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Nutrition Policy in Australia

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Australia a large island continent with a land area of 7.7 million square kilometres and a population which has just passed 18 million. Australia is a popular tourist destination and we receive 2.3 million visitors each year from overseas. About 3% of the population are Australian aboriginals, commonly referred to as ATSI, (Aboriginal and Torres Strait Islanders). Australia was first settled by Europeans 200 years ago and migration is still a major factor in population growth. About 25% of the population was born overseas. The past two decades have seen a major change in immigration policy and the majority of migrants now come from Asian countries. Ausralia now sees itself as an Asian country and is made up of six states, all part of the Commonwealth of Australia. In this federal structure the real power resides in Canberra, which provides in excess of 75% of government expenditure on health care. This gives the Commonwealth government almost complete control in developing programs and mandating quality assurance standards.

Despite its huge area and the image of the Australian outback portrayed in our films and television shows, Australia is one of the most highly urbanised countries, with about 70% of the population living in the five major cities scattered around our coast.

Fig. 1 show the demographic structure of Western Australia, both for the whole population and for the Aboriginal population.

Fig. 2 and Fig. 3 show the predominant situation of "lifestyle" diseases, of which the major aetiological fraction is nutrition. For this reason nutrition has received a prominent place in health promotion planning in Australia.

The Scientific basis of Nurrition Planing in Australia includes the following policy documents :

Recommended Dietary Intakes
Dietary Guidelines
Dietary Guidelines for Children
(Health Targets)

Initially most countries were concerned primarily with the prevention of dietary deficiencies and this lead to the development of RDI's and RDA's. "Recommended dietary Intakes(RDI's) are the levels of intakes of essential nutrients, considerd in the judgement of the National Health and Medical Research Council, on the basis of availble scientific knowledge to be adequate to meet the known nutritional needs of practically all healthy persons. The RDIs are derived from estimates of requirements for each age/sex category and incorporate generous factors to accommodate variations in absorption and metabolism. They therefore apply to group needs. RDIs are not synonymous with requirements".

In more recent decades diet has been recognised as a major cause of chronic disease in the developed world. In order to facilitate the conversion of nutrition research into community practices, many western countries have adopted dietary guidelines. These are often converted into more specific goals and targets. The movement began in the Scandinavian countries, spread to the United States and Australia and more recently the WHO has attempted to develop a more universally applicable set of guidelines. Australia developed its dietary guidelines in the early 1980's and they have been widely used in community education programs. The dietary guidelines have now been revised to ensure their accuracy and relevance.

The process of revision of the ADG's commenced by advertising in the national press for submissions and by writing to interested groups. Several hundred submissions were received with a wide range of opinions, reflecting the diversity of Australian Society.

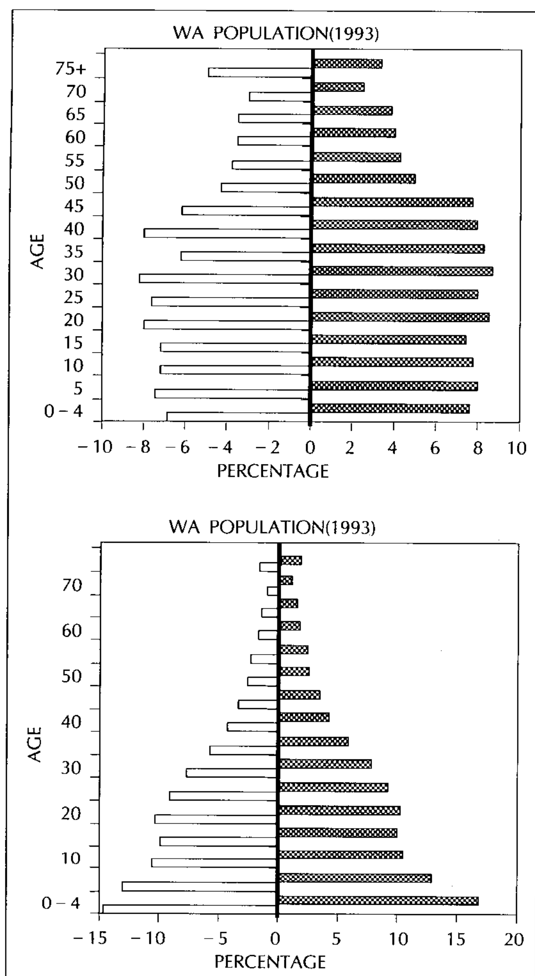

Fig. 1. Demographic structure of Western Australia.

Table 1. Life expectancy

Year	At Birth		At Age 65	
	Male	Female	Male	Female
1891-00	51	54.8	11.3	12.8
1901-10	55.2	58.8	11.3	12.9
1920-22	59.2	63.3	12	13.6
1946-48	66.1	70.6	12.3	14.4
1960-62	67.9	74.2	12.5	15.7
1980-82	71.2	78.3	13.8	18
1992	74.5	80.4	15.4	19.2

There has been a considerable improvement in the life expectancy of Australians during the past century, although the increase at age 65 is perhaps not as great as would have been expected(Table 1).

The morbidity and mortality patterns for Australia are similar ro those for other western countries(Table 3).

Table 2. Comparative figures for a number of other countries

Australia	74.5	80.4	15.4	19.2
Japan	76.4	82.8	16.6	21.0
Singapore	72.3	77.5	14.4	17.2
USA	71.9	78.9	15.3	19.2

Table 3. The major causes of mortality(Age standardised rates, per 100000 person years) :

	All Population	
	Males	Females
IHD	141	68
Lung Cancer	40	15
Stroke	38	33
Pulmonary disease	31	12
Breast Cancer		20
Suicide	19	4.2
Colorectal Cancer	18	14
MVTA	18	7.1
Pneumonia, influenza	10	5.6
Diabetes	9.2	7.5

Table 4. Person years of life lost(to age 70)

ICD-9 Chapter	All Population		Aboriginal	
	Males	Females	Males	Females
All Deaths	201938	105333	24754	15119
Neoplasms	39328	34691	840	1108
Nervous	5407	3581	861	858
Circulatory	32819	10679	3362	2705
Respiratory	5066	3484	1876	1085
Digestive	4501	1911	822	580
Perinatal	10890	9008	1342	1284
Ill-defined	8037	5087	1869	1570
Injury & Poisoning	73868	21490	5642	2720

When adjusted for the relative populations of the two groups this data yields the following graphical descriprion(Fig. 2, 3).

The dietary guidelines for Australians provide advice to the general population about the choice of foods to eat, so that their usual diet contributes to a healthy lifestyle and is consistent with minimal risk for the development of diet-related diseases. Nutrition is a complex science and communication of the message demands more information and explanation than can be given in brief statements. The guidelines summarise current nutrition knowledge and act as triggers to other, more comprehensive education programs for consumers. In short, these are guidelines for healthy

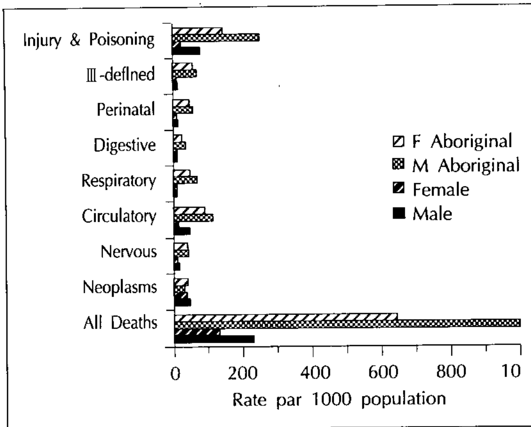

Fig. 2. Adjusted PYLL(per 1000 population).

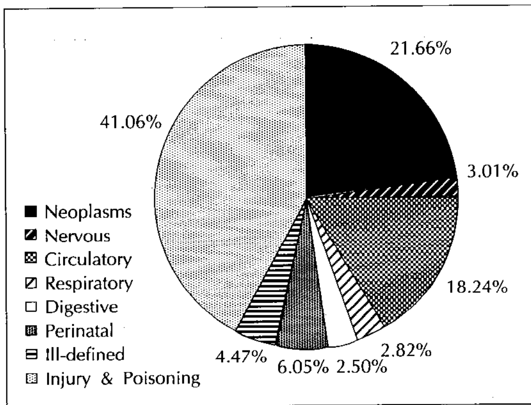

Fig. 3. ALL MALES PYLL 1989-93.

eating, and they require supporting educational programs in order to achieve their aims.

The dietary guidelines were developed for use by healthy adults. They do not necessarily apply to infants and young children, pregnant or lactating women, people with special nutrient or food requirements, those with acute or chronic illness and elderly people. The principles embodied in the guidelines may, however, assist health professionals in developing appropiate diets for these categories of clients. The guidelines apply to the total diet, and it is not relevant to use them to assess the 'healthiness' of individual food items. Similarly, the guidelines are designed for consideration as a coherent set of advice or information, and cannot be considered in isolation.

The guidelines have been arranged in a logical order. The priority is intended to reflect the relative importance of each guideline to the adult population. The first guideline is in effect an umbrella statement. All subsequent guidelines describe different facets of variety in the diet. Also for the first time, additional guidelines have been included on specific nutrients. These are aimed at groups with different needs and in whom specific dificiencies are more likely to occur.

Having developed the dietary guidelines, it was important to ensure that they are compatible with the Recommended Dietary Intakes for Australians and the major nutrition education tools, such as the Five Food Groups, nutrition pyramids(or even upside down pyramids)or tragets. The Five Food Groups are now being revised and a number of computer simulations have been undertaken. A draft paper recommending some modifications to the five food groups is now being circulated for discussion. The most significant proposed change is the elimination of the "Fat group", to reflect our concern about the level off at in the Australian diet. The "Fruit and Vegetable" has been split into two. This proposal is likely to be adopted later this year. However it is likely that more than one nutrition educational tool will continue to be used in Australia, the important factor being that they are consistent with the ADG's and the RDI's.

Following the ADG's it was important to consider dietary guidelines for children, because of the risk that dietary guidelines designed for adults could be applied to children. This would be particularly risky for children who are placed on low fat diets. Nutrition is a most important factor in the wellbeing of children. There are obviously diverse opinions about bringing up children and it is obvious that there is more than one correct way to formulate a diet. So it is critical that the dietary guidelines for children give up to date, appropriate advice, but allow for flexibility to accommodate these different practises.

Recently the dietary guidelines for children have been approved by the government and are now being publicised.

The Dietary guidelines have now been translated into nutrition goals and targets on which the impact of Australia's nutrition policy will be measured.

The principles on which the National Nutrition Plan is based are :

- Social justice
- Quality of food supply

- Community participation & accountability
- Food & Nutrition System
- Ecologically sustainable development

The objectives of the National Nutrition Policy are :

- Knowledge & skills
- Incorporate into Policy and Sectors
- Support community initiatives
- Monitoring & surveillance

The major implementation components of the plan are :

- Nutrition education
- Structural change to the food supply chain
- Nutrition Surveillance

The Commonwealth and the state governments have developed plans to incorporate these activities.

Examples of specific programs which have been implemented are :

- Folate and Neural Tube Defects
- Aboriginal Nutrition
- Food Fortification & labelling
- Breast Feeding and the WHO Code for marketing of infant formulae
- New food guide
- New school curriculum and materials
- obesity programs

The plan will be monitored and evaluated at the national and state level.

The Australian Dietary Guidelines(1992) ;

1. Enjoy a wide variety of nutritious foods
2. Eat plenty of breads, cereals,(preferably wholegrain) vegetables, (including legumes) and fruits
3. Eat a diet low in fat and in particular, low in saturated fat
4. Maintain a healthy body weight by balancing physical activity and food intake.
5. If you drink alcohol, limit your intake
6. Eat only a moderate amount of sugars and foods containing added sugars
7. Choose low salt foods and use salt sparingly
8. Encourage and support breastfeeding

In addition two companion dietary guidelines are proposed to address specific nutritional problems :

9. Eat foods containing calcium. This is particularly important for girls and women
10. Eat foods containing iron. This is particularly for girls, women, vegetarians and athletes

The Australian Dietary Guidelines for Children(1995)

1. Encourage and support breast feeding
2. Children need appropriate food and physical activity to grow and develop normally. Growth should be checked regularly
3. Enjoy a wide variety of nutritious foods
4. Eat plenty of breads, cereals, vegetables(including legumes) and fruits
5. Low fat diets are not suitable for young children. For older children, a diet low in fat and in particular, low in saturated fat, is appropriate
6. Encourage water as a drink. Alcohol is not recommended for children.
7. Eat only a moderate amount of sugars and foods containing added sugars
8. Choose low salt foods
9. Eat foods containing calcium
10. Eat foods containing iron