

NATIONAL WEEDS STRATEGY EXECUTIVE COMMITTEE

Report 1997-2002

July 2002



Table of Contents

LAUNCH OF THE NATIONAL WEEDS STRATEGY	1
FUNDING DETAILS	1
COMMITTEE ACTIVITY	1
IMPLEMENTATION OF THE NWS	3
1 GOAL TO PREVENT THE DEVELOPMENT OF NEW WEED PROBLEMS	3
1.1 Objective To prevent the introduction of new plant species with weed potential	3
1.2 Objective To ensure early detection of, and rapid action against, new weed problems	5
1.3 Objective To reduce weed spread to new areas within Australia	16
2 GOAL TO REDUCE THE IMPACT OF EXISTING WEED PROBLEMS OF NATIONAL SIGNIFICANCE	20
2.1 Objective To facilitate the identification and consideration of weed problems of national significance	20
2.2 Objective To deal with established weed problems of national significance through integrated and cost effective weed management	23
3 GOAL TO PROVIDE THE FRAMEWORK AND CAPACITY FOR ONGOING MANAGEMENT OF WEED PROBLEMS OF NATIONAL SIGNIFICANCE	26
3.1 Objective To strengthen the national research, education and training capacity to ensure ongoing cost effective, efficient and sustainable weed management	26
3.2 Objective To encourage the development of strategic plans for weed management at all levels	29
3.3 Objective To establish institutional arrangements to ensure ongoing management of weed problems of national significance	30
CONCLUSION	33
APPENDIX 1 CONFERENCES, WORKSHOPS AND MEETINGS ATTENDED BY THE PROJECT MANAGER	34

NATIONAL WEEDS STRATEGY EXECUTIVE COMMITTEE Report 1997-2001

Prepared by:
J R Thorp
NWS Project Manager
19 July 2001

This report outlines the achievements of the National Weeds Strategy Executive Committee (NWSEC) in implementing the National Weeds Strategy (NWS) during 1997 – 2002, a period covering nearly five years (4/8/97-30/6/02).

Launch of the National Weeds Strategy

The NWS was launched by Commonwealth Ministers for the Environment and Primary Industries and Energy in Wodonga on 20 June 1997 and the Strategy was subsequently widely distributed nationally by the both Commonwealth departments (Environment Australia and Primary Industries and Energy, now Agriculture, Fisheries and Forestry-Australia) and the NWS Project Manager.

Funding Details

The NWS Program Manager was funded at the rate of \$140,000 p.a. (pre GST), for a three-year term by Agriculture, Fisheries and Forestry-Australia (AFFA-50%) and Standing Committee on Agriculture and Resource Management (SCARM) State/Territory agencies (50%). From 8 August 2000 until 30 June 2002 the project was funded at the rate of \$169,400 p.a. (GST inclusive) by Environment Australia (EA-50%) and State/Territory environment and conservation and forestry agencies (50%) via the Standing Committees on Conservation and Forestry (now incorporated into the NRM Standing Committee and the Primary Industries Standing Committee respectively).

All conditions of the two contracts and have been adhered to with appropriate audits and accounting procedures adhered complied with. Amendments to contracts and deviations from the budget have been approved by AFFA or EA officers, in accordance with the terms of the contracts. Account procedures were implemented, where financial records were maintained with cross charging rules applied in order to provide a stand alone set of accounts and allow for GST credits to be applied.

Reimbursements for travel expenses were calculated on the basis of the ruling Commonwealth rates and department procedures.

Committee Activity

The position of NWS Project Manager was advertised, selection made and Mr John Thorp commenced work on 4 August 1997. Mr Thorp was based in Launceston, Tasmania.

The Committee met on twenty occasions, including six teleconferences and seven field inspections were conducted in conjunction with routine meetings:

- The first field inspection was to central Queensland to view the impact of prickly acacia and rubber vine;
- The second field inspection was to Adelaide and surrounding districts, where a number of Weeds of National Significance (WONS) candidate species and the emerging olive problem were viewed;
- The third field inspection examined subtropical weeds on the far north coast of NSW, focusing on the WONS, bitou bush/boneseed, alligator weed and other aquatics, including camphor laurel and other significant environmental weeds. Many of the species were garden escapes and some of the aquatic weeds were being actively traded by the aquarium industry;
- The fourth field inspection examined the impact of weeds on plant biodiversity and agriculture surrounding Perth (WA);
- The fifth field inspection examined initiatives being taken in the ACT for managing weeds on Department of Defence and leased and public land with an emphasis on serrated tussock, Chilean needle grass and willow removal;
- The sixth field inspection viewed the extent of the mimosa infestation on the Adelaide River flood plain (NT) and work being undertaken by indigenous people in preventing the spread of mimosa onto their flood plains; and
- The seventh examined urban and periurban weed issues such as broom and olives surrounding Adelaide.

A workshop was conducted in Sydney in August 1997 to determine Committee work priorities and to provide guidance for the NWS Project Manager in implementing the NWS. The Terms of Reference were prioritised in order to target action areas of work that would have the greatest impact on weed management in Australia over the first three years of implementing the NWS.

In May 1999 in Adelaide, the Committee participated in a workshop to assess progress in implementing the Strategy and to determine future directions and prioritise future actions.

Following NWSEC20 in Adelaide in March 2002, a combined meeting was held with the Australian Weeds Committee (AWC). The combined meeting provided the NWSEC with an opportunity to discuss ongoing NWS tasks to be undertaken by the AWC after 30 June 2002.

The NWSEC meetings (especially the face-to-face meetings) were resource intensive requiring extensive liaison with Members regarding:

- Organisation of the meeting venue, accommodation, travel, invited guests, speakers and field trips;
- Setting the agenda;
- Coordinating, writing and distributing agenda papers; and
- Minute recording, distribution and finalisation.

The Committee promoted much of its work and published all public documentation on the 'Weeds Australia Web Page' (www.weeds.org.au). Further information about the website is contained under strategy 1.2.1.

The Committee developed a communications strategy designed to promote all aspects of weed management, which was in the spirit of the NWS. Much of the success claimed in this report, results from the NWS Project Manager actively communicating with clients at all levels.

The Committee's success in implementing the NWS is detailed under each strategy below.

Implementation of the NWS

The goals, objectives and strategies of the NWS are listed, accompanied by a description of actions taken by the NWSEC. Where appropriate these are treated on a State and Territory basis.

1 Goal To prevent the development of new weed problems

1.1 Objective *To prevent the introduction of new plant species with weed potential*

1.1.1 Strengthen import entry protocols for assessing the weed potential of all proposed new plant imports.

Action

The Australian Quarantine and Inspection Service (AQIS), with the addition of Natural Heritage Trust (NHT) funding, developed a Weed Risk Assessment System (WRA), which has been in use since the 1st of August 1997. Every new plant introduction is assessed for weediness, which includes three tiers of assessment. The first is a permitted list, which is being progressively developed to avoid the duplicate assessment of species. Plant introductions not on the permitted list are subjected to a documented WRA using a checklist and scoring system. Plants not clearly shown to be low risk at this stage are subjected to a more detailed analysis.

Some species cannot be assessed with the WRA. To address this problem a Third Tier Assessment is being established to allow weed risk assessment of plants that possess significant economic potential using controlled trials. This system will operate along similar lines to the existing process for assessing biocontrol agents.

Since the WRA process was introduced over 1300 hundred species have been screened, and this work proceeds as part of AQIS's core work program.

Public consultation on a WRA review of material held in Plant Genetic Resource Centres (GRC) has been undertaken by Biosecurity Australia, which is part of AFFA (see strategy 1.2.3) The outcomes of the review had not been finalised by 30 June 2002 with the AWC assuming responsibility for ongoing monitoring of

this issue. A national agreement on the use of weedy accessions of GRC material is expected by the end of the year.

STRATEGY COMPLETED. It is the Committee's view that AQIS has developed and implemented a system that meets the aim of this strategy. However, it is recognised that there will be an ongoing resource requirement for the application of this procedure as part of AQIS's core work program. The AWC will continue monitoring this strategy.

1.1.2 Initiate community education programs to increase awareness of the use of native plant species in preference to import of some new plants

Action

The CRC for Australian Weed Management (CRAWM-formerly the CRC for Weed Management Systems) and government agencies in all States and Territories conduct programs in this area. The cooperation and involvement of the Nursery Industry Association of Australia (NIAA) has been crucial to this success of this strategy.

Discussions were held with the NIAA on the issues of new introductions, environmental weeds, sale of noxious weeds and mechanisms to identify plants with weed potential. This was discussed at their annual conference in February 1998 and a program to address these issues was subsequently developed. The nursery industry is supportive of the NWS, but the issues needed to be dealt with on a State and Territory basis.

A significant achievement was the development of an industry strategy, "Garden Plants Under the Spotlight" (GPUTS) coordinated by the CRAWM, with the full support of the NIAA. This resulted from a workshop held in August 1998 with the draft Strategy released in February 1999.

The Strategy resulted in a national list of Australia's 100 worst invasive garden plants or garden thugs following many months of work. This list was developed from a base list made up of 720 naturalised flora plus a number of prohibited or noxious weeds. Since the release of the GPUTS report, there have been numerous requests for copies of the complete list of garden thugs from within the nursery industry and other interested parties.

As an alternative, some jurisdictions promote preferred plant lists. Local government, state agencies and Kings Park and Botanic Gardens (Perth WA) have developed "bush friendly" planting guides.

Bush regenerators and Greening Australia were also made aware of the problem and have adopted weed management as an integral component of land management.

The enormity of this task should not be underestimated as the general public has a "green is good" mentality, which does not recognise the impact of weeds on the environment. Nor is the dumping of garden waste widely understood to be a

prime method of triggering bushland invasions. This is a very significant problem in the urban fringe and bordering rural subdivisions, posing a significant problem for urban reserve managers.

One difficulty encountered in implementing this strategy was the diversity of the Australian climate, which requires targeted information and limits the development of a cohesive national approach. The National Weed Awareness Program and Weedbuster (discussed later in the report) have made a significant impact in raising the awareness of the general public regarding this issue.

It should be recognised that local government waste management systems can either encourage bush dumping or mitigate against it. The use of green waste transfer stations, green bins and convenient access to disposal sites are some management options which are being used to minimise bush dumping.

STRATEGY ONGOING. It is the Committee's view that significant work has been undertaken on this strategy. It is a strategy requiring ongoing resources that will never be completed.

1.2 Objective To ensure early detection of, and rapid action against, new weed problems

1.2.1 Initiate community education programs to increase awareness and facilitate early warning of new weed occurrences

Action

National Weed Awareness (also strategy 1.3.5)

The Committee assisted the Qld Department of Natural Resources and Mines in making an NHT application for a national coordinator to coordinate a national weed awareness program and ensure a cohesive approach to weed issues that would result in an increase in community understanding and support. More specifically the position was required to nationally coordinate Weedbuster Week, liaise with State and Territory coordinators, gain sponsorship, organise a national launch, which maximises media publicity and develop national weed information products.

The National Weed Awareness program was funded under AFFA's National Weeds Program (part of the NHT) and commenced in 1998. The project is divided into four components:

- Coordination of the national Weedbuster program to assist national cooperation and increase weed awareness;
- National promotion of NWS initiatives to increase weed awareness;
- Development and coordination of national weed information products to assist in national cooperation; and
- Investigation and development of a method to manage private sector contributions for weed management awareness.

The Weedbuster component has developed from a State run to a national program incorporating each State and Territory. It started as a weed awareness week in Queensland in 1994, focussed on Weedbuster Day in 1995 and 1996 and then moved to a week long Weedbuster event nationally in 1997.

Following the success of the 1997 event, a national coordination program was developed and was successful in gaining funding assistance from the NHT.

The Weedbuster component includes an annual theme each year and a week-long focus (Weedbuster Week) in the second week of October. The annual themes have been:

- 1998-Weed identification for a weed free nation;
- 1999-Weed prevention is the intention;
- 2000-Don't hesitate, weeds wont wait;
- 2001-Local heroes, global champions; and
- 2002-Protecting Australia's big back yard.

To increase media attention, national Weedbuster launches are organised each year in the lead up to Weedbuster Week. The national launches have been:

- 1998-Perth WA by Sam Harvey from the Totally Wild television program;
- 1999-Hobart Tas by ABC gardening personality Jane Edmanson as part of the 13th Annual Weeds Conference;
- 2000-Parliament House Canberra by the Hon Wilson Tuckey, MP, then Minister for Conservation and Forestry;
- 2001-Each State and Territory conducted individual launches; and
- 2002-Has not been finalised to date.

A number of nationally coordinated posters and other promotional products were developed and distributed, aimed at delivering a consistent message at lowest cost. These materials, such as posters, bookmarks, stickers, are used for ongoing weed awareness activities throughout the year.

The "Woody Weed" character acts as a logo and identity for the program with costumes held in each State and Territory. Woody Weed is a favourite of primary school aged children and is available to badge all Weedbuster activities by arrangement with the National Coordinator. Further information and contacts are available from the Weedbuster website (www.weedbusterweek.info.au).

There was close cooperation between the National Weed Awareness Coordinator and NWS Project Manager on national weed awareness issues. This resulted in the following key achievements accomplished by the National Weed Awareness program:

- **1998:**
 - Coordinators appointed in every State and Territory;
 - 620 on ground activities during Weedbuster Week;
 - Incorporation of Weedbuster into two State weed strategies;
 - Media campaign during Weedbuster Week undertaken at national and State/Territory level resulting in 200 weed related media articles during Weedbuster Week;
 - Other major media events/articles/posters included:

- ⇒ Article in Australasian Flowers (targeting weeds in floral arrangements);
- ⇒ Article in Australian Seed Industry Magazine regarding risk assessment to slow the spread of weeds (distribution of 2750);
- ⇒ Television segment on WONS for Cross Country (audience of 300,000);
- ⇒ Article for Mitre 10 Gardener highlighting weed issues (distribution of 7000);
- ⇒ Article for Nursery Magazine highlighting weed issues (distribution of 6300);
- ⇒ Weeds that affect human health poster (10000 produced);
- ⇒ National Weedbuster Week flyers (6000 produced);
- ⇒ National Weedbuster Week posters (10000 produced);
- ⇒ National Weedbuster Week organiser posters (10000 produced);
- ⇒ WONS media fact sheets developed to accompany announcements;
- **1999:**
 - 630 on ground activities during Weedbuster Week and greater linkages with existing Landcare, Bushcare and Coastcare groups that didn't necessarily register as a separate event;
 - Increased Weedbuster Week event numbers in the ACT, NT, Qld, Tas and WA;
 - Three competitions developed across Australia for Weedbuster Week;
 - In-kind sponsorship for Australian Trust for Conservation Volunteers for the use of their 1800 number during Weedbuster Week;
 - Weedbuster and weed awareness material displayed in Mitre 10 (Northern) Garden Centres and IAMA Rural Centres;
 - Industry sponsorship for \$30,000 cash and \$20,000 in-kind contribution;
 - State and Territory launches of Weedbuster;
 - Media campaign during Weedbuster Week undertaken at national and State/Territory level resulting in 450 weed related media articles during Weedbuster Week;
 - 20 magazine articles, 7 media releases and 11 radio interviews on weed awareness, WONS and other weed issues;
 - State/Territory coordinators developed 12 other media releases related to Weedbuster Week;
 - Posters/papers for 5 weed conferences;
 - 6 posters developed on:
 - ⇒ WONS Wanted Dead poster;
 - ⇒ WONS Threaten poster;
 - ⇒ NT Weed Prevention poster;
 - ⇒ Aquatic Weed Prevention poster;
 - ⇒ WONS posters for school children;
 - ⇒ National Weedbuster Week organiser poster;
 - 5 weed prevention factsheets for:
 - ⇒ Contractors;
 - ⇒ Children;
 - ⇒ Rural;
 - ⇒ Gardeners;
 - ⇒ General weeds;

- Brochures on Weedbuster Week and an Environmental Weed Free Home;
 - NSW developed 3 new weed bookmarks;
- **2000:**
 - Weedbuster Week event numbers similar to 1999 with greater linkages with existing Landcare, Bushcare and Coastcare groups that didn't register as a separate event;
 - National weed media kit developed for the Canberra launch;
 - Increase in the media coverage of Weedbuster Week with over \$300,000 worth of media publicity over a three week period;
 - NT brochure and poster on stopping the spread of weeds through recreational activities;
 - Involvement in NT video on weeds and aboriginal lands;
 - Garden thugs poster and brochure;
 - Weeds information for article in CSIRO Scientific children's magazine;
 - Articles for Asthma Australia Newsletter, Landcare Magazine, IAMA Business News, Nufarm national magazine, Australian Rural Science and a number of gardening magazines;
 - Magazine articles on status of WONS;
 - 13 media releases concerning WONS
 - 2 television segments for Channel 7 on WONS for Morning Shift program and one for the WIN Science Show;
 - **2001:**
 - Weedbuster Week events numbered 267 (as formally recorded on the web site, but additional unregistered activities were also conducted);
 - Extensive media coverage of Weedbuster Week valued at over \$300,000;
 - Overseas interest in Weedbuster with South Africa launching a Weedbuster Program, the USA Department of Agriculture adopting the Woody the Weed character as a mascot for a national weed awareness program and NZ Department of Conservation developing Weedbuster NZ;
 - National weeds website search engine completed with a sticker and brochure for a national launch;
 - Draft of a national teachers kit for school curriculum completed;
 - Weeds feature on channel 9 Today show;
 - Continued production of weeds articles, posters, brochures for Weedbuster Week, WONS and weed issues;
 - Articles for Asthma Australia Newsletter, Landcare Magazine, IAMA Business News, Nufarm national magazine, Australian Rural Science, Country Style, Australasian Science, Habitat, Wild Thing and a number of gardening magazines;
 - Magazine articles on status of WONS;
 - 15 media releases concerning WONS;
 - **2002:**
 - Completion of Weedbusters, Activities, Information and Curriculum Links national education kit (launch occurred at the Australian Association for Environmental Education 12th Biennial Conference on 3rd July);
 - Expanding the Weedbuster focus to a year long campaign;

- Weedbuster competition launch during World Environment Week (2-9 June);
- Aiming for increased school participation in Weedbuster initiatives due to the release of the education kit;
- Links developed with NRM State Landcare Education Officers Network; and
- Continued production of weeds articles, posters, brochures for Weedbuster Week, WONS and weed issues.

National Weeds Network (also strategy 1.3.5)

The majority of actions within this strategy were undertaken by Commonwealth and State agencies. The NWS Project Manager facilitated this by maintaining contact with Commonwealth and State agency personnel, increasing the weeds network across the nation, discussing weed issues with the weeds network, and where necessary, helping to provide solutions to weed issues and concerns and ensuring that appropriate Commonwealth and State programs were developed and implemented that increased community education and awareness of weed issues.

In order to achieve this, along with progressing a number of other strategies, numerous visits were undertaken throughout Australia to promote the NWS.

Weed Incursion Network (also strategies 1.2.2 and 1.2.4)

The Office of the Chief Plant Protection Officer (OCPPO) was broadened to include a plant health component in 1998 which leads the Commonwealth's involvement in the development, adoption and implementation of national policies and programs on plant health issues of national significance. It provides leadership for plant health and protection activities nationally and internationally, and coordinates emergency management of plant health and protection matters. It also produces professionally independent scientific advice on plant health issues.

Weed issues now come under the OCPPO, which coordinates weed incursion management and develops national supporting information services, and acts in close liaison with Biosecurity Australia, AQIS and the States and Territories.

Weed incursions are primarily an AWC responsibility. The OCPPO coordinates the AWC Consultative Committee on Exotic Plant Incursions (ACCEPI) in order to ensure that action is taken at the earliest possible opportunity on all new plant incursions that are nationally notified.

In order to improve the reporting of weed incursions, an automated New Plants Notification web page was developed for reporting new plant records, which advises the jurisdiction in which the occurrence was located and the OCPPO of its presence. This data is automatically compiled into a database available to the OCPPO for downloading when required. This complements and provides input into the database of plant pest, disease and weed incursions developed by the OCPPO.

For the New Plants Notification web page, a number of trial species were tested and the site was then promoted to appropriate weed botanists across Australia. The web page was incorporated in the Weeds Australia Web Site in March 2002.

Weed issues also come under the jurisdiction of PHA and policies and networking linkages were fostered between the AWC and the NWSEC.

Weeds Australia Web Page (also strategy 1.3.5)

The majority of community education occurs through the website (www.weeds.org.au). The site was attracting the equivalent of nearly one million front page hits per year towards the end of the project. It greatly reduced the cost of distributing documents, at the same time making information more accessible.

A no frills editorial style was followed which permitted fast down loads for clients with slow lines and easy navigation of the site. Response and download times were further improved by removing large documents from the Launceston server to the USA and switching to ADSL.

The site presented a national noxious weeds list by jurisdiction (the only one available), WONS explanation and pictures, strategy development, WONS strategic plans, progress reports and related papers, weed management competency documents, web site database, State and Territory contact list for all jurisdictions, Ministerial Council information, list of WEEDeck sponsors on the tender page and WEEDeck species status, New Plants Notification web page (March 2002) and general information about the NWS. From July 2001, the Weedbuster site was also housed on the server.

The Australian weeds search portal was added in 2001, enabling searches for weed related material including web, pdf and picture files on reputable weed sites across Australia, New Zealand and Oceania. This page was widely promoted as it indexed all government weed related web pages.

Feedback on the site was generally very positive. The website was regarded as the one of the best weeds websites in the world and generated substantial inquiries from the community. Specific weed queries were referred to the appropriate jurisdiction for action.

All e-mails were answered (approximately 15 per week, however on a few occasions return addresses have not been provided or were returned as unknown) and the small number of complaints received (eight) regarding access to the site were followed up and where relevant and feasible, changes were made to the website. In the majority of cases, the problems experienced were due to the users' equipment accessing the website.

Media Publicity

All media were targeted throughout the period, with media releases from the NWS Project Manager and the National Weed Awareness Coordinator. Numerous organisations interested in weeds were also encouraged to seek publicity for their work. This has resulted in approximately 130-150 media hits per month across the nation of which about 70 resulted from NWS activities. These do not include feature articles in magazines and books.

National Cooperation

All jurisdictions and relevant industry bodies were frequently invited to contribute and share in joint national publicity, which resulted in a set of nine national posters being developed, conveying a uniform approach on grasses, garden thugs, water weeds, weed spread, impacts, WONS and school publicity. Further details of national cooperation are listed above under key achievements of the National Weed Awareness program.

STRATEGY ONGOING. It is the Committee's view that significant work has been undertaken on this strategy. It is a strategy requiring ongoing resources that will never be completed.

1.2.2 Coordinate plant identification and reporting mechanisms involving State herbaria and other expert bodies

Action

Herbaria

All jurisdictions have formally or informally strengthened their relationship with their respective herbaria and channels are in place in all States and Territories, which enable the identification of weeds. Specifically, Agriculture WA signed a memorandum of understanding fostering cooperation with the WA Herbarium, which is developing a weed database that can be accessed via the Internet. This is based on "Florabase" which provides information on WA endemic flora.

Australia's virtual herbaria project was announced in 2001 which could in due course provide weed specific information when the project is fully operational. In the intervening period discussions were held with all State, Territory and national herbaria regarding the need for, and importance of, a national reporting mechanism for weed incursions. As outlined under strategy 1.2.1 (Weed Incursion Network), a New Plants Notification web page was developed for reporting new plant records.

Following discussion on this issue with the Chair of the Council of the Heads of Australian Herbaria (CHAH), a paper requesting herbaria support and their use of the web page was prepared for their November 2001 meeting. Follow up with each herbarium was being undertaken by AWC jurisdictions.

Weed Identification Cards

The WEEDeck identification card was a concept developed during 1999/2000 in conjunction with NSW Agriculture. They were designed as a tool for field use in identifying new incursions and emerging weed problems.

Each card contains coloured weed identification photographs, a full description of the distinguishing features of the weed on the back of the card and a map showing where the weed is naturalised and where it is likely to spread. This

project was a major initiative in developing monitoring networks for agriculture, riparian and environmentally sensitive areas.

By the end of June 2002, 160 WEEDeck cards had been sponsored with five decks commissioned. The project demonstrated that appropriately targeted, high quality information could be successfully adopted across a broad range of stakeholders. Overall, species cards were commissioned for:

- NSW Stormwater Trust
- NSW Agriculture
- Olympic Coordination Authority
- Sainty & Associates
- Dow Agrosience
- Canberra Urban Parks and Places
- Natural Resources and Environment, Victoria
- Office of the Chief Plant Protection Officer, Canberra
- Qld Dept Natural Resources and Mines
- Weed Society of New South Wales
- Environment ACT
- Forest Products Commission
- Sutherland Shire Council
- NT Land Council & CRC Sust Trop Savannas
- Northern Australia Quarantine Service
- WA Agriculture
- NT Parks and Wildlife Commission
- CRC for Australian Weed Management
- Dept of Lands Planning Environment, NT
- Animal and Plant Control Commission, SA
- Land & Property

The project is now managed by Australian Weeds Committee.

STRATEGY COMPLETED. The Committee believes that with the formation of the OCPPO, the ACCEPI and the New Plants Notification web page, control of new weed incursions is being effectively coordinated and the aim of the strategy has been substantially completed. The WEEDeck project will continue while further cooperation is required from the herbaria at a national level to ensure reliable national reporting of new naturalisations.

- 1.2.3 Develop guidelines for assessing the weed risk of plant material being used for breeding or selection trials prior to its release for commercial use

Action

AQIS/Biosecurity Australia held a meeting of GRC in early 1998, which considered a variety of issues, of which three specifically related to this strategy:

- The first was to review existing accessions with a view to identifying weedy material that it would be unwise to release;

- The second was the development of a protocol for testing weedy material in a secure environment that minimises the risk of escape into the wider environment; and
- Thirdly an issue of wide interest was the release of new varieties containing weediness potential, by virtue of new genes incorporated by traditional breeding techniques. The developers of genetically modified plants face similar concerns regarding this issue.

Public consultation on a WRA review of material held in GRC has been undertaken. Biosecurity Australia progressed assessment of the GRC and Botanic Garden collections. Six hundred species of high priority were nominated by GRC to be assessed. CSIRO Forestry in Canberra provided a list of plants of interest for potential release held in their collection, and these were assessed along with the GRC species.

Assessment of these species was contracted out to consultants. WRA of the high priority species in GRC collections were completed, however a degree of variability related to consultant bias was identified in the results, and all assessments were audited prior to finalisation.

The outcomes of the review had not been finalised by 30 June 2002 with the AWC assuming responsibility for ongoing monitoring of this issue. Results will be forwarded to the GRC, the AWC and appropriate State and Territory agencies when the report is completed, at which point Standing Committee agencies will need to negotiate with the holders of the germplasm regarding requirements for any weedy species identified. A national agreement on the use of weedy accessions of GRC material is expected by the end of 2002.

Preliminary discussions were held with the Council of Heads of Australian Botanic Gardens in late 1998, as a result of which living collection records were to be checked and any plants of concern identified. Responses were received from a number of the gardens, but no weedy plants identified. Royal Botanic Gardens, Sydney went further, to the extent of withholding material not on the AQIS permitted list. Progressing this with other botanic gardens remains on the AQIS work program.

STRATEGY COMPLETED. The Committee's view is that the WRA guidelines being used meet the aim of this strategy. The AWC will continue to monitor the implementation of this process.

1.2.4 Develop a contingency plan, identifying key groups, reporting procedures and a funding mechanism

Action

Weed Incursion Network

As outlined under strategy 1.2.1, the OCPPO coordinates the ACCEPI. The ACCEPI addresses species incursion management issues under a generic incursion management plan, which is appropriately customised, according to the

species being addressed. This flexibility is necessary in order to cope with the diverse range of reproductive and dispersal mechanisms associated with weed incursions. It has also reduced any urgency for individual State/Territory contingency plans.

At an ACCEPI meeting in October 2001, it was agreed that a principles paper on the conditions to be met to qualify for a nationally funded weed eradication program would be drafted. In addition, PHA was undertaking a broader task to establish agreed principles for funding and compensation for eradication of exotic plant pests and diseases. PHA is aiming for a cost-sharing agreement on weed incursions by the end of 2002.

While the ACCEPI principles paper would refer to the broader PHA task, its scope was confined to the technical criteria for evaluating potential impact and feasibility of eradication. The paper did not set out quantitative criteria for making decisions. This level of detail is a longer-term objective of the CRCAWM (see below). In addition, at the 4th meeting of the AWC, it was agreed that a discussion paper examining criteria for longer-term approaches to weed incursions (when eradication may not be possible) should be developed. The OCCPO in their role of coordinating the ACCEPI have agreed to convene an expert working group to undertake this task. The paper is expected to be completed by the end of 2002.

The paper on 'principles for determining nationally coordinated response and cost-sharing for exotic plant incursions' was endorsed by the AWC (March 2002) and now forms part of the ACCEPI's management operating principles.

Until completion of the PHA cost-sharing agreement on weed incursions, the funding mechanism currently used for weed incursions is the same as that used for other national plant health responses. States and Territories pay 50% of the total cost, a sum weighted for each jurisdiction according to the value of the impacted production and the Commonwealth pays 50%.

Weed Risk Assessment and Prioritisation

The AWC, as part of their 2001-2002 work program undertook the task of reviewing current processes for assessing weed priorities. This included drafting a paper on current weed prioritisation processes by:

- Sourcing information from Commonwealth/State/Territory and other contacts;
- Checking legislative requirements for each jurisdiction; and
- Collating the above information.

In conjunction with the OCCPO and the CRCAWM, a Weed Risk Assessment Workshop was held in Canberra in March 2002 to develop a national approach to weed risk assessment and prioritisation. The main focus was primarily on weeds under legislative control and codes of practice, but once this framework is adopted, the prioritisation process should form the basis of many regional and land management plans.

The paper described above was distributed and formed an important background component for the Workshop. An agreed position for a national framework was reached at the Workshop with the CRCAWM drafting the proceedings and developing a discussion paper for AWC consideration. The aim is to have the national framework endorsed by the NRM Standing Committee in order to gain the widest possible acceptance and use. This is expected to be completed by the end of 2002.

The CRCAWM will continue to develop the weed risk assessment process through continuous improvement as new research knowledge is gained about the process.

STRATEGY ONGOING. It is the Committee's view that significant work has been undertaken on this strategy. It is a strategy requiring ongoing resources that will never be completed. This includes PHA's task on developing a cost-sharing agreement on weed incursions, ACCEPI's examination of criteria for longer-term approaches to weed incursions, endorsement of a national framework for weed risk assessment and prioritisation and the CRCAWM's continuous improvement of the national framework. One of the major issues still unresolved is the need for environmental and conservation agencies to fully participate and resource weed incursion management of environmental weeds.

1.3 Objective To reduce weed spread to new areas within Australia

1.3.1 Provide guidelines to States and Territories to ensure appropriate consistency in weeds legislation

Action

The first draft of a discussion paper on this issue was completed in early August 2001. In developing principles for weeds legislation, the paper explained the rationale for government intervention through weeds legislation, examined the aims and objectives of relevant Commonwealth legislation and weeds legislation of the States and Territories, compared existing State and Territory weeds legislation and outlined principles previously suggested by various authors.

The draft went through a number of amendments following consideration and comment by the NWSEC and the AWC.

There was some confusion that the principles paper was an attempt to seek uniform weeds legislation throughout Australia and that the only principles to be applied to each State and Territory weeds legislation were those listed in the paper. There was never any intention of seeking uniform weeds legislation, with the NWS philosophy being that weeds legislation does not need to be identical or uniform, but sufficiently consistent to limit the spread of weeds within and across borders.

It was noted that a Standing Committee taskforce had been examining the feasibility of nationally uniform agricultural plant and animal health legislation for a number of years. While there was general consensus that nationally uniform

agricultural plant and animal health legislation has merit, it has not been possible to gain agreement on an acceptable approach across all jurisdictions.

The core set of principles in the discussion paper was an attempt to address the major causes of the spread of weeds that could be applied nationwide without being too prescriptive. At the individual State and Territory level, it was envisaged that additional principles may be added to suit particular State or Territory issues.

A revised draft was considered by the NWSEC at their March 2002 meeting in Adelaide. There was general agreement with the content of the paper and scope of the principles however, it was agreed that a subcommittee would undertake the task of reworking the set of principles and incorporating comments from the 4th meeting of the AWC. With new Queensland weeds legislation due to be enacted by mid-2002, it was agreed that for completeness, the paper would be updated to include this legislation.

The NWSEC subcommittee responsible for this issue was unable to finalise the paper before 30 June 2002 however, work will continue until an NWSEC draft of the paper is finalised. Responsibility for this strategy will then pass to the AWC for their final consideration, endorsement and progression through the NRM Standing Committee.

The slow progress of gaining NWSEC and AWC endorsement of the discussion paper highlights the difficulty in gaining agreement across jurisdictions when it requires a change in approach to an issue away from their existing framework.

If the principles are endorsed by the NRM Standing Committee, the national principles will be considered by individual jurisdictions when reviewing and redrafting their weeds legislation.

STRATEGY ONGOING. It is the Committee's view that significant work has been undertaken on this strategy. The strategy cannot be completed until the discussion paper is finalised and the principles are endorsed at the Standing Committee level.

1.3.2 Facilitate adoption of the guidelines

Action

None to date; cannot be accomplished until after the principles have been endorsed at the Standing Committee level.

STRATEGY REQUIRING MAJOR WORK. It is the Committee's view that this strategy cannot be completed until the principles are incorporated into each jurisdiction's weeds legislation. This is likely to be a long timeframe as it will only be undertaken as individual jurisdictions review and redraft their weeds legislation.

1.3.3 Encourage State, Territory and Local Governments to develop contingency plans for action against new weed infestations

Action

Four States (NSW, WA, SA and Tas) have formal incursion management plans appropriate for weeds. Victoria has weed specific plans. The remaining jurisdictions were encouraged to prepare for this eventuality.

As outlined under strategy 1.2.4, the ACCEPI follows a generic incursion management plan, which is appropriately customised, according to the weed species being addressed. This flexibility is necessary in order to cope with the diverse range of reproductive and dispersal mechanisms associated with weed incursions. It has also reduced the urgency for individual State/Territory contingency plans.

STRATEGY ONGOING. It is the Committee's view that significant work has been undertaken on this strategy principally through the ACCEPI. It is unlikely that there will ever be contingency plans for action against new weed infestations at all levels of government. The ACCEPI's generic incursion management plan has reduced the urgency for individual State/Territory contingency plans.

1.3.4 Establish effective procedures for restricting the spread of new weeds within Australia, for example, hygiene practices, machinery cleaning codes of practice, controls on nursery plant and seed sales

Action

National Noxious Weeds List

The Committee placed a database listing all the noxious weeds in Australia on the Weeds Australia Web Page. This was designed to assist various industries (eg nursery, seed, grain, livestock etc) in complying with State and Territory legislation. It also highlighted the complexity of the system and shows how difficult it is for interstate traders to comply with the diverse requirements.

Containment Strategies

The development of WONS strategies encouraged the establishment of proactive anti-spread weed measures; a key management strategy for weeds where the agent of spread can be controlled. Protocols and declaration procedures are being implemented across Australia and are usually combined with pest and disease and/or chemical residue issues.

A few examples of programs currently in operation or in preparation are listed below.

Agriculture WA has a biosecurity program and is considering extending the Grainguard program nationally. They maintain rigorous border controls in order

to exclude pest disease and weed problems entering the State. This includes ensuring that stock is cleaned of weed seeds externally and internally.

NSW Agriculture requires compulsory cleaning of harvesting machinery at the NSW/QLD border for machines entering NSW. It is estimated that this costs contractors \$2.2m pa, which is recouped through contractor harvesting charges.

Department of Natural Resources and Mines QLD has developed a weed vendor declaration procedure and supporting documentation for stock, farm produce and machinery (similar to that used to manage chemical residues in stock). Its use may be regulated, but it is expected that landholders will adopt it readily in order to minimise the impacts of weeds on their properties. It will also be a requirement under the draft QLD weeds legislation for local government area pest management plans to reflect the weed seed prevention provisions of both the draft State Weed Strategy and the principles in the legislation.

The AWC has discussed the merits of a national project to address the issue of weed seed/propagule spread generally and agreed that Queensland and Victoria, who have the most advanced State public awareness campaigns, should develop a joint paper on this issue for the next meeting of the AWC in September 2002. In developing the paper, the South Australian protocols used to reduce the spread of branched broomrape will also be examined. It is hoped that the system will be adopted Australia wide in due course.

The Department of Business, Industry and Resource Development NT maintains an active program with the Army in order to prevent the spread of weeds during military exercises on tracked vehicles and equipment.

A number of corporations, mining, gas, rail and electricity which manage land or corridors through the landscape target weeds in their environmental programs and actively aim to minimise the spread of weeds when undertaking activities.

The Environmentally Aware Contractors (EAC) system helps organisations and businesses identify the hazards they face and how to implement appropriate risk management. EAC includes a **Code of Practice**, vehicle, machinery, equipment and material hygiene standards along with training for staff and employees together with an auditable management system. The EAC system is simple and designed to be implemented at the workplace, not just by management. Work books have been produced specially for employees in the field that provide simple easy to understand procedures.

The AWC was successful in gaining endorsement of the concept of a consistent national declaration of weeds to prevent trade and distribution at the 17th meeting of SCARM with a list of potential and established (20 WONS) weed species to be declared in each State and Territory. It was the AWC's understanding that each State/Territory would declare these weeds for at least trade and distribution purposes. Owing to legislative difficulties and restrictions and other priorities, so far, not all States and Territories have been able to fully meet this request.

In September 1999, the Seed Industry Association of Australian (SIAA) launched a national code of practice for seed labelling and marketing to replace existing State/Territory seeds legislation. The development of the code was due to the impact of mutual recognition legislation and the need to standardise labelling and marketing provisions for sowing seed across all States and Territories.

Under the code it is an offence to sell seed which is contaminated with prohibited seeds or diseases. The code was to be binding on all seed marketers irrespective of whether or not they were members of the SIAA. Certified seed sales do not appear to be a major source of weed spread due to the quality control and risk management measures that are requirements for that industry.

Nursery Weeds

See discussion under strategy 1.1.2.

STRATEGY ONGOING. It is the Committee's view that significant work has been undertaken on this strategy. The Committee recognises that much needs to be done in this area, and believes that jurisdictions are being proactive in developing mechanisms to prevent the spread of weeds. There is a groundswell of people who recognise this problem and many more programs are expected to be developed, similar to those identified above.

1.3.5 Educate landowners, land users, industry and the general public in procedures to restrict the spread of weeds

Action

Refer to National Weeds Network, Weeds Australia Web Page and National Weed Awareness discussion under strategy 1.2.1.

STRATEGY ONGOING. It is the Committee's view that significant work has been undertaken on this strategy. It is a strategy requiring ongoing resources that will never be completed. The Committee recognises the magnitude of this task, but feedback from member States indicates that there has been a significant increase in public enquires for weed information, increasing their workload, which is due in some part to the implementation of the NWS.

2 Goal To reduce the impact of existing weed problems of national significance

2.1 Objective To facilitate the identification and consideration of weed problems of national significance

2.1.1 Develop guidelines and a procedure to establish when weed problems are of national significance

Action

The NWSEC considered that the scope of weed problems/issues of national significance to be too broad and narrowed the focus to WONS.

A separate SCARM paper on WONS administrative procedures and guidelines for writing WONS species strategies was developed and endorsed, that covered all relevant biological, industry and community issues. This would ensure efficient and effective use of available funds, as well as describing the magnitude of the project and scope of the outcomes sought.

Committees, comprised of senior officials and key stakeholders representing those States where a WONS could exist as a significant problem, are overseeing the implementation of each strategic plan. Such a process gives confidence to stakeholders and potential investors that progress is being made.

To ensure that this process is fully implemented, one of the final actions of the NWSEC was to write to the State/Territory lead agency, and where they existed, WONS Management Group for each WONS highlighting the need for, and importance of, a management group for implementation and reporting of WONS strategies.

The support of the previous three Ministerial Councils by endorsement of the species as a WONS has improved the opportunities for States and Territories to gain additional funding for strategic actions for reducing the impacts of weeds. Other benefits are also starting to flow with national recognition, such as the encouragement of ongoing research and development support and national regulation of the species as a noxious weed. This strengthening of a shared vision with shared responsibility and problem solving should improve the containment efforts of all WONS resulting in a collective advantage to all States, Territories, producers, environmental interests and land managers.

STRATEGY COMPLETED. The Committee believes that the work undertaken to date is sufficient to meet the requirements of this strategy, particularly as the WONS process including implementation of the strategies is now well under way.

2.1.2 Strengthen existing weeds specialist networks to ensure that information to assess weed problems is readily accessible

Action

The NWS Project Manager regularly visited all State and Territory agencies concerned with weed management, control and/or research. This has amounted to in excess of 100 organisations comprised of over 600 personnel. On all occasions a presentation was made on the NWS, followed by discussion of the organisation's role, which resulted in information exchange, and a canvassing of organisations or people with a common interest in other parts of Australia.

A number of conferences and meetings have been addressed (see appendix 1) where the NWS Project Manager has presented information on the NWS, at the same time fostering cooperation and interaction across jurisdictions. The WONS process has provided numerous forums where stakeholders worked together to

solve common problems. This has promoted discussion of wider issues and follow-up communication, to the benefit of all parties.

The CRCAWM continues to cooperate extensively with State and Territory weed management agencies by providing research and technical support in developing management plans and techniques. The CRCAWM fully supported the NWS and in cooperation with State and Territory agencies and CSIRO provided extensive input into the development of the WONS strategies.

STRATEGY COMPLETED. While it is acknowledged that there will always be a need to strengthen existing weeds specialist networks, it is the Committee's view that in terms of the NWS, this strategy was completed.

2.1.3 Establish procedures for assessing the relative priority of weed issues of national significance

Action

A consultancy was commissioned to develop criteria for determining WONS, the results of which were reported separately to the three Standing Committees. This was undertaken by the Animal and Plant Control Commission of South Australia and funded by Environment Australia.

The NWSEC further developed the criteria and methodology for assessing WONS, and called for species nominations from member States and Territories. Seventy-four nominations were received with distribution, environmental and economic data also provided by States and Territories according to guidelines prepared by the Committee. The NWS Project Manager facilitated the formation of expert panels to assess the invasiveness and impacts for each species.

The dataset was compiled and forwarded to the Bureau of Resource Sciences (part of AFFA) for statistical analysis and mapping of the current distributions. Agriculture WA using CLIMATE computer modelling software generated potential distribution maps.

The Committee developed a mathematical model for combining the ten variables used in the analysis and their individual scores, which were then used to rank the weed candidates, resulting in the final list of twenty WONS.

The three Ministerial Councils approved the inaugural list of twenty WONS in early 1999, followed by a public announcement on the 1st June of that year.

The process and the results have been documented in hard copy and on CD-ROM under the title "The Determination of Weeds of National Significance". Copies of this publication were distributed to all agencies and personnel involved in the project with some being available for purchase through AFFA. It is also available on the world wide web at www.weeds.org.au.

STRATEGY COMPLETED. The Committee recognised that this process was not perfect and could be improved. At the time, it was a world first in attempting to

develop a list of a nation's worst weeds through a process that was objective, transparent and defensible and is therefore more than adequate to fulfil the aim of this strategy.

2.2 Objective To deal with established weed problems of national significance through integrated and cost effective weed management

2.2.1 Develop mechanisms for assembling the information required to develop management strategies for the problems.

Action

Guidelines for developing species specific weed strategies were developed and over 700 copies distributed to interested people and organisations. The NWS Project Manager facilitated the development of the WONS strategies using these guidelines resulting in a consistent format. They incorporated a strategic focus from a national perspective down to the property level.

The development of WONS strategies was managed by a committee of key stakeholders which worked under the lead State or Territory agency.

All 20 WONS strategies were developed and endorsed at the Standing Committee level and then printed by the Queensland Department of Natural Resources and Mines for the lead agencies.

The completed WONS strategies were incorporated onto the Weeds Australia Web Page.

STRATEGY COMPLETED. The NWSEC reviewed and provided comments on all the draft WONS strategies before forwarding them to Standing Committee(s) for endorsement.

2.2.2 Establish procedures for developing cost efficient and effective management plans.

Action

The guidelines for developing species specific weed strategies included sections on identifying priority actions. These sections were included in each WONS strategy with management plans being developed for each participating jurisdiction on a needs basis.

STRATEGY COMPLETED. The NWSEC reviewed and provided comments on all the draft WONS strategies including the priority actions in each strategy before forwarding them to Standing Committee(s) for endorsement.

2.2.3 Establish procedures for implementing, monitoring and evaluating the management plans

Action

The NWSEC monitored the development of the WONS strategies on a monthly basis and required that each strategy specify goals, performance measures, evaluation procedures and project management methodology.

Implementation of Weeds of National Significance Strategies

Lead agencies for WONS strategies were encouraged to form management groups for implementation of the strategies. For efficiency reasons, a number of

similar weeds were combined under the one management group (such as the three prickly weed species of Parkinsonia, prickly acacia and mesquite).

The NWSEC considered that it was vital that each WONS had a functioning management group for strategy implementation and reporting. At their March 2002 meeting in Adelaide, the NWSEC agreed to write to each relevant lead agency seeking their assistance in establishing a management group. At this time all strategies have effective management in place with the exception of bridal creeper.

As the majority of the WONS strategies had only been finalised and endorsed in the last twelve months, implementation of the strategies has only just started. The NWS Project Manager maintained regular contact with each WONS management group and often attended their meetings.

Reporting and Evaluation

A draft reporting template that required financial information for the implementation of each WONS strategy was originally developed. The NWSEC noted that although it was desirable to obtain financial information for the implementation of each WONS strategy, in a number of jurisdictions, expenditure was not recorded in a weed specific manner to allow separate financial reporting. It was then decided to use the mimosa strategy report to develop a reporting model.

Reporting templates were developed for each of the WONS strategies and distributed to the management groups or lead agencies. Each management committee will monitor and report annually to the AWC who will advise the Standing Committee of the achievements and status of the implementation of all WONS strategies.

STRATEGY COMPLETED. The Committee believes that procedures are in place for implementing, monitoring and evaluating WONS strategies and management plans. With the majority of WONS strategies having only been finalised and endorsed in the last twelve months, the actual implementation of the strategies and management plans will take a number of years and in most cases, require ongoing resources.

- 2.2.4 Provide guidelines to ensure that wherever possible, the Landcare approach (coordinated community action) be considered the appropriate delivery mechanism for much of the on ground action on weed issues implemented under this Strategy.

Action

The Landcare/community involvement approach was promoted as the most effective way of harnessing community action in the fight against weeds. The guidelines for developing WONS strategies followed this model, with all WONS strategies including community action as appropriate. Each WONS strategy includes a list of roles and responsibilities for the key stakeholders.

Successful implementation of WONS strategies and community involvement using the Landcare approach was always going to require the appropriate infrastructure and funding. The level of commitment and resources likely to be provided varied considerably between jurisdictions.

There was an unrealistic expectation that Commonwealth funding through the National Weeds Program of the NHT would provide sufficient funding for all aspects of WONS strategy implementation. Strategy development and implementation was always a separate issue to funding and a request from the Federal Agriculture Minister to his State/Territory colleagues regarding a joint commitment to funding proposals resulted in variable responses.

This highlights the varying priorities that each State/Territory has placed on WONS and strategy implementation. In part, it reflects the significant amount of resources required to complete and then implement the twenty WONS strategies.

It was also evident that there was less support and commitment for funding of environmental WONS by environmental/conservation agencies.

STRATEGY ONGOING. The Committee is of the view that for the Landcare approach to be fully adopted will require an increase in prioritisation for WONS strategy implementation amongst some jurisdictions.

3 Goal To provide the framework and capacity for ongoing management of weed problems of national significance

3.1 Objective To strengthen the national research, education and training capacity to ensure ongoing cost effective, efficient and sustainable weed management

3.1.1 Integrate and coordinate weed research, education and training programs throughout Australia

Action

Weed Research

The CRCAWM, formerly the CRC for Weed Management Systems, has coordinated weed research in the public sector across temperate and subtropical Australia, also providing some extension support for environmental and agricultural weed species. Cooperation amongst researchers has ensured a minimal duplication of effort, at the same time fostering a team problem-solving ethos.

The CRCAWM was successful with its second five-year funding bid and since July 2001, the responsibilities of the CRCAWM were extended and it now integrates weed research across Australia. Support and advice was provided by the NWS Project Manager in the funding bid by identifying linkages to the NWS, WONS and government policy development in order to strengthen the adoption of research results.

The areas covered by the CRCAWM programs are:

- Program 1 – Weed Incursion and Risk Management;
- Program 2 – Sustainable Cropping Systems;
- Program 3 – Landscape Management;
- Program 4 – Community Empowerment; and
- Program 5 – Education.

Further information on the CRCAWM can be found at their website (www.waite.adelaide.edu.au/CRCWMS/index.html).

The WONS process and strategy development has brought the together the key people in policy, regulatory, control and research and has acted as means of fostering linkages and cooperation. While this only applies to an extremely limited number of species, hopefully it will be a catalyst for further integration and coordination on weed research.

Formal Tertiary Weed Education (also strategy 3.1.3)

During 2002, the CRCAWM undertook a review of university weed management courses in Australia. The CRCAWM developed a weed management course which meets the objectives of the NWS and has made this available free of charge to any training institution. The course is currently run at the University of Adelaide, University of New England and Charles Sturt University.

To facilitate wider adoption of at least parts of the course, the CRCAWM has unitised the course into a number of stand alone units.

National Weed Management Training Competencies (also strategy 3.1.2)

The NWSEC, in conjunction with NSW Agriculture and representatives of the agricultural and environmental sectors from all States and Territories, embarked on a process to establish national weed management training competencies in 1999.

The competencies cover agricultural and environmental occupations, examples of which are listed below:

- Weed Control Assistants;
- Weed Spray Operators;
- Weed Control Officers (local Government);
- Weed Control Contractors;
- Parks Rangers;
- Bush Regenerators;
- Community Group Members;

- Landholders;
- Government Advisers;
- Labour Market Programs;
- Managers of Weed Management programs at all levels; and
- Volunteers - eg, Greencorp and Australian Trust for Conservation volunteers.

The book, 'Efficient weed management, protecting your investment in the land' was published in early 2001 by NSW Agriculture with funding from the NHT as part of a component from earlier funding for scoping the development of weed management training competencies. The book was well received and provided an important link between weed research, education and training. Material from the book was suitable for use in the development of training units for weed management

National weed management training competencies were completed and incorporated into the Conservation and Land Management Training Package that was developed by the Rural Training Council of Australia (RTCA). These were endorsed in May 2002 by the Australian National Training Authority with the RTCA expressing their appreciation for the tremendous support, cooperation and dedication displayed over the life of the project across Australia.

This was a particularly rewarding achievement as the weed management competencies are likely to have the greatest single impact of any of the NWS actions on weed management in future years. These competencies will form the basis of consistent training across the nation, encourage professional standards for weed officers, and enable job mobility and promotional standards to be developed.

Further work still needs to be undertaken in order to link educators and training programs more closely with the research effort.

STRATEGY ONGOING. Significant work has been undertaken on this strategy. The completion and endorsement of the national weed management training competencies achieved substantially more than the NWSEC thought possible within this strategy over the period of the Committee's existence. The Committee is of the view that it is a strategy requiring ongoing resources that will never be completed.

- 3.1.2 Facilitate and coordinate the delivery of training and awareness programs in integrated weed management for landowners/managers and other on ground resource users

Action

Refer to the National Weed Awareness and National Weed Management Training Competencies discussions under strategies 1.2.1 and 3.1.1 respectively.

STRATEGY ONGOING. Significant work has been undertaken on this strategy. The Committee is of the view that it is a strategy requiring ongoing resources to

ensure that the national weed management training competencies are widely adopted and utilised. It is the adoption of these competencies that bring ongoing fundamental improvement and professionalism to weed management that will endure well into the future. This may well prove to be one of the most significant impacts of the NWS.

- 3.1.3 Encourage tertiary institutions to emphasise, in weed science courses, the need to adopt integrated weed management practices across all ecosystems

Action

The NWS Project Manager addressed a number of student groups and met with lecturers developing short and full time courses in weed management across Australia. In all cases the national weed management training competencies were promoted and their use encouraged. Whilst these competencies will not be used directly in university weed science courses, they serve as a useful reference for designing tertiary level weed science courses.

Also refer to Formal Tertiary Weed Education under strategy 3.1.1.

STRATEGY COMPLETED. The Committee is of the opinion that tertiary institutions have acknowledged the need to adopt integrated weed management practices across all ecosystems and have access to course material through the CRCAWM weed management course and the national weed management training competencies.

3.2 Objective To encourage the development of strategic plans for weed management at all levels

- 3.2.1 Promote the benefits of developing complementary strategic plans for weed management at the State, regional, catchment, locality and property scale

Action

Refer to the discussions on WONS strategies under objective 2.2 with WONS strategy guidelines being used extensively as a basis for regional, catchment and landholder strategies.

Landcare and other NHT funding components have supported the development of strategies and plans at all levels, ranging from an environmental weeds strategy in WA through to local management plans achieving on the ground weed management.

State/Territory Weed Strategies

All States/Territories have in place operational or draft (Qld) weed strategies.

Declared Weeds Under State/Territory Weeds Legislation

The more recent weeds legislation introduced by Tasmania and the Northern Territory (and the Queensland Bill that is expected to be enacted mid 2002), has incorporated the philosophy of the NWS into their objectives of attempting to apply a strategic and sustainable approach to the management of weeds encompassing both primary industries and the environment. There are also requirements for declared weed management plans (also for the ACT).

STRATEGY COMPLETED. The Committee believes that since the launch of the NWS, widespread adoption of strategic and management planning has occurred across the nation. Whilst there is still scope for this strategy to be further developed requiring ongoing resources, this should be seen as a cultural shift in weed management.

3.3 Objective To establish institutional arrangements to ensure ongoing management of weed problems of national significance

3.3.1 Ministerial Councils will nominate an appropriate body to coordinate cross sectional issues and actions relating to weeds

Action

This was initially achieved with the formation of the NWSEC in 1997.

From 30 June 2002, the AWC has an enhanced role of coordinating cross sectional issues and actions relating to weeds.

STRATEGY COMPLETED.

3.3.2 Establish a position of Coordinator: National Weeds Strategy

Action

The NWS Project Manager, John R Thorp was appointed on 4 August 1997, for an initial term of three years working under an AFFA consultancy agreement based in Launceston, Tasmania. Following this term, another contract as the NWS Project Manager was awarded (via a tender process) to John R Thorp until 30 June 2002.

STRATEGY COMPLETED.

3.3.3 Develop triennial plans for action on weed issues of national significance

Action

A workshop was conducted in Sydney in August 1997 to determine Committee work priorities and to provide guidance for the NWS Project Manager in implementing the NWS. The Terms of Reference were prioritised in order to target action areas of work that would have the greatest impact on weed management in Australia over the first three years of the NWS along with a three year work plan that was reviewed each Committee meeting and also annually.

In May 1999 in Adelaide, the Committee participated in a workshop to assess progress in implementing the Strategy and to determine future directions and prioritise future actions.

A two year work program was developed in 2000 to prioritise future work, describing what would be done, by whom and when, with expected outcomes, which was reviewed each Committee meeting.

STRATEGY COMPLETED.

3.3.4 Establish a mechanism for resolving sectoral conflicts on weed issues

Action

Every State and Territory was encouraged to clarify roles and responsibilities across agencies within their jurisdiction, as a component of their respective weed strategies. This has resulted in greater communication within the majority of jurisdictions.

Recognition of the respective importance and interrelationships of weed issues across the primary industry and environmental sectors has encouraged agencies involved to broaden their view of the problem and cooperate more closely in solving what is often a shared problem.

Weed Coordinating Committees

Every State and Territory has a coordinating body that is responsible for dealing with weed issues. This varies from weed issues being the primary focus of the coordinating body to weeds constituting one component of wider natural resource management responsibilities. The following is a list of the State and Territory coordinating bodies:

- NSW Noxious Weeds Advisory Committee (with 138 Local Control Authorities);
- Vic Catchment and Land Protection Council (with 10 Regional Catchment Management Authorities);
- Qld Rural Lands Protection Board (Land Protection Council under the new weeds bill that is expected to be enacted by September 2002, with requirements for local government to have in place weed management plans);
- WA Agriculture Protection Board (with APB Regional Advisory Committees). The steering committee responsible for developing the State Weed Plan is currently developing terms of reference and guidelines for membership of a State Weed Coordinating Council;
- SA Weeds Advisory Committee (with Local Animal and Plant Control Boards);
- Tas Weed Management Committee;
- NT Weeds Advisory Committee; and
- ACT Weeds Working Group.

National Weeds Workshop

A PHA/AWC National Weeds Workshop was held in Canberra in March 2002, which examined a number of weed issues and made recommendations for improving the coordinated approach to weed issues. Stakeholder attendance at the Workshop highlighted the difficulty in attracting a wide cross section of environmental/conservation interests to such forums.

Australian Weeds Conference/National Weeds Forum

As a result of the National Weeds Workshop, the NWSEC and the AWC considered a number of options for greater consultative input into the policy direction of the AWC. It was agreed that the AWC would address community/industry weed issues and concerns through consultation with one option being through the triennial Australian Weeds Conference.

STRATEGY COMPLETED. The Committee is of the view that mechanisms are in place for helping to resolve sector conflicts on weed issues through the new structure of the AWC and links to the Australian Weeds Conference. The success of this strategy will depend on the implementation of those mechanisms.

CONCLUSION

Over the five year period of funding for the NWSEC to implement the NWS, the Committee has been highly successful in progressing the majority of the NWS strategies. Of the twenty-six strategies listed in the NWS, fifteen have been completed, ten have had significant work undertaken, noting that these strategies are ongoing and will never be completed. There is only one strategy (1.3.2) requiring major work for completion and this covered an issue beyond the control of the NWSEC and the NWS Project Manager.

Conferences, Workshops and Meetings Attended by the Project Manager

MONTH	YEAR	MEETING OR CONFERENCE	
January	1998	Tasmanian Weed Management Committee - Ross	Talk given
February	1998	WA Weeds Update Conference	Paper presented
February	1998	Environmental Weeds Action Network annual meeting Perth	Paper presented and strategy workshop conducted
February	1998	Nursery Industry Association of Australia	Participant
March	1998	National Environmental Law Association Annual Conference, Canberra	Paper presented
April	1998	Noxious Weeds Advisory Council Queanbeyan	Talk given
May	1998	National Weed Management Training Competency Workshop - Sydney	Conducted workshop
June	1998	NRE Weed Risk Assessment Workshop - Melbourne	Participant
July	1998	Weed Science Society of WA Perth	Talk given
July	1998	Presentation to Agriculture WA Staff Perth	Talk given
August	1998	WONS Workshop for Tropical Weeds - Brisbane	Conducted workshop
August	1998	WONS Workshop for Sub-tropical Weeds - Brisbane	Conducted workshop
August	1998	WONS Workshop for Temperate Weeds - Melbourne	Conducted workshop
September	1998	AQIS Genetic Resources Workshop Sydney	Participant
September	1998	5 th Queensland Weed Symposium, Cairns	Participant
October	1998	State Weed Competencies SA Adelaide	Participant
October	1998	Weedbuster Week national Launch Perth	Talk given
October	1998	Database Workshop Canberra	Participant
February	1999	1 st International Workshop on Weed Risk Assessment, Adelaide	Participant
February	1999	Managing Exotic Insects, Weeds and Pathogens - Canberra	Participant
March	1999	Qld Parthenium Weed Strategy Workshop - Roma	Participant

April	1999	Prickly acacia Workshop	Conducted workshop
April	1999	Rubber vine Workshop	Conducted workshop
April	1999	S E Queensland Pest Plant & Animal Symposium. Gympie	Paper presented
April	1999	Plant Protection Society of WA Perth	Talk given
July	1999	10 th Noxious Weeds Conference, Ballina NSW	Paper presented
August	1999	Kimberley Weeds Strategy Kununurra	Conducted workshop
September	1999	Murray/Darling Assn. Conference, Moama	Paper presented
September	1999	Weed Society of NSW – Riverina Branch Wagga Wagga	Talk given
September	1999	Lecture to student, James Cook University Wagga Wagga	Lecture
September	1999	12 th Australian Weeds Conference, Hobart	Paper presented 2 posters
September	1999	Weedbuster Week National Launch-2 events Hobart	Chair
September	1999	Queensland Weeds Strategy, Brisbane	Participant
October	1999	National Alligator Weed Strategy Workshop, Sydney	Conducted workshop
November	1999	Serrated tussock Workshop, Albury	Conducted workshop
November	1999	Chilean needle grass Workshop, Albury	Conducted workshop
November	1999	Weedbuster Week Debrief, Sunshine Coast	Participant
November	1999	National blackberry Strategy Workshop, Melbourne	Conducted workshop
December	1999	Bitou bush/boneseed Workshop, Melbourne	Conducted workshop
February	2000	Mesquite Workshop, Brisbane	Conducted workshop
February	2000	Parkinsonia Workshop, Brisbane	Conducted workshop
March	2000	CRC Workshop Canberra	Participant
March	2000	Willows Workshop, Melbourne	Conducted workshop
April	2000	Cabomba Workshop, Brisbane	Conducted workshop
May	2000	Internet Plant Purchases and Postal	Participant

May	2000	Quarantine Issues Lantana Workshop, Brisbane	Conducted workshop
June	2000	Community Advisory Committee Murray-Darling Basin Ministerial Council, Canberra	Presentation
July	2000	6 th Queensland Weed Symposium	Keynote Address
July	2000	Athel Pine Workshop, Alice Springs	Conduct Workshop
July	2000	Presentation to DPIF Weeds Branch, Katherine, NT	Presentation
October	2000	National Weedbuster Launch Parliament House, Canberra	Presentation
November	2000	Attendance at meeting 1 of the Conservation and Land Management National Industry Steering Committee	Participant
March	2001	Visited State Government Departments in WA including the herbarium.	
March	2001	Presentation to Blackwood Creek Weed Management Group, Margaret River	Keynote Speaker
March	2001	Met with Plant Health Australia Board, Perth	
May	2001	Commonwealth Portfolio Group Meeting, Canberra	Participant
June	2001	Visited Murray Darling Association, Adelaide, DEH, ARCC, PIRSA	Participant
July	2001	Attendance at meeting 2 of the Conservation and Land Management National Industry Steering Committee	Participant
July	2001	Visited State Government departments, Victoria	Participant
September	2001	Attended 11 th Biennial Noxious Weeds Conference, Moama	Keynote Address
November	2001	Commonwealth Portfolio Group Meeting, Canberra	Participant
January	2002	AWC/PHA Workshop meeting, Canberra	Participant
February	2002	Competencies Industry Weeds Training Reference Group meeting, Canberra	Participant
February	2002	AWC/PHA Weeds Workshop, Canberra	Facilitator
February	2002	CRCAWM Weeds Risk Assessment Workshop, Canberra	Participant
February	2002	CLM NISC meeting, Canberra	Participant

February	2002	Alligator Weed Meeting, Sydney	Participant
March	2002	Rivers Forum, Canberra	Participant
April	2002	Sydney – Meetings with Sainty & Associates re WEEDeck, Horticulture Australia, Wool Innovations Visited NSW Agriculture, Orange	Participant
May	2002	Weedbuster meetings in Launceston	Participant
June	2002	Mimosa Management Committee meeting, Darwin	Participant
June	2002	Workshop on issues surrounding NWS, Atherton, Qld	Presentation
June	2002	Mounted poster display and promotional banners in Emerald Qld for NWS and AWC in conjunction with Weed Awareness Coordinator	Prepared display of posters and promotional material
June	2002	NSW Weed Society weeds workshop Sydney	Provided poster display and promotional material