	323953
1936	21793	20216	42009	639398	640519	1279917	158587	133246	291833
1945	18580	18209	36789	702988	753079	1456067	129299	115884	245183
1951	17818	18010	35828	831730	841232	1672962	141478	123764	265242
1956	17444	18472	35916	927507	935837	1863344	165085	144462	309547
1961	16560	18852	35412	1033473	1041036	2074509	178758	159915	228673
1966	20033	23341	43374	1136238	1143756	2279994	206382	188561	394943
1971	19762	24322	44084	1215868	1228301	2444169	211991	199965	411956
1976	28072	33079	61151	1296498	1313151	2609649	259454	248671	508125
1981	24315	28299	52614	1327779	1354386	2682162	243852	235725	479577
1986	25329	29046	54375	1365210	1399059	2764269	273147	269670	542817

Source:

Department of Statistics (various years): The New Zealand Population Census of Population and Dwellings (Volume on Birthplace). Wellington.

App iii. Comparison of Total and Resident Australia-born and Total population by age group, 1976 and 1981.

1976

Age Group	Total A	Res. A	R/T*100	Total Popn	Res. Popn	R/T*100
0-4	3792	3457	91.2	296105	295456	99.8
5-9	4418	4247	96.1	311773	311368	99.9
10-14	305	2902	96.6	320327	319963	99.9
15-19	3541	2835	80.1	300737	299029	99.4
20-24	6706	5226	77.9	259575	256233	98.7
25-29	6081	5368	88.3	249140	246632	99.0
30-34	5103	4641	91.0	199498	197806	99.2
35-44	6952	6206	89.2	329728	327201	99.2
45-54	6699	4865	72.6	264414	259569	98.2
55-64	6372	3755	82.9	279507	275201	98.5
65+	8482	7032	82.9	279507	275201	98.5

1981

Age Group	Total A	Res. A	R/T*100	Total Popn	Res. Popn	R/T*100
0-4	2154	1812	84.1	252636	251700	99.6
5-9	3933	3795	96.5	290070	28955	99.9
10-14	3741	3096	82.8	305874	305352	99.8
15-19	2817	2505	88.9	307920	306633	99.6
20-24	3822	3036	79.4	273321	269640	98.7
25-29	4491	2951	87.3	241932	238455	98.6
30-34	4420	4044	90.5	240057	237561	99.0
35-44	7458	6696	89.8	363702	360396	99.1
45-54	6090	4671	76.7	395232	301440	98.8
55-64	5658	3459	61.1	278799	272787	97.8
65+	7971	6240	78.4	316194	309795	98.0

Source:

Table 8. Birthplaces of Population by Age Group. New Zealand Census of Population and Dwellings, 1976. Volume 7, Birthplaces and Ethnic Origin. Department of Statistics, Wellington. 1980

Table 5. Population by Birthplace and Sex. New Zealand Census of Population and Dwellings, 1976. Volume 7, Birthplaces and Ethnic Origin. Department of Statistics, Wellington. 1980.

Table 9. Total Population, Birthplaces by Age Groups. New Zealand Census of Population and Dwellings, 1981. Volume 7, Birthplaces and Ethnic Origin. Department of Statistics, Wellington. 1983.

Table 9. Total Population, Birthplace by Age Groups. New Zealand Census of Population and Dwellings, 1981. Volume 7, Birthplaces and Ethnic Origin. Department of Statistics, Wellington. 1983.

App iv. New Zealand-born, Australian-born, and other overseas-born New Zealand residents (total) by age group for the census years 1961, 1966, 1971, 1976, 1981.

New Zealand-born:
males.

Age Group	1961	1966	1971	1976	1981
0-14	394008	427593	444287	442455	408582
%0-14	38	37.6	36.5	34.2	30.7
15-34	282087	324543	370634	424922	463824
%15-34	27.3	28.6	30.5	32.8	35
35-64	298184	320462	329443	340436	357402
%35-64	28.0	28.2	27.3	26.5	26.9
65+	59144	63640	71504	83685	97971
%65+	5.9	5.6	5.7	6.5	7.4

females.

Age Group	1961	1966	1971	1976	1981
0-14	377199	408681	426381	424442	392343
%0-14	36.2	35.7	34.7	32.3	29
15-34	247793	317099	362363	419913	455238
%15-34	26.7	27.7	29.8	31.9	33.6
35-64	305124	329053	340111	353466	370470
%35-64	29.3	28.8	27.4	26.9	27.3
65+	80920	88923	99446	115330	136332
%65+	7.8	7.8	8.1	8.8	10.1

Australia-born:
males.

Age Group	1961	1966	1971	1976	1981
0-14	1298	2454	3187	5793	5055
%0-14	7.8	12.3	16.1	20.5	20.9
15-34	3457	6056	5864	9445	7041
%15-34	20.9	30.2	29.7	33.7	28.8
35-64	7115	7351	7104	9420	9009
%35-64	45	36.7	36	33.6	37.1
65	4690	4172	3609	3414	3204
%65	28.3	20.8	18.2	12.2	13.2

females.

Age Group	1961	1966	1971	1976	1981
0-14	1234	2303	2912	5422	4773
%0-14	6.6	9.8	12.1	16.5	16.9
15-34	4599	7710	8194	11986	8557
%15-34	24.3	33.1	33.5	33.2	30.2
35-64	4599	7929	8087	10603	10197
%35-64	40.5	34.0	33.3	32.0	36.0
65+	5383	5398	5129	5068	4767
%65+	28.6	23.1	21.1	18.3	16.9

Other overseas-born:
males.

Age Group	1961	1966	1971	1976	1981
0-14	12945	16221	17038	25654	19572
%0-14	7.9	8.6	8.7	10.9	8.7
15-34	45296	53538	54868	74851	66909
%15-34	27.9	28.6	28.2	27.9	29.4
35-64	77456	90129	94582	113572	107944
%35-64	47.4	48.1	48.4	47.8	47.6
65+	27368	27545	28738	31893	32391
%65+	16.8	14.7	14.7	13.4	14.3

females.

Age Group	1961	1966	1971	1976	1981
0-14	12258	12647	15818	24199	18255
%0-14	8.7	9.1	8.8	11	8.5
15-34	32672	43675	47827	47199	61668
%15-34	23.0	26.4	29.7	29.7	28.8
35-64	65916	73842	79764	91238	92688
%35-64	46.5	44.4	44.5	41.2	43.3
65+	30874	33415	35743	40117	41526
%65+	21.8	20.1	19.9	18.1	19.4

Source:

Table 7. Birthplaces by Age of Persons. New Zealand Population Census 1961, Volume 6. Birthplaces and Duration of Residence of Persons Born Overseas. Department of Statistics, Wellington. 1964.

Table 13. Birthplace of Population, by Age Groups. New Zealand Census of Population and Dwellings 1966, Volume 6. Education and Birthplace. Department of Statistics, Wellington. 1969.

Table 8. Birthplaces of Population by Age Group. New Zealand Census of Population and Dwellings 1971, Volume 7. Birthplace and Ethnic Origin. Department of Statistics, Wellington. 1975.

Table 5. Population by Birthplace and Sex. New Zealand Census of Population and Dwellings 1976, Volume 7. Birthplaces and Ethnic Origin. Department of Statistics, Wellington. 1980.

App v. Duration of Residence, 1961 - 1976 for Australia-born males and females, and other overseas-born males and females.

1961				
Period	Aus. male	Oseas male	Aus. female	Oseas female
less1	7.4	6.3	9.7	4.5
1-4	10.9	16.2	11.3	16.5
5-9	9.1	21.0	9.3	19.3
10-19	8.5	15.8	8.6	15.5
20-29	10.2	3.9	9.1	3.5
30-49	20.7	26.1	20.4	29.3
50+	31.2	10.1	29.6	9.9
1966				
less1	15.2	8.2	17.6	6.4
1-4	20.0	17.1	17.9	17.9
5-9	9.6	14.7	9.1	15.3
10-19	10.8	28.5	11.0	25.4
20-29	7.2	3.7	6.6	4.6
30-49	14.0	16.6	13.0	18.2
50+	21.6	9.4	22.5	10.6
1971				
less1	16.7	7.3	18.4	6.2
1-4	16.6	13.3	16.3	13.4
5-9	15.1	15.9	13.4	16.7
10-19	13.8	28.0	12.9	26.7
20-29	5.5	11.3	6.0	10.2
30-49	13.2	12.32	12.0	12.3
50+	17.0	8.6	18.8	11.0
1976				
less1	25.4	7.3	25.6	6.8
1-4	24.1	20.9	22.1	20.6
5-9	10.5	11.4	11.0	11.5
10-19	14.7	22.5	14.0	23.1
20-29	6.0	19.5	6.5	16.8
30-49	7.6	5.2	7.4	6.0
50+	9.7	9.1	11.6	11.0

Source:

Table 12. Persons Born Overseas, Duration of Residence by Birthplaces, 1961. New Zealand Census 1961. Volume 6. Birthplaces and Duration of Residence of Persons born Overseas. Department of Statistics, Wellington. 1964

Table 17. Duration of Residence by Birthplace. New Zealand Census of Population and Dwellings. 1966. Education and Birthplace. Department of Statistics, Wellington. 1969.

Table 12. Duration of Residence by Birthplace. New Zealand Census of Population and Dwellings, 1971. Volume 7. Birthplaces and Ethnic Origin. Department of Statistics, Wellington. 1975.

Table 13. Duration of Residence by Birthplace of Persons Born Overseas. New Zealand Census of Population and Dwellings. 1976, Volume 7. Birthplaces and Ethnic Origin. Department of Statistics, Wellington. 1980.

App vi. Statistical Area of Residence, Total Australia-born, New Zealand-born, and other overseas-born; 1961 and 1976.

Statistical Area	NZ-born	Aus-born	Overseas-born
Northland(86391)	79356 91.9%	846 1.0%	6189 7.1%
Cntrl Auck.(514507)	408276 79.4%	11299 2.2%	94932 18.4%
Sth A/B of Pl(349624)	308949 88.4%	4286 1.2%	36389 10.4%
East Coast(46478)	42479 91.4%	498 1.1%	3501 7.5%
Hawkes Bay(114470)	101257 88.4%	1236 1.1%	11977 10.5%
Taranaki(99774)	90862 91.1%	903 0.9%	8009 8.0%
Wellington(473541)	393316 83.0%	7939 1.7%	72286 15.3%
Marlborough(27748)	25130 90.6%	253 0.9%	2365 8.5%
Nelson(62969)	55686 88.4%	834 1.3%	6449 10.2%
Westland(24841)	25590 90.9%	298 1.2%	1953 7.9%
Canterbury(344597)	302506 87.8%	4232 1.2%	37859 11.0%
Otago(176325)	157201 89.2%	1997 1.1%	17127 9.7%
Southland(93721)	86901 92.7%	791 0.8%	6029 6.4%
Total(2414984)	2074509 85.9%	35412 1.5%	305063 12.6%

1976.

Statistical Area	NZ-born	Aus-born	Overseas-born
Northland(107013)	93719 87.6%	1897 1.9%	11307 10.6%
Cntrl Auck.(797406)	696411 87.3%	19621 2.5%	81374 10.2%
Sth A/B of Pl(472083)	410440 86.9%	8166 1.7%	53477 11.3%
East Coast(48597)	43989 90.5%	555 1.1%	4053 8.3%
Hawkes Bay(145061)	127905 88.2%	1859 1.3%	15297 10.5%
Taranaki(107071)	96295 90.0%	1442 1.3%	9334 8.7%
Wellington(591612)	483685 81.8%	10615 1.8%	97312 1.6%
Marlborough(35030)	31438 89.7%	596 1.7%	2996 8.6%
Nelson(75562)	64976 86.0%	1690 2.2%	8896 11.8%
Westland(24049)	21371 88.9%	851 3.5%	1827 7.6%
Canterbury(428586)	368805 8.6%	7617 1.8%	52164 12.2%
Otago(188903)	164769 87.2%	4111 2.2%	20023 10.6%
Southland(108860)	99565 91.5%	2041 1.9%	7254 6.7%
Total(3129383)	2609649 83.4%	61151 2.0%	458583 14.7%

Source:

Table 5. Birthplaces by present residence in Statistical Areas. New Zealand Population Census, 1961. Birthplaces and Duration of persons born overseas. Department of Statistics, Wellington 1964.

Table 6. Birthplaces by present residence in Statistical Areas. New Zealand Census of Population and Dwellings, 1976. Volume 7, Birthplaces and Ethnic Origin. Department of Statistics, Wellington. 1980.

App via. The Percentage of each Birthgroup Resident in each Statistical Area.

Area	1961			1976		
	Aus-born	NZ-born	o'seas-born	Aus-born	NZ-born	o'seas-born
Northland	2.39	3.83	2.03	3.10	3.59	2.47
Central Auck.	31.91	19.68	31.12	32.09	26.69	17.75
Sth A/B of Pl	12.10	14.89	11.93	13.35	15.73	11.66
East Coast	1.41	2.05	1.15	0.91	1.69	0.88
Hawke's Bay	3.49	4.88	3.93	3.04	4.90	3.34
Taranaki	2.55	4.38	2.63	2.36	3.69	2.04
Wellington	22.42	18.96	23.69	17.36	18.53	21.22
Marlborough	0.71	1.21	0.77	0.97	1.20	0.65
Nelson	2.36	2.68	2.11	2.76	2.49	1.94
Westland	0.84	1.23	0.64	1.39	0.82	0.40
Canterbury	11.95	14.58	12.41	12.46	14.13	11.38
Otago	5.64	7.80	5.61	6.72	6.31	4.37
Southland	2.23	4.19	1.98	3.34	3.82	1.58

App.vii. Index of Dissimilarity calculated for Australia-born compared to a) New Zealand-born and b) other overseas-born; 1961 and 1976.

1961

Statistical Area	Aus-b	NZ-b	Difference	Oseas-b	Difference
Northland	2.39	3.83	1.44	2.03	0.36
Cntrl Auck.	31.91	19.68	12.23	31.12	0.79
Sth A/B of Pl	12.10	14.89	2.79	11.93	0.17
East Coast	1.41	2.05	0.64	1.15	0.26
Hawke's Bay	3.49	4.88	1.39	3.93	0.44
Taranaki	2.55	4.38	1.39	3.93	0.44
Wellington	22.42	18.96	3.46	23.70	1.28
Marlborough	0.71	1.21	0.50	0.78	0.07
Nelson	2.36	2.68	0.32	2.11	0.25
Westland	0.84	1.09	0.25	0.64	0.20
Canterbury	11.95	14.58	2.63	12.41	0.46
Otago	5.64	7.58	1.94	5.61	0.03
Southland	2.23	4.19	1.96	1.98	0.25
Total			31.38		4.64
Index			15.69		2.32

1976

Statistical Area	Aus-b	NZ-b	Difference	Oseas-b	Difference
Northland	3.25	3.60	0.35	2.47	0.78
Cntrl Auck.	32.09	26.69	5.40	17.74	14.35
Sth A/B of Pl	13.35	15.73	2.38	11.66	1.69
East Coast	0.91	1.69	0.78	0.88	0.03
Hawke's Bay	3.04	4.90	1.86	3.34	0.30
Taranaki	2.36	3.69	1.33	2.04	0.32
Wellington	17.36	18.50	1.14	21.22	3.86
Marlborough	0.97	1.20	0.23	0.65	0.32
Nelson	2.76	2.49	0.27	1.94	0.82
Westland	1.39	0.82	0.57	0.40	0.99
Canterbury	12.46	14.13	1.67	11.38	1.08
Otago	6.72	14.13	7.41	4.37	2.35
Southland	3.34	3.82	0.48	1.58	1.76
Total			23.87		28.65
Index			11.94		14.33

Sources: as appendix vi.

females
1961

Industry Division	Austr-born	NZ-born	Diff	O'seas-born	Diff
Agri/Hunt/For/Fish	3.98	4.78	0.80	2.26	1.54
Mining/Quarrying	0.02	0.06	0.04	0.03	0.01
Manufacturing	21.83	18.26	3.57	42.02	20.19
Elec/Gas/Water	0.18	0.37	0.19	0.32	0.14
Build/Constr	0.71	0.78	0.07	0.75	0.04
Whole/Retail/Trade	18.82	21.21	2.39	16.64	2.18
Transp/Stor/Comm	3.11	5.37	2.26	3.22	0.11
Community/Soc/Pers	50.50	44.80	5.7	34.39	16.11
Not def	0.85	0.45	0.40	0.36	0.49
Index			7.71		20.41

1971

Industry Division	Austr-born	NZ-born	Diff	O'seas-born	Diff
Agri/Hunt/For/Fish	6.37	5.86	0.51	3.36	3.01
Mining/Quarrying	0.11	0.05	0.06	0.04	0.07
Manufacturing	18.69	20.99	2.30	28.50	9.81
Elec/Gas/Water	0.34	0.34	0.00	0.38	0.04
Build/Constr	1.03	0.9	0.13	0.91	0.12
Whole/Retail/Trade	29.21	24.45	4.76	22.82	6.39
Transp/Stor/Comm	4.43	5.61	1.18	5.02	0.59
Community/Soc/Pers	36.20	40.25	4.05	37.51	1.31
Not def	3.89	1.54	2.33	1.42	2.47
Index			7.67		11.91

1981 (residents)

Industry Division	Austr-born	NZ-born	Diff	O'seas-born	Diff
Agri/Hunt/For/Fish	6.30	7.57	1.27	4.00	2.30
Mining/Quarrying	0.04	0.08	0.04	0.05	0.01
Manufacturing	16.17	17.73	1.54	24.47	8.30
Elec/Gas/Water	0.21	0.28	0.07	0.33	0.12
Build/Constr	1.04	1.00	0.04	0.84	0.20
Whole/Retail/Trade	23.41	21.50	1.91	19.26	4.15
Transp/Stor/Comm	4.47	5.86	1.39	4.77	0.30
Community/Soc/Pers	45.03	42.11	2.92	41.97	3.06
Not def	3.3	3.87	0.57	4.30	1.00
Index			4.88		9.71

The index is obtained by summing all the difference values for any column (these ignore +ve or -ve differences), and dividing by 2.

Source:

Table 9. Selected Countries of Birth, Analysed by Major Industry Groups. New Zealand Population Census 1961. Volume 6. Birthplaces and Duration of Residence of Persons Born Overseas. Department of Statistics, Wellington. 1964.

App viii. The Industrial Divisions of the male and female Australia-born, New Zealand-born and other overseas-born; 1961, 1971 and 1981, (Total Population 1961, 1971; resident 1981).

males
1961

Industry Division	Austr-born	NZ-born	Diff	O'seas-born	Diff
Agri/Hunt/For/Fish	8.29	19.86	11.57	5.53	2.76
Mining/Quarrying	0.94	1.06	0.12	0.63	0.31
Manufacturing	30.12	24.39	5.73	18.06	12.06
Elec/Gas/Water	1.70	12.41	0.12	1.23	0.47
Build/Constr	12.36	12.41	0.05	8.24	4.12
Whole/Retail/Trade	14.92	14.15	0.77	8.97	5.95
Transp/Stor/Comm	10.20	11.09	0.89	8.60	1.60
Community/Soc/Pers	20.93	15.09	5.84	48.46	27.53
Not def	0.54	0.37	0.17	0.26	0.28
Index			12.63		27.54

1971

Industry Division	Austr-born	NZ-born	Diff	O'seas-born	Diff
Agri/Hunt/For/Fish	8.06	18.18	10.12	13.15	5.09
Mining/Quarrying	0.66	0.89	0.23	0.62	0.04
Manufacturing	33.30	26.51	6.79	31.97	1.33
Elec/Gas/Water	1.57	1.59	0.02	2.53	0.96
Build/Constr	13.22	12.34	0.12	12.20	1.02
Whole/Retail/Trade	12.72	13.31	0.59	10.00	2.72
Transp/Stor/Comm	9.40	10.79	1.39	11.77	2.37
Community/Soc/Pers	19.42	15.91	3.51	17.76	1.66
Not def	1.65	0.48	1.17	0.64	1.01
Index			11.97		8.1

1981 (residents)

Industry Division	Austr-born	NZ-born	Diff	O'seas-born	Diff
Agri/Hunt/For/Fish	6.41	14.52	8.11	5.20	1.21
Mining/Quarrying	0.51	0.53	0.02	0.30	0.21
Manufacturing	28.13	24.22	3.91	32.77	4.64
Elec/Gas/Water	1.48	1.54	0.06	1.77	0.29
Build/Constr	8.55	9.52	0.97	8.13	0.42
Whole/Retail/Trade	16.39	14.14	2.25	12.62	3.77
Transp/Stor/Comm	8.22	9.34	1.12	9.52	1.30
Community/Soc/Pers	27.67	23.29	4.48	25.42	2.25
Not Def	2.65	2.99	0.34	4.26	1.61
Index			10.63		7.85

Table 9. Population Analysed by Industry Major Groups According to Selected Birthplaces. New Zealand Census of Population and Dwellings 1971. Volume 7. Birthplaces and Ethnic Origin. Department of Statistics, Wellington. 1975.

Table 13. Usually Resident Full-Time Labour Force 15 Years and Over, Birthplace by Industry Division. New Zealand Census of Population and Dwellings 1981. Volume 7. Birthplaces and Ethnic Origin. Department of Statistics, Wellington. 1983.

App ix. Australia-born, New Zealand-born and other overseas-born, 1981-1986 Residents, and Australia-born Total Arrivals and Departures 1981-1986. (4 age groups).

Population	0-14Years	15-34Years	35-64Years	65+Years
<hr/>				
Aus-born 1981.				
male	4746	6000	7026	2451
%male	23.5	29.7	34.7	12.1
female	4479	7506	7800	3795
%female	19.0	31.8	33.1	16.1
sex ratio (85.8)	106.0	79.9	90.1	64.6
<hr/>				
Australia-born Arrivals 1981-1986.				
male	67504	154580	197745	27159
%male	15.1	34.6	44.2	6.1
female	65110	148270	169565	27798
%female	19.0	31.8	33.1	16.1
sex ratio (108.6)	103.7	104.3	116.6	97.7
<hr/>				
Australia-born Departures 1981-1986.				
male	65660	154154	187950	36931
%male	14.7	34.7	42.3	8.3
female	62673	148465	160411	38103
%female	15.3	36.2	39.2	9.3
sex ratio (108.6)	104.8	103.8	117.2	96.9
<hr/>				
Australia-born 1986.				
male	5586	6216	7671	2337
%male	25.6	28.5	35.2	10.7
female	5343	7431	8943	3684
%female	21.0	29.3	35.2	14.5
sex ratio (85.9)	104.5	83.6	85.8	63.4
<hr/>				

New Zealand-born 1981.				
male	408372	463164	356997	97875
%male	30.8	34.9	26.9	7.4
female	392115	454329	369987	136221
%female	29.0	33.6	27.3	10.1
sex ratio (98.1)	104.1	101.9	96.5	71.9

New Zealand-born 1986.				
male	382671	480483	392319	107430
%male	28.1	35.2	28.8	7.9
female	366564	474471	369987	136221
%female	26.2	34.0	28.9	10.9
sex ratio (97.6)	104.4	101.3	97.2	70.8

other overseas-born 1981.				
male	19095	62373	103959	30495
%male	8.8	28.9	48.2	14.1
female	16800	63393	101343	43416
%female	8.7	28.8	43.4	19.1
sex ratio (105.6)	107.3	101.1	114.9	77.0

other overseas-born 1986.				
male	18024	64070	116431	33429
%male	7.8	27.6	50.2	14.4
female	16800	63393	101343	43416
%female	7.5	28.2	45.0	19.3
sex ratio (103.1)	107.3	101.1	114.9	77.0

Source:

Table 10. Usually Resident Population, Birthplace by Age Groups. New Zealand Census of Population and Dwellings 1981. Volume 7. Birthplace and Ethnic Origin. Department of Statistics, Wellington. 1983.

Table 4. Usually Resident Population, Birthplace by Age groups and Sex. New Zealand Census of Population and Dwellings. Birthplace and Ethnic Origin, Series C Report 6. Department of Statistics, Wellington, 1988.

Unpublished Tables, Department of Statistics, Migration Section, Dunedin.

App x. Index of Dissimilarity of Australia-born Residents (1981)
 compared with Migrant Groups (1981-1986).
 males

Population Group	0-14Years	15-34Years	35-64Years	65+Years
Australian-born res	23.46	29.66	34.73	12.12
Total Arrivals	15.25	35.29	43.46	6.00
<i>index (14.35)</i>	8.21	5.63	8.73	6.12
Total Departures	14.79	35.21	43.76	6.23
<i>index (14.57)</i>	8.67	5.55	9.03	5.89
PLT res Arrivals	36.28	38.77	23.06	1.89
<i>index (21.92)</i>	12.82	9.11	11.67	10.23
PLT res Departures	25.91	45.77	26.71	1.61
<i>index (18.55)</i>	2.45	16.11	8.02	10.51
S/T res Arrivals	12.3	24.7	55.66	7.33
<i>index (20.92)</i>	11.16	4.96	20.93	4.79
S/T res Departures	12.15	25.97	53.95	7.04
<i>index (19.65)</i>	11.31	3.69	19.22	5.08
PLT non res Arr	46.65	38.62	13.84	0.89
<i>index (32.14)</i>	23.19	8.96	20.89	11.23
PLT non res Dpt	23.77	53.23	21.58	1.32
<i>index (23.91)</i>	0.31	23.56	13.15	10.8
S/T non res Arr	14.61	35.22	44.07	6.10
<i>index (14.89)</i>	8.85	5.56	9.34	6.02
S/T non res Dpt	14.74	35.1	43.90	6.26
<i>index (14.60)</i>	8.72	5.44	9.17	5.86

female

Australia-born res	18.99	31.83	33.07	16.09
Total Arrivals	16.38	36.59	38.10	8.94
<i>index (9.78)</i>	2.61	4.76	5.03	7.15
Total Departures	15.72	36.62	38.32	9.34
<i>index (10.03)</i>	3.27	4.79	5.25	6.75
PLT res Arrivals	32.66	43.46	22.23	1.65
<i>index (25.59)</i>	13.67	11.63	10.84	14.44
PLT res Departures	22.61	49.84	25.01	2.53
<i>index (21.63)</i>	3.62	18.01	8.06	13.56
S/T res Arrivals	10.00	30.91	49.31	9.77
<i>index (16.24)</i>	8.99	0.92	16.24	6.32
S/T res Departures	10.4	31.15	48.80	9.65
<i>index (15.72)</i>	8.59	0.68	15.73	6.44
PLT non res Arr	42.47	45.06	11.11	1.37
<i>index (36.70)</i>	23.48	13.23	21.96	14.72
PLT non res Dpt	23.94	56.85	17.46	1.75
<i>index (29.96)</i>	4.95	25.02	15.61	14.34
S/T non res Arr	15.77	36.39	38.45	9.38
<i>index (10.21)</i>	3.22	4.56	5.66	6.98
S/T non res Dpt	15.67	36.49	38.45	9.38
<i>index (10.04)</i>	3.32	4.66	5.38	6.71

Source:

same as Appendix x.

App xi. Australia-born aged 5 years and over, by place of usual residence 5 years ago.

Age Group	Australia		New Zealand		Other	
	male	female	male	female	male	female
5-9	1020	981	978	933	54	42
10-14	468	393	1056	1074	60	51
15-19	219	267	822	759	102	102
20-24	300	492	1140	1491	111	186
25-29	507	738	4389	4353	432	441
30-34	498	519	3330	2502	456	354
35-39	381	303	1611	1242	420	288
40-44	219	153	762	564	285	156
45-49	105	81	462	333	198	117
50-54	69	60	276	219	120	72
55-59	45	51	228	183	117	81
60-64	36	42	174	174	90	54
65-69	18	27	69	75	36	54
70-74	18	24	51	48	27	30
75-79	15	21	21	33	24	24
80 and over	6	24	24	24	12	27
Total	3930	4182	15384	14007	2541	2082
	(8109)		(29391)		(4623)	

Source:

Table 5. Population Resident Overseas 5 Years ago, by Age Groups and Sex. 1986 New Zealand Census of Population and Dwellings, Birthplace and Ethnic Origin, Series C Report 6. Department of Statistics, Wellington. 1988.

App xii. Occupations for the Australia-born, New Zealand-born and other overseas-born (1981, 1986) and the Australia-born PLT arrivals and departures (1981-1986).

1981 Australia-born residents				
Occupation code	male		female	
Professional/technical	1857	16.3	1476	21.2
Administrative/managerial	858	7.5	84	1.2
Clerical and related	912	8.0	2415	34.6
Sales workers	1116	9.8	780	11.2
Services	936	8.2	1023	14.7
Agri/Animal Husb/etc	831	7.3	435	6.2
Prod and rel/trnsp etc	4887	42.9	759	10.9
Total	11397		6972	
Australia-born resident 1986.				
Professional/technical	1734	16.1	1335	20.7
Administrative/managerial	1074	9.9	222	3.5
Clerical and related	882	8.2	2292	35.6
Sales workers	1104	10.2	696	10.8
Services	828	7.7	762	11.8
Agri/Animal Husb/etc	717	6.6	423	6.6
Prod and rel/trnsp etc	4455	41.3	708	11.0
Total	10794		6438	
1981-1986 Australia-born PLT arrivals				
Professional/technical	1065	24.0	1161	36.9
Administrative/managerial	417	9.4	64	2.0
Clerical and related	250	5.6	1004	31.9
Sales workers	254	5.7	268	8.5
Services	339	7.7	416	13.2
Agri/Animal Husb/etc	227	5.1	54	1.7
Prod and rel/trnsp etc	1881	42.4	179	5.7
Total	4433		3146	
1981-1986 Australia-born PLT departures				
Professional/technical	966	25.1	819	33.6
Administrative/managerial	337	8.8	56	2.3
Clerical and related	183	4.8	758	31.1
Sales workers	252	6.5	225	9.2
Services	287	7.5	328	13.5
Agri/Animal Husb/etc	162	4.2	45	1.9
Prod and rel/trnsp etc	1664	43.2	207	8.5
Total	3851		2438	
1981 New Zealand-born residents				
Professional/technical	78225	11.3	67362	18.6
Administrative/managerial	33198	4.8	2886	0.8
Clerical and related	53970	7.8	122379	33.8
Sales workers	62442	9.0	43422	12.0
Services	39240	5.7	45963	12.7
Agri/Animal Husb/etc	106863	15.5	26973	7.5
Prod and rel/trnsp etc	316995	45.9	52962	14.6
Total	690933		361947	

1986 New Zealand-born residents				
Professional/technical	84528	12.4	66279	18.4
Administrative/managerial	47487	6.9	8322	2.3
Clerical and related	52536	7.7	127404	35.3
Sales workers	61941	9.0	40347	11.2
Services	38733	5.7	41640	11.5
Agri/Animal Husb/etc	100944	14.8	27504	7.6
Prod and rel/trnsp etc	297942	43.5	49512	13.7
Total	684111		361008	
1981 other overseas-born residents				
Professional/technical	23037	16.4	12006	17.4
Administrative/managerial	8217	5.8	750	1.1
Clerical and related	12261	8.7	22827	33.2
Sales workers	11787	8.4	7554	11.0
Services	10131	7.2	9336	13.6
Agri/Animal Husb/etc	6397	4.5	2793	4.0
Prod and rel/trnsp etc	68778	48.9	13554	19.7
Total	140608		68820	
1986 other overseas-born residents				
Professional/technical	24330	17.6	12267	18.6
Administrative/managerial	11328	8.2	1833	2.8
Clerical and related	11220	8.1	21309	32.3
Sales workers	11268	8.2	6369	9.6
Services	10062	7.3	8514	12.9
Agri/Animal Husb/etc	7668	5.6	2778	4.2
Prod and rel/trnsp etc	62181	45.0	12957	19.6
Total	138057		66027	

Source:

Table 14. Usually Resident Full-Time Labour Force Aged 15 Years and Over, Birthplace by Occupation Minor Group. New Zealand Census of Population and Dwellings 1981, Volume 7 Birthplace and Ethnic Origin. Department of Statistics, Wellington. 1983.

Table 7. Population Resident in New Zealand Aged 15 Years and Over, Gainfully employed in Full-Time Labour Force. New Zealand Census of Population and Dwellings, Birthplace and Ethnic Origin, Series C Report 6. Department of Statistics, Wellington. 1988

Unpublished Tables. Department of Statistics, Migration Section, Dunedin.