#### **SUBMISSION**

# Implementation of Ecologically Sustainable Development by Commonwealth departments and agencies.

Humans and their natural life support systems constitute a complex ecology of high order. Humans ultimately rely on the natural systems of the planet.

The most important application of **Ecologically Sustainable Development** in Australia is to ensure that our ultimate population is attained and is sustained:

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with a wide margin of safety in relation to carrying capacity

- · in harmony with nature
- at a high standard of living for all citizens.

# **Synopsis**

This submission explains why it is essential that the Department of Immigration and Multicultural Affairs apply the precautionary principle of ESD in relation to immigration.

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This is page 1 of 4 pages

## SAFE CARRYING CAPACITY

Safe *carrying capacity is* dependent on standard of living and must take account of unpredictable events of nature such as: A one in a hundred year drought followed by a one in a hundred year flood. A disastrous ecological disturbance perhaps resulting from global warming or hole in the ozone layer. Cyclones, insect plagues, diseases, unprecedented loss of productive land for some unaccountable reason, etc. It would be imprudent in the extreme to go to the limit without margins of safety or to think that our high standard of living is indefinitely sustainable. Exactly as there are factors of safety specified in many Australian Standards where heavy loads are imposed on structures, it is vitally important that there be a wide factor of safety in Australia's population *carrying capacity*.

## D.LM.A. & THE PRECAUTIONARY PRINCIPLE

In respect to factors of safety, the Department of Immigration and Multicultural Affairs (DIMA) is failing to **adequately** apply the *Precautionary Principle* of Ecologically Sustainable Development. The failure is serious.

Reference is made to the Australian Bureau of Statistics Catalogue No.3222.0 "Population Projections 1997 to 2051". The catalogue presents a range of projections involving different scenarios for immigration and fertility rates. Based on Series I projections, Australia can be heading for a population of 26.4 million in 2051 and still growing. Recent benchmarks of net overseas migration of 100,200 people and high fertility, if sustained, would yield a population of that order. Each additional 1,000 net overseas migrants per year to 2051 would add 77,000 to the total Australian population by 2051 given a total fertility rate of 1.75 births per woman.

Notwithstanding the ABS statistics, the Minister for Immigration Mr Ruddock hopes that 23 million could be Australia's ultimate population. However, by balancing overseas movements, (i.e. numbers arriving not exceeding numbers departing), hope can be replaced with certainty. Australia's population can be ensured of peaking sooner and in the vicinity of 21 million. That would allow a greater margin for safety than otherwise. It would avoid the ridiculous scenario of another two million people in Sydney. Demographers need to be involved. Of course Australia's final carrying capacity *could* be higher than 21 million. However, it must first be proved that the worst combination of environmental extremes - the most damaging that humanity and nature can impose - can be successfully weathered. It would be imprudent in the extreme to continue to ignore the precautionary principle of ESD. Unfortunately, to the disadvantage of quality of life for many people, (e.g. Sydneysiders with breathing difficulties such as asthma), economic, not environmental considerations have dominated decision-making on immigration quotas.

RELATIONSHIP BETWEEN
POPULATION GROWTH AND ENVIRONMENT

Mr Ruddock has advised that research is proceeding into the environmental effects of population growth via a study known as the *Ecumene Project*. The project is likely to take years to complete. Meanwhile, immigration is continuing at rates which have already contributed markedly to serious environmental problems - most noticeably in Sydney. Sydney water problems have recently been so serious that all water had to be boiled before use.. Air quality in Sydney is so bad that the NSW State of Environment Report states that the deaths of 400 people per year are linked to air pollution.

Special "smog tests" for motor vehicles are planned by the NSW State Govt. The test will impact significantly on finances of NSW vehicle owners. The fundamental requirements for quality of life in Sydney - the basis of human ecology - air and water - are both subject to pollution. And the more people - the more pollution. Wider environmental issues are the subject of extensive literature.

#### ENVIRONMENTAL AND ECONOMIC IMPLICATIONS

The Terms of Reference of this inquiry state that the Commission is to "analyse *the policy* and *economic* implications of ... Commonwealth departments and agencies incorporating environmental considerations into their *economic* and *social* decision making processes, and provide case studies in priority areas."

It is most commonly accepted that there is no *per capita* economic benefit in relation to immigration. Refer also to subsequent heading "Economic growth - unsustainable"

DIMA should be required to undertake an EIS into proposed long term immigration quotas. Consider the scenario of a developer with a proposal to construct, over the next ten years, six or seven cities, each the size of Canberra, each to accommodate 310,000 people - in total approximately 2,000,000 people. There would be impacts on water supply and water quality, air quality, sewage disposal, communications, education, police force, transport, fire services, SES, courts, all social services, annual budgets, etc. etc. The very least required by the Government would be an EIS. It would have to provide full details of *environmental*, *social* and *economic* impacts as well as advantages, disadvantages and alternatives. Over the next ten years, based on growth from natural causes and immigration, there can be population Growth in Australia of two million people yet protected environmental, social and ESD impacts are either not considered or ill-considered.

#### **ECOLOGICAL FOOTPRINTS**

Attention is drawn to "ecological footprints". Ecological footprint analysis accounts for the flows of energy and matter to and from any defined economy and converts them into the corresponding land/water area required from nature to support these flows. Such analysis highlights the fact that population growth has enormous implications for sustainability of nature both in cities and in areas remote from the cities. It is totally

inadequate to **consider population growth without considering humanity's** continuing dependency on nature.

Ecological footprint analysis can provide an indicator which integrates the environmental impacts of an individual and/or the impacts of populations. It is an indicator to be explored in detail for assistance in determining an ultimate population for Australia. In the meantime, the precautionary principle demands that Australia - DIMA - Mr Ruddock - must aim for the lowest possible ultimate population. State of Environment (SoE) Reports currently address individual environmental concerns (and there are a great many), however, synergetic effects are not considered. They are left to subjective evaluation.\*

Because SoE reports are limited thus, it is of the utmost importance that the precautionary principle of ESD be applied to population growth. Environmental impacts from each additional person apply not only locally but far and wide. They can involve synergetic effects.

For example: Flick a light switch in Sydney and contribute to environmental impacts in the Hunter Valley, subsequently in the forests of Eastern NSW and ultimately to widespread environmental effects of global warming. The whole can be greater than its parts.

\* The issue of an indicator relating population growth and ecological footprints has been raised with The Australian and New Zealand Environment and Conservation Council. Public comments called by ANZECC on *Core Environmental Indicators for Reporting on the State of Environment* closed 17 Aug. 1998.

## **ECONOMIC GROWTH - UNSUSTAINABLE**

It is stressed in the strongest terms possible that there exists in some people (who should know better), a foolish and blind faith in the concept that economic growth can be sustained for ever. Consider a computer program based on compound interest formula. Input any desired interest rate and the program loops so that the "Amount" resulting from one year becomes the "Principal" for the next year. A factor is displayed showing by how much the original principal has been multiplied as each year goes by.

Growth in Gross Domestic Product has the same basis as the program. At 3.5 per cent interest, after 50 years, production will be 5.6 times the level of production at start. At 70 years - 11.1 times. 90 years - 22.1 times and so on. In 200 years - 972 times that of year one. Impossible. Unsustainable. Consider the accelerated and astronomical results of 4.5% annual growth! And Australia's economy has already been growing for many years.

Endless economic growth is unsustainable Endlessly pursuing growth will eventually result in serious damage to the long term *sustainability* of our productive base. Natural systems on which life depends will suffer. It is happening now with

rivers polluted from agricultural run-off with a cocktail of contaminants. Common sense dictates that Australia should be aiming for stability. When short sighted business leaders (and others press for increased GDP, they are ignoring fundamental issues of sustainability. It is *ecologically sustainable development* that must be the aim - Earth's capacity to support humane existence for all into the future.

Any economic argument for population growth must take into account environmental issues and be subservient to the precautionary principle of ESD. DIMA should be required to publicly present arguments - (perhaps an EIS) - for proposed immigration. The arguments must state the advantages or otherwise that will accrue to ESD from the proposal. And - if the precautionary principle of ESD is to be disregarded - specifically explain why. The public should be invited to respond to the arguments. Responses should be made public before any final decisions relating to immigration.

Ideally, a national debate should be conducted concerning a long term population policy for Australia based on the principles of Ecologically Sustainable Development.

Yours sincerely

Geoff Grace