Plant Varieties Journal

Quarter One 2002 Volume 15 Number 1

'Kordroper' – 2002 Release Cut Flower Variety

AGRICULTURE, FISHERIES AND FORESTRY - AUSTRALIA

Treloar ROSES

Treloars are the Australian Agent for W. Kordes & Sons of Germany, who are recognised worldwide as leaders in producing new garden and cut flower varieties.

The following Kordes varieties are protected under Plant Breeders Rights:

Variety	*Synonym*	*Type*	*Applic No.*
KORSCHWAMA	Black Madonna	Hybrid Tea	1994/094
KORCRISETT	Calibra	Cut Flower	1994/090
KOROMTAR	Cream Dream	Cut Flower	1997/204
KORSORB	Cubana	Cut Flower	1991/052
KORMILLER	Dream	Cut Flower	1996/076
KORTANKEN	Domstadt Fulda	Floribunda	1996/082
KORILIS	Eliza	Cut Flower	1996/077
KORAZERKA	Ekstase	Hybrid Tea	1996/078
KORGENOMA	Emely	Cut Flower	1997/207
KORCILMO	Escimo	Cut Flower	1994/093
KORFISCHER	Hansa-Park	Shrub	1996/085
KOROKIS	Kiss	Cut Flower	1989/132
KORVERPEA	Kleopatra	Hybrid Tea	1996/084
KORDABA	Lambada	Cut Flower	1994/089
KORSULAS	Limona	Cut Flower	1997/203
KORRUICIL	Our Esther	Cut Flower	1997/205
KORANDERER	Our Copper Queen	Hybrid Tea	1997/201
SPEKES	Our Sacha	Cut Flower	1996/080
KORPLASINA	Our Vanilla	Cut Flower	1996/081
KORBASREN	Pink Bassino	Ground Cover	1996/087
KORBLEKAF		Cut Flower	2000/315
KORMAREC	Sommerabend	Ground Cover	1996/086
KORPINKA	Summer Fairytale	Ground Cover	1994/088
KORVESTAVI	Sunny Sky	Cut Flower	1997/200
KORBACOL	Texas	Cut Flower	1994/092
KORHOCO	Vital	Cut Flower	1997/206
KORDREKES		Cut Flower	1999/204
KORFLEUR		Cut Flower	1999/201
KORKULARIS		Cut Flower	1999/202
KORLUMARA		Cut Flower	1999/199
KORMEERAM		Cut Flower	1999/200
KORROGILO		Cut Flower	1999/105
KORSETAG		Cut Flower	1999/203
KORNAFIRO		Cut Flower	2001/014
KORWARPEEL		Hybrid Tea	2001/015
KORTRAUPFI			2001/175
KORANUL		Cut Flower	2001/295
KORELZODA		Cut Flower	2001/294
KORPANCOM		Ground Cover	2001/293
KORORBE		Floribunda	2001/307
KORNALIST		Cut Flower	2001/306
KORSTESGLI		Ground Cover	2001/305

The following new variety has been applied for Plant Breeders Rights:

KORDROPER	Cut Flower	2002/105

Please contact us for further information on these excellent new varieties

Treloar ROSES

"Midwood", Portland VIC 3305. Phone: (03) 5529 2367. Fax: (03) 5529 2511
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Plant Varieties Journal

Official Journal of Plant Breeders Rights Australia

QUARTER ONE, 2002 **VOLUME 15 NUMBER 1**

Part 1 – General Information

Part 2 – Public Notices

SUBSCRIPTION ENQUIRIES AND ADVERTISING SHOULD BE ADDRESSED TO:
PLANT BREEDERS RIGHTS AUSTRALIA
Department of Agriculture, Fisheries and Forestry – Australia
GPO Box 858, Canberra ACT 2601
Telephone: (02) 6272 4228 Facsimile: (02) 6272 3650
Website: http://www.affa.gov.au/pbr
E-mail: pbr@affa.gov.au

CLOSING DATE FOR ISSUE VOL 15 NO 2: June 21, 2002.
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Plant Breeders Rights Australia (PBRA) is an agency within the Commonwealth Department of Agriculture, Fisheries and Forestry – Australia

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Part 1 – General Information

Objections to Applications and Requests for Revocation of a Grant or of a Declaration that a Plant Variety is Essentially Derived from Another Plant Variety

The Plant Breeder's Rights scheme is administered consistent with the model law of *the International Convention for the Protection of New Plant Varieties 1991 (UPOV 91)*, that is, applicants are entitled to protection, in the absence of proof to the contrary.

The Plant Breeder's Rights Office (PBRO) is not required to prove the views, assertions, and opinions of persons challenging protection for plant varieties. Those objecting to/commenting on applications or requesting/commenting on revocation of a grant or declaration that a plant variety is essentially derived from another plant variety must provide conclusive supporting evidence why their objection/comment/-request should be upheld. It cannot be stressed too strongly that conclusive argumentation should be provided from the outset.

Objections to Applications

A person may make objections to applications for PBR if (i) their commercial interests would be affected adversely, and (ii) the application will not fulfil all the conditions required by the *Plant Breeder's Rights Act.*

Objections to applications must be lodged with the Registrar no later than six months after the date the description of the variety is published in this journal. The objector must provide evidence of adverse affect on their commercial interests and that the application should not be granted.

The Registrar of the Plant Breeder's Rights Office (PBRO) is required to give a copy of the objection to the applicant. The objection is also available to the general public on request. The applicant has the opportunity to respond to the evidence presented. The Registrar then decides whether or not the objection will be upheld and, subsequently, whether the application will be granted. The PBRO is under no obligation to enter into further dialogue regarding an objection or to communicate reasons why an objection is not upheld. If an objection is upheld it will be notified in this journal.

A payment of $100 is required on lodgement of the objection. Additional costs of $75 per hour for work undertaken in relation to the objection will be billed to the objector.

Comments on Applications
The PBRO accepts comments on applications. However, the scheme is managed on normal risk management lines and with an emphasis on the requirement that challengers with a commercial interest must demonstrate conclusively that an application should not be granted.

All written comment will be acknowledged. The PBRO is under no obligation to enter into further communication regarding comments. If an application does not proceed to a grant it will be notified in this journal.

Requests for Revocation, (where an individual's interests are affected) of:
• a Grant
• a Declaration that a Plant Variety is Essentially Derived

A person may, when their interests are affected adversely, apply for the revocation of:
- a grant of PBR; or
- a declaration that a plant variety is essentially derived from another plant variety.

The person requesting revocation is required to lodge a revocation payment fee of $500. The person seeking revocation of a grant or declaration that a plant variety is essentially derived from another plant, must provide conclusive evidence of adverse affect on their interests and that the grant should be revoked.

The PBRO also accepts information regarding revocation of grants and declarations of essentially derived plant varieties. Such information must demonstrate conclusively that a grant or declaration should not have been made. All written information will be acknowledged. The PBRO is under no obligation to enter into further communication regarding information provided.

New On-line Database for PBR Varieties

The PBR Office announces an exciting development in customer service for Internet users ~ a searchable database for all Australian PBR varieties, both past and present. The database features a detailed description and image for every variety granted full rights and basic information for other PBR varieties. Searches by genus, species, common name, variety name and title holder are some of its many advantages. Please browse the database at www.affa.gov.au/pbr and provide your feedback.

Cumulative Index to *Plant Varieties Journal*

The editorial committee of *Plant Varieties Journal* has decided that the cumulative index will no longer be published in the journal. However, it will be electronically published as a downloadable document in our new PBR website in the location given above. Instead of publishing the cumulative index once in a year it will be updated on a quarterly basis and our clients will be able to easily download the document into their computers. Electronic copy will make the searching easy in this large document and facilitate the exchange of information as quickly as possible. If you do not have a computer or Internet facilities then we will be able send you a hard copy free of charge. Please contact our office if you require further information.

Applying For Plant Breeders Rights

Applications are accepted from the original breeder of a new variety (from their employer if the breeder is an employee) or from a person who has acquired ownership from the original breeder. Overseas breeders need to appoint an agent to represent their interests in Australia. Interested parties should contact the PBR office and an accredited Qualified Person (Appendix 3) experienced in the plant species in question.

Requirement to Supply Comparative Varieties

Once an application has been accepted by the PBR office, it is covered by provisional protection. Also it **immediately** becomes a 'variety of common knowledge' and thus may be required by others as a comparator for their applications with a higher application number.

Applicants are reminded that they are required to release propagative material for comparative testing provided that the material is used for no other purpose and all material relating to the variety is returned when the trial is complete. The expenses incurred in the provision of material for comparative trials is borne by those conducting the trials.

As the variety is already under provisional protection, any use outside the conditions outlined above would qualify as an infringement and would be dealt with under section 53 of the Plant Breeder's Rights Act.

Applicants having difficulties procuring varieties for use in comparative trials are urged to contact the PBR office immediately.

UPOV Developments

Information on UPOV and its activities is available on the INTERNET located at http://www.upov.int The adopted UPOV Technical Guidelines (TG) for testing different plant species are now available for this website at http://www.upov.int/tg-rom/index-e.htm

On January 7, 2002 Republic of Korea became the 50th member of UPOV.

The complete list of UPOV member states with their address and current status of ratification is given in Appendix 5.

Obligations under the International Convention for the Protection of New Varieties of Plants 1991 (UPOV 91).

Consistent with Australia's membership of UPOV 1991, the criteria for the granting of protection under the *Plant Breeder's Rights Act 1994* (PBRA) is that the variety: has a breeder; is new, distinct, uniform and stable; has an acceptable name; and that application formalities are completed and relevant fees paid.

Applicants for protection need to be aware of the existence of any other Australian legislation, which could impact on their intended use of the registered variety. Relatedly, administrators of other Australian legislation may have an interest in applications for registration notified in this journal.

It is feasible for a new variety to be registered under the PBRA, but, as the PBRA co-exists with other laws of the land, the exercise of the breeder's right may be restricted by such legislation. For example, current legislation may prohibit the use of that variety in food, or, the growing of that variety as a noxious weed.

The Plant Breeder's Rights Office (PBRO) advises that it is the responsibility of the applicant and of administrators of legislation to take these matters up directly between the responsible parties and not with the PBRO.

Instruction to Authors: Format for Preparing Detailed Description for *Plant Varieties Journal*

A detailed description for the *Plant Varieties Journal* must be prepared under following headings:

- **Details of the Application**
- **Characteristics**
- **Origin and Breeding**
- **Choice of Comparator(s)**
- **Comparative Trial**
- **Prior Applications and Sales**
- **Name of the person who prepared the description**
- **Comparative Table**
- **At the discretion of the QP/Applicant, scientific papers and other relevant information/publications can be appended to the detailed description**

Please note that the PBR office retains editorial control for all published material. Accordingly there may be instances when non-critical portions of a description (eg particularly

verbose methodologies or appendices) are not published, although they do remain part of the detailed description. In some cases some non-distinct characteristics presented in a table may be omitted for publication.

Following are some notes for preparing the descriptions under the above headings with some examples of style and format:

Details of the Application

This will include the correct botanical name; the common name of the species; name and synonym (if any) of the variety; application number and the acceptance date; details of the applicant; details of the agent (if any).

For consistency, botanical and common names should follow those of: *Hortus Third*, Staff of the LH Bailey Hortorium, Macmillan Publishing Company, 1976; *Census of Australian Vascular Plants*, RJ Hnatiuk, AGPS, 1990; *The Smart Gardeners Guide to Common Names of Plants*, M Adler, Rising Sun Press, 1994; *A Checklist of Economic Plants in Australia,* CSIRO, 1994; *Australian Plant Name Index*, Australian Biological Resources Study, AGPS, 1991.

Example 1

Genus species

Common name of the species
'Variety' syn **Synonym** (if applicable)
Application No: xxxx/xxx Accepted: dd month year.
Applicant: **Applicant's Name**, Town, State (abbreviation) and Country (if not Australia).
Agent: **Agent's Name**, Town, State (abbreviation).

Characteristics
Where there is a UPOV technical guideline available for the species make sure to follow the Table of Characteristics as closely as possible. As a general rule, the characteristics should be described in the phenological order using following subheadings: Plant, Stem, Leaf, Inflorescence, Flower and flower parts, Fruit and fruit parts, Seed, Other characters (disease resistance, stress tolerance, quality etc). Individual characteristics within the subheadings should generally be in the following order: growth habit, height, length, width, shape, colour (RHS colour chart reference with edition), other. Each individual characteristic should be followed by its specific state of expression. Use a concise taxonomic style in which subheadings are followed by a colon and individual characteristics are separated by a comma.

Example 2

Characteristics (Table nn, Figure nn) Plant: growth habit upright, height medium, width narrow. Stem: anthocyanin colouration absent, internode length short. Leaf: length long, width narrow, variegation present, predominant colour green (RHS 137A), secondary margin colour pale green-yellow (RHS 1A). Inflorescence: type corymb. Flower: pedicel short, diameter small (average 12.5mm), number of petals 5, petal colour yellow (RHS 12A), number of sepals 5 …..etc (Note: give the reference for the edition of RHS colour chart used, eg. all RHS colour chart numbers refer to 1986 edition)

Origin and Breeding
Indicate how the variety was originated, i.e. controlled pollination, open pollination, induced mutation, spontaneous mutation, introduction and selection, seedling selection etc. Give the name of the parents. Also give the characteristics of the parental material by which they differ from the candidate variety. Briefly describe the breeding procedure and selection criteria used in developing the new variety. Also indicate the mode of propagation used during breeding. Give the name(s) of the breeder.

Example 3

Origin and Breeding Controlled pollination: seed parent S90-502-1 x pollen parent S90-1202-1. The seed parent was characterised by early flowering, dark green non-variegated leaves and compact bushy habit. The pollen parent was characterised by late flowering, variegated leaves and narrow bushy habit. Hybridisation took place in <location>, <country> in <year>. From this cross, seedling number S 3736 was chosen in 1993 on the basis of flowering time. Selection criteria: variegated leaves, compact bushy habit and early flowering. Propagation: a number mature stock plants were generated from this seedling through tissue culture and were found to be uniform and stable. The 'Variety' will be commercially propagated by vegetative cuttings from the stock plants. Breeder: <name>, <location>, <country>.

Example 4

Origin and Breeding Introduction and selection: 5 cycles of selection within <accession number> originating from <originating country> and supplied by the <company name> under a materials transfer agreement. When grown CI2204 was heterogeneous with both hooded and non-hooded types and differences in seed colour. Repeated selection for hooded types produced seven breeding lines (726.1-726.7), which were evaluated for forage and seed production potential. From these lines, a uniform single line known as 726.2.1 was selected to become 'Variety'. Selection criteria: seedling vigour, dry matter yield, uniformly hooded (awnless), seed colour (black). Propagation: by seed. Breeder: <name>, <location>, <country>.

Choice of Comparators
As identifying and including the most similar varieties of common knowledge may be the most crucial part of the trial, we suggest the Qps do more research and record their decisions before making the final selection. Under this heading indicate the rationale behind your selection of the most similar varieties of common knowledge included in the comparative trial. Identify the grouping characteristics used to exclude varieties from the comparative trial. Include all varieties where there is no possibility of distinguishing from the candidate variety through descriptions, photos, etc.

If the candidate variety has not been distinguished from its parents/source material elsewhere in the application, it is a requirement that the parents/source material be included in the comparative trial. However, this requirement can be waived if the parents/source material can be distinguished from the candidate variety by the use of the grouping characteristics mentioned above.

Example 5

Choice of Comparators Grouping characteristics used in identifying the most similar varieties of common knowledge were – Stem: anthocyanin colouration absent, Leaf: variegation present, Flower: colour yellow. On the basis of these grouping characteristics following comparator varieties were included in the trial: 'Comparator 1', 'Comparator 2', 'Comparator 3' etc.

Example 6

Choice of Comparators Grouping characteristics used in identifying the most similar varieties of common knowledge were – Seed: colour. On the basis of this grouping characteristic, the following comparator varieties were included in the trial: 'Comparator 1', 'Comparator 2' etc. The original source material from which the variety was selected was also included for the purpose of providing evidence of breeding.

Example 7

Choice of Comparators 'Comparator 1' is the only other variety of common knowledge in existence at the time of lodgement of this application. No other varieties of common knowledge have been identified.

Comparative Trial

State the location and date of the trial. Give relevant details on propagation, pot/plot size and type, growing medium, chemical treatments, lighting, irrigation, or management, which may be necessary to repeat the trials. State the type of trial design used, the total number of specimens in the trial and how they were arranged. State the number of specimens from which measurements/observations were taken. Also indicate how the specimen was selected and the sampling regime.

Example 8

Comparative Trial Location: Carrum Downs, VIC (Latitude 38°06′ South, elevation 35m), summer-autumn 1996/97. Conditions: trial conducted in a polyhouse, plants propagated from cutting, rooted cuttings planted into 210mm pots filed with soilless potting mix (pine bark base), nutrition maintained with slow release fertilisers, pest and disease treatments applied as required. Trial design: fifteen pots of each variety arranged in a completely randomised design. Measurements: from ten plants at random. One sample per plant.

Prior Applications and Sales

Indicate the prior overseas applications with Country, Year of lodgement, Current status and Name applied in the following format.

Example 9

Country Applied	Year	Current Status	Name
Germany	1994	Granted	'Variety'
Denmark	1994	Granted	'Variety'

Also indicate date and country of first sale and date of first sale in Australia.

Example 10

First sold in Germany in 1994. First Australian sale Nil.

Name of the person who prepared the description

Name and address of the person who prepared the description. It is preferable that the description be prepared by the Qualified Person or at the very least the draft has been seen and approved by the QP before final submission. Please note that it is a responsibility of the QP under the PBR Act to verify the particulars of the detailed description are accurate.

Example 11

Description: **Name,** Company (optional), Town/suburb, State (abbreviated)

Comparative Table

While preparing the table **NEVER** use the "table creating features" of word processing packages as they insert hidden formatting blocks that are difficult to remove before publication. Instead, use a single tab mark to align columns. NEVER use drawing objects to create lines, boxes or shading. Instead use the underscore character (_) to create lines for tables. Tables should normally be either 8.5cm wide (half page) or 17.5cm wide (full page). If necessary a very wide table can be presented in landscape orientation.

Please note the following points when preparing the comparative table:

- The candidate variety is always on the left of the table. If the same table is used for two or more candidate varieties, the candidate varieties are arranged in order of application numbers, higher application number to the left of the table. Comparators are always to the right of the candidate(s).
- Arrange the characteristics in order – this should be the same as the order in the UPOV technical guidelines for the species. Please ensure that each characteristics marked with an asterisk is included.
- If a UPOV technical guideline is not available use the order same as in the text part: Plant, Stem, Leaf, Inflorescence, Flower, Flower parts, Fruit, Fruit parts, Seed, special characters etc.
- For measured characteristics Mean, Standard Deviation, Least Significant Difference (LSD)*at $P \leq 0.01$ is mandatory.
- When quoting significant differences please give the level of probability in the following format: $P \leq 0.001$, $P \leq 0.01$, or ns.
- For discrete characters do not use scores. Please give a word description. eg. round, medium, tall etc.
- For ranked characteristics just give the numbers, do not use 'normal' statistical analysis. Non-parametric statistical procedures may be used in such cases.
- Use only the number of significant decimal places appropriate to the level of accuracy of the observations.
- If there are two or more candidate varieties, use range tests rather than an LSD, such as Duncan's Multiple Range Test or any other appropriate multiple range test. Enter the grouping characters as alphabet superscripts.

Completed Part 2 Applications should be sent to:

Plant Breeders Rights Australia
Department of Agriculture, Fisheries and Forestry – Australia
GPO Box 858 CANBERRA ACT 2601

To facilitate editing, descriptions may also be sent via E-mail to: Tanvir.Hossain@affa.gov.au or PBR@affa.gov.au

Note: a signed copy of the Part 2 application along with the examination fee, one slide or photograph must also be sent by post.

Important Changes

Improved Client Service
Consistent with the PBR Office's commitment to continuous improvement, many back copies of this journal are now accessible from the PBR website. Check under Plant Varieties Journal in PBR website at www.affa.gov.au/pbr.

In addition, there have been some changes in PBR staff responsibilities. From 1 April 2002, Ms H Costa and Dr K Prakash will rotate tasks assuming responsibility for Acceptances and Grants respectively. This will further strengthen the Office's capacity to deal with registration procedures.

For this, and other intended improvements, please continue to check the **What's New** zone on the website at www.affa.gov.au/pbr.

Current PBR Forms
The official forms for PBR purposes are periodically updated. A list of current PBR forms with their numbers and date of last update is given below. When a form is updated, the month and the year of the last update follow the form number within parentheses. For example, Form P1 was last updated in September 2001 and therefore this form gets a designation of Form P1 (9/01). We also encourage you to consult the 'Guidelines for Completing Part 1 Application Form' before filing in the Part 1 Application. To avoid delays we suggest that you use the latest version of the forms.

The Part 2 form has been updated in May 1999 to include the information on the "Confirmation of Submission of Propagating Material to a Genetic Resource Centre". Previously this was a separate form to be filled in at the time of final granting of PBR. We now encourage that the information on Genetic Resource Centre is given at the time of the Part 2 submission to avoid any delay to process the application at the final granting stage.

If you do not have the latest version of the form(s), please contact the PBR office. Alternatively, forms can be downloaded from the PBR web site at http://www.affa.gov.au/pbr and check under Forms.

Name of Form	Form Number	Last Updated
Application for Plant Breeders Rights Part 1 – General Information	Form P1	September 2001
Guidelines for Completing Part1 Application Form	Part1ins	September 2001
General Information on Plant Breeder's Rights for Applicants and Qualified Persons	Info Gen	September 2001
Authorisation of Agent	Form AA	April 2002
Application for Plant Breeders Rights Part 2 – Description of New Variety	Form P2	July 2001
Nomination of a Qualified Person	Form QP 1	April 1999
Certification by a Qualified Person	Form QP 2	April 1999
Confirmation of Submission of Propagating Material to a Genetic Resources Centre (GRC)	Form GRC2	May 1999
Proposed Variety Names	Form DEN1	December 1995
Exemption of a Taxon from Farm Saved Seed	Form ET1	September 1998
ACRA Herbarium Specimen	Form Herb 1	March 2000

Overseas Testing/Data

The PBR Act allows DUS data produced in other countries (overseas data) be used in lieu of conducting a comparative trial in Australia provided certain conditions relating to the filing of applications, sufficiency of the data and the likelihood that the candidate variety will express the distinctive characteristic(s) in the same way when grown locally. Briefly the overseas data could be considered where:

- The first PBR application relating to the candidate variety has been lodged overseas, and
- the variety has previously been test grown in a UPOV member country using official UPOV test guidelines and test procedures, (i.e. equivalent to a comparative trial in Australia) and
- either, all the most similar varieties of common knowledge (including those in Australia) have been included in the overseas DUS trial, or
- the new overseas variety is so clearly distinct from all the Australian varieties of common knowledge that further DUS test growing is not warranted, and
- sufficient data and descriptive information is available to publish a description of the variety in an accepted format in Plant Varieties Journal; and to satisfy the requirements of the PBR Act.

TAXA THAT MUST BE TRIALLED IN AUSTRALIA

It is the policy of PBR office to not accept overseas data for the following taxa due to the wide genotype by environment interactions that have been previously experienced. Varietal descriptions from overseas trials have consistently been different from those obtained from trials grown under Australian conditions. Consequently, for the following taxon a full comparative PBR trial must be conducted in Australia:

Solanum tuberosum	Potato

The Qualified Person, in consultation with the agent/applicant, and perhaps other specialists and taxonomists, will need to evaluate the overseas data, test report and photographs to see if the application does fulfil all PBR Office requirements, and then advise the agent/applicant:

- either, to submit Part 2 incorporating a description for publication, any additional data and photographs and to pay the examination fee;
- or, to conduct a DUS trial in Australia, recommending to the applicant/agent which additional varieties of common knowledge to include;
- or, submit Part 2 including additional data (information about similar varieties in Australia to show that they are clearly distinct from the candidate variety that a further DUS test growing including the similar varieties is not warranted and that the variety displays the distinctive characteristics when grown in Australia)

Please note that the PBR office does not obtain overseas DUS test reports on behalf of applicants. It is the sole responsibility of the applicants to obtain these reports directly from the relevant overseas testing authorities. Where applicants already have the report they are advised to submit a certified true copy of the report with the Part 1 application. Applicants, or those duly authorised, may certify the copy.

If you do not have the test report available at the time of Part-1 application then you are advised to submit the Part-1 application without the test report. However, you should make arrangements to procure the DUS test report directly from the relevant testing authority. When the report becomes available, a certified copy should be supplied to the QP and the PBR office.

When the trial is based on an UPOV technical guideline and test report in an official UPOV language (English, German or French), it can be lodged in support of the application. In other cases the test reports must be in English.

The applicant/agent and Qualified Person should use the overseas test report to complete Part 2 of the application, making a decision on how to proceed in view of the completeness of the information, the comparators (if any) used in the overseas DUS trial and their knowledge of similar Australian varieties that may not have been included in the overseas test report.

If a description is based on an overseas test report, Australian PBR will not be granted until after the decision to grant PBR in the country producing the DUS test is made. The final decision on the acceptability of overseas data rests with the PBR office.

Staff

We would like to welcome Mr. Peter Abell in the PBR team. He will work as an examiner within the PBR office. He has substantial experience in plant breeding especially in breeding Australian native species. He also worked as a qualified person (QP) for some PBR applications, which have been finalised prior to his appointment as a PBR examiner. Under the PBR Act Mr. Abell can no longer act as a QP or seek a grant of PBR.

Part 2 – Public Notices

Varieties Included in this Issue

An index reference for common names with botanical names is published in Appendix 9.

ACCEPTANCES

The following varieties are under provisional protection from the date of acceptance.

Alstroemeria hybrid
Peruvian Lily

'Full Moon'
Application No: 2002/019 Accepted: 5 Mar 2002.
Applicant**: Novosel's Alstroemeria Pty Ltd**, Lobethal, SA.

Annona squamosa x *Annona cherimola*
Etemoya/Custard Apple

'K J Pinks'
Application No: 2002/049 Accepted: 26 Mar 2002.
Applicant**: Keith Walter & Judith Elaine Paxton**.
Agent: **ANFIC (Australian Nurserymen's Fruit Improvement Company)**, Bathurst, NSW.

Atriplex nummularia
Saltbush

'Eyres Green'
Application No: 2002/018 Accepted: 26 Mar 2002.
Applicant**: Topline Plant Company**, Uraidla, SA.

Chrysanthemum indicum
Chrysanthemum

'Cream Reagan Twin'
Application No: 2001/365 Accepted: 20 Mar 2002.
Applicant**: Chrysanthemum Breeders Association N.V. (C.B.A.N.V.)**.
Agent: **Chrysco Flowers**, Cranbourne, VIC.

'Dark Orange Vyking'
Application No: 2001/376 Accepted: 20 Mar 2002.
Applicant**: Vyking Flowers B.V.**.
Agent: **Chrysco Flowers**, Cranbourne, VIC.

'Dark Reagan Mundo'
Application No: 2001/369 Accepted: 20 Mar 2002.
Applicant**: Chrysanthemum Breeders Association N.V. (C.B.A.N.V.)**.
Agent: **Chrysco Flowers**, Cranbourne, VIC.

'Dark Rosy Reagan'
Application No: 2001/373 Accepted: 20 Mar 2002.
Applicant**: Chrysanthemum Breeders Association N.V. (C.B.A.N.V.)**.
Agent: **Chrysco Flowers**, Cranbourne, VIC.

'Pink Elite Reagan'
Application No: 2001/364 Accepted: 20 Mar 2002.
Applicant**: Chrysanthemum Breeders Association N.V. (C.B.A.N.V.)**.
Agent: **Chrysco Flowers**, Cranbourne, VIC.

'Pink Reagan Mundo'
Application No: 2001/368 Accepted: 20 Mar 2002.
Applicant**: Chrysanthemum Breeders Association N.V. (C.B.A.N.V.)**.
Agent: **Chrysco Flowers**, Cranbourne, VIC.

'Ruby Red Reagan'
Application No: 2001/372 Accepted: 20 Mar 2002.
Applicant**: Chrysanthemum Breeders Association N.V. (C.B.A.N.V.)**.
Agent: **Chrysco Flowers**, Cranbourne, VIC.

'Sunny Elite Reagan'
Application No: 2001/366 Accepted: 20 Mar 2002.
Applicant**: Chrysanthemum Breeders Association N.V. (C.B.A.N.V.)**.
Agent: **Chrysco Flowers**, Cranbourne, VIC.

'Tripdee Reagan'
Application No: 2001/374 Accepted: 20 Mar 2002.
Applicant**: Chrysanthemum Breeders Association N.V. (C.B.A.N.V.)**.
Agent: **Chrysco Flowers**, Cranbourne, VIC.

'Vybowl'
Application No: 2001/375 Accepted: 20 Mar 2002.
Applicant**: Vyking Flowers B.V.**.
Agent: **Chrysco Flowers**, Cranbourne, VIC.

'White Elite Reagan'
Application No: 2001/367 Accepted: 20 Mar 2002.
Applicant**: Chrysanthemum Breeders Association N.V. (C.B.A.N.V.)**.
Agent: **Chrysco Flowers**, Cranbourne, VIC.

'White Reagan Mundo'
Application No: 2001/370 Accepted: 20 Mar 2002.
Applicant**: Chrysanthemum Breeders Association N.V. (C.B.A.N.V.)**.
Agent: **Chrysco Flowers**, Cranbourne, VIC.

'Yellow Reagan Mundo'
Application No: 2001/371 Accepted: 20 Mar 2002.
Applicant**: Chrysanthemum Breeders Association N.V. (C.B.A.N.V.)**.
Agent: **Chrysco Flowers**, Cranbourne, VIC.

Cicer arietinum
Chickpea

'Jimbour'
Application No: 2001/301 Accepted: 26 Mar 2002.
Applicant**: The State of Queensland through the Department of Primary Industries,** Brisbane, QLD, **Department of Agriculture for and on behalf of the State of New South Wales,** Orange, NSW **and Grains Research and Development Corporation**, Barton, ACT.

Cichorium intybus
Chicory

'Choice'
Application No: 2002/013 Accepted: 4 Mar 2002.
Applicant**: AgResearch Limited**.
Agent: **Denis McGrath**, Drumcondra, VIC.

'Puna II'
Application No: 2002/012 Accepted: 4 Mar 2002.
Applicant**: AgResearch Limited**.
Agent: **Denis McGrath**, Drumcondra, VIC.

Erigeron karvinskianus
Santa Barbara Daisy

'Spindrift'
Application No: 2002/070 Accepted: 26 Mar 2002.
Applicant**: Rumena Pty Ltd, Southern Advanced Plants Pty Ltd, Floriana Pty Ltd and Plantmark Pty Ltd**.
Agent: **Plants Management Australia Pty Ltd**, Wonga Park, VIC.

Euphorbia pulcherrima
Poinsettia

'Fisgala'
Application No: 2002/047 Accepted: 25 Mar 2002.
Applicant**: FLORA-NOVA Pflanzen GmbH**.
Agent: **Sprint Horticulture**, Erina, NSW.

'Fismille'
Application No: 2002/046 Accepted: 26 Mar 2002.
Applicant**: FLORA-NOVA Pflanzen GmbH**.
Agent: **Sprint Horticulture**, Erina, NSW.

'Fisvinci'
Application No: 2002/048 Accepted: 26 Mar 2002.
Applicant**: FLORA-NOVA Pflanzen GmbH**.
Agent: **Sprint Horticulture**, Erina, NSW.

Freesia hybrid
Freesia

'Varafoc' syn **Focus**
Application No: 2002/006 Accepted: 26 Mar 2002.
Applicant**: Van Staavaren B.V.**.
Agent: **FB Rice & Co**, Carlton South, VIC.

Gaura lindheimeri
Gaura

'Ellena'
Application No: 2002/031 Accepted: 4 Mar 2002.
Applicant**: M & H Parker's Wholesale Nursery**, Tahmoor, NSW.

Grevillea juniperina x *Grevillea victoriae*
Grevillea

'VJ66'
Application No: 2002/064 Accepted: 27 Mar 2002.
Applicant**: Australflora Pty Ltd**,Yarra Glen, VIC.

Grevillea lanigera x *Grevillea lavandulacea*
Grevillea

'CRO2'
Application No: 2002/065 Accepted: 27 Mar 2002.
Applicant**: Australflora Pty Ltd**,Yarra Glen, VIC.

Hebe hybrid
Hebe

'Magenta Cloud'
Application No: 2002/023 Accepted: 4 Mar 2002.
Applicant**: J. Van Niekerk**.
Agent: **Plants Management Australia Pty Ltd**,Wonga Park, VIC.

Impatiens flaccida x *Impatiens hawkeri*
Impatiens

'Balfaflav'
Application No: 2002/011 Accepted: 26 Mar 2002.
Applicant**: Ball FloraPlant – A Division of Ball Horticultural Company**.
Agent: **Ball Australia Pty Ltd**, Dandenong South, VIC.

'Balfafusia'
Application No: 2002/010 Accepted: 26 Mar 2002.
Applicant**: Ball FloraPlant – A Division of Ball Horticultural Company**.
Agent: **Ball Australia Pty Ltd**, Dandenong South, VIC.

Impatiens hawkeri
New Guinea Impatiens

'Balcebchro'
Application No: 2001/350 Accepted: 26 Mar 2002.
Applicant**: Ball FloraPlant – A Division of Ball Horticultural Company**.
Agent: **Oasis Horticulture Pty Ltd**, Winmalee, NSW.

Lamium maculatum
Spotted Dead Nettle

'Orchid Frost'
Application No: 2001/353 Accepted: 4 Mar 2002.
Applicant**: Michael A. Bovio**.
Agent: **Plants Management Australia Pty Ltd**, Wonga Park, VIC.

Lechenaultia hybrid
Lechenaultia

'Kings Park Madeline'
Application No: 2001/277 Accepted: 5 Mar 2002.
Applicant**: Botanic Gardens and Parks Authority**, West Perth, WA.

Lilium hybrid
Lily

'Brisbane'
Application No: 2002/001 Accepted: 26 Mar 2002.
Applicant**: Sande B.V.**.
Agent: **John Robb**, Kariong, NSW.

Mandevilla x*amabilis*
Mandevilla

'Rita Marie Green' syn **Parfait Passion Pink**
Application No: 2002/005 Accepted: 4 Mar 2002.
Applicant**: Monrovia Nursery Company**.
Agent: **Redlands Nursery Pty Ltd**, Redland Bay, QLD.

Medicago sativa
Lucerne

'Siriver Mk II'
Application No: 2002/050 Accepted: 26 Mar 2002.

Applicant**: Wilandra Pty Ltd as Trustee for the Lake Family Trust, trading as Pristine ForageTechnologies**, Daw Park, SA.

Michelia yunnanensis
Michelia

'Velvet and Cream'
Application No: 2002/007 Accepted: 26 Mar 2002.
Applicant**: Mr Peter Cave**.
Agent: **Mr Leo Koelewyn & Mr Andrew Raper**, Monbulk, VIC.

Pelargonium peltatum x *Pelargonium (hortorum*
Pelargonium

'Balgalsofi' syn **Galleria Snowfire**
Application No: 2001/362 Accepted: 26 Mar 2002.
Applicant**: Ball FloraPlant – A Division of Ball Horticultural Company**.
Agent: **Oasis Horticulture Pty Ltd**, Winmalee, NSW.

Pelargonium xhortorum
Pelargonium

'Balsholila' syn **Light Lavender Showcase**
Application No: 2001/363 Accepted: 26 Mar 2002.
Applicant**: Ball FloraPlant – A Division of Ball Horticultural Company**.
Agent: **Oasis Horticulture Pty Ltd**, Winmalee, NSW.

Pittosporum tenuifolium
Pittosporum

'MAN89'
Application No: 2002/004 Accepted: 26 Mar 2002.
Applicant**: D & A Mansfield & Sons Pty Ltd**, Carrum Downs, VIC.

Prunus avium
Sweet Cherry

'Santina'
Application No: 2001/159 Accepted: 11 Mar 2002.
Applicant**: Her Majesty the Queen in Right of Canada as represented by the Minister of Agriculture and Agri-Food Canada**.
Agent: **Fleming's Nurseries & Associates Pty Ltd**, Monbulk, VIC.

'Skeena'
Application No: 2001/156 Accepted: 8 Mar 2002.
Applicant**: Her Majesty the Queen in Right of Canada as represented by the Minister of Agriculture and Agri-Food Canada**.
Agent: **Fleming's Nurseries & Associates Pty Ltd**, Monbulk, VIC.

'Sonnet'
Application No: 2001/158 Accepted: 11 Mar 2002.
Applicant**: Her Majesty the Queen in Right of Canada as represented by the Minister of Agriculture and Agri-Food Canada**.
Agent: **Fleming's Nurseries & Associates Pty Ltd**, Monbulk, VIC.

'Sumleta' syn **Sonata**
Application No: 2001/157 Accepted: 11 Mar 2002.
Applicant**: Her Majesty the Queen in Right of Canada as represented by the Minister of Agriculture and Agri-Food Canada**.
Agent: **Fleming's Nurseries & Associates Pty Ltd**, Monbulk, VIC.

Prunus persica
Peach

'Golden 8'
Application No: 2002/017 Accepted: 26 Mar 2002.
Applicant**: Mr Don Attana**.
Agent: **Fleming's Nurseries & Associates Pty Ltd**, Monbulk, VIC.

Prunus persica var. *nucipersica*
Nectarine

'August Fire' syn **August Flame**
Application No: 2002/054 Accepted: 27 Mar 2002.
Applicant**: Norman Waldner & Michael Waldner**.
Agent: **Buchanan's Nursery**, Hodgson Vale, QLD.

'Grand Sweet' syn **Grand Gold**
Application No: 2002/056 Accepted: 27 Mar 2002.
Applicant**: Lowell G Bradford and Norman G Bradford**.
Agent: **Buchanan's Nursery**, Hodgson Vale, QLD.

'Kay Sweet' syn **Kay Gold**
Application No: 2002/057 Accepted: 27 Mar 2002.
Applicant**: Lowell G Bradford and Norman G Bradford**.
Agent: **Buchanan's Nursery**, Hodgson Vale, QLD.

'Regal Pearl' syn **Regal Ice**
Application No: 2002/055 Accepted: 27 Mar 2002.
Applicant**: Lowell G Bradford and Norman G Bradford**.
Agent: **Buchanan's Nursery**, Hodgson Vale, QLD.

Rosa hybrid
Rose

'Ausencart'
Application No: 2002/076 Accepted: 26 Mar 2002.
Applicant**: David Austin Roses Ltd**.
Agent: **Siebler Publishing Services**, Hartwell, VIC.

'Ausjake'
Application No: 2002/071 Accepted: 26 Mar 2002.
Applicant**: David Austin Roses Ltd**.
Agent: **Siebler Publishing Services**, Hartwell, VIC.

'Auskeppy'
Application No: 2002/075 Accepted: 26 Mar 2002.
Applicant**: David Austin Roses Ltd**.
Agent: **Siebler Publishing Services**, Hartwell, VIC.

'Ausquest'
Application No: 2002/073 Accepted: 26 Mar 2002.
Applicant**: David Austin Roses Ltd**.
Agent: **Siebler Publishing Services**, Hartwell, VIC.

'Ausromeo'
Application No: 2002/072 Accepted: 26 Mar 2002.
Applicant**: David Austin Roses Ltd**.
Agent: **Siebler Publishing Services**, Hartwell, VIC.

'Austilly'
Application No: 2002/077 Accepted: 26 Mar 2002.
Applicant**: David Austin Roses Ltd**.
Agent: **Siebler Publishing Services**, Hartwell, VIC.

'Ausufo'
Application No: 2002/074 Accepted: 26 Mar 2002.
Applicant**: David Austin Roses Ltd**.
Agent: **Siebler Publishing Services**, Hartwell, VIC.

'Internatro'
Application No: 2001/356 Accepted: 5 Mar 2002.
Applicant**: Interplant B.V.**.
Agent: **Grandiflora Nurseries Pty Ltd**, Cranbourne, VIC.

'Noalesa' syn **Gold Ground Cover**
Application No: 2002/003 Accepted: 26 Mar 2002.
Applicant**: Reinhard Noack**.
Agent: **Flower Carpet Pty Ltd**, Silvan, VIC.

Saccharum hybrid
Sugarcane

'Argos'
Application No: 2002/034 Accepted: 4 Mar 2002.
Applicant**: CSR Ltd**.
Agent: **Bureau of Sugar Experiment Stations**, Bundaberg, QLD.

'Mida'
Application No: 2002/035 Accepted: 4 Mar 2002.
Applicant**: CSR Ltd**.
Agent: **Bureau of Sugar Experiment Stations**, Bundaberg, QLD.

'Q196'
Application No: 2002/025 Accepted: 4 Mar 2002.
Applicant**: Bureau of Sugar Experiment Stations**, Bundaberg, QLD.

'Q197'
Application No: 2002/026 Accepted: 4 Mar 2002.
Applicant**: Bureau of Sugar Experiment Stations**, Bundaberg, QLD.

'Q198'
Application No: 2002/027 Accepted: 4 Mar 2002.
Applicant**: Bureau of Sugar Experiment Stations**, Bundaberg, QLD.

'Q199'
Application No: 2002/028 Accepted: 4 Mar 2002.
Applicant**: Bureau of Sugar Experiment Stations**, Bundaberg, QLD.

'Q200'
Application No: 2002/029 Accepted: 4 Mar 2002.
Applicant**: Bureau of Sugar Experiment Stations**, Bundaberg, QLD.

'Q201'
Application No: 2002/030 Accepted: 4 Mar 2002.
Applicant**: Bureau of Sugar Experiment Stations**, Bundaberg, QLD.

Triticum aestivum
Wheat

'Stylet'
Application No: 2002/015 Accepted: 6 Mar 2002.
Applicant**: The University of Adelaide**, Adelaide, SA.

Triticum turgidum var. *turgidum*
Durum Wheat

'CRDW 24'
Application No: 2001/355 Accepted: 26 Mar 2002.
Applicant**: New Zealand Institute for Crop & Food Research Ltd**.
Agent: **Heritage Seeds Pty Ltd**, Mulgrave, VIC.

Verbena hybrid
Verbena

'Radiance Magenta'
Application No: 2002/036 Accepted: 27 Mar 2002.
Applicant**: Charles Beresford Pretorius Jobling**.
Agent: **Plants Management Australia Pty Ltd**,Wonga Park, VIC.

'Radiance Red'
Application No: 2002/038 Accepted: 27 Mar 2002.
Applicant**: Charles Beresford Pretorius Jobling**.
Agent: **Plants Management Australia Pty Ltd**, Wonga Park, VIC.

'Waterblue'
Application No: 2002/037 Accepted: 27 Mar 2002.
Applicant**: Charles Beresford Pretorius Jobling**.
Agent: **Plants Management Australia Pty Ltd**, Wonga Park, VIC.

Veronica spicata
Veronica

'Glory' syn **Royal Candles**
Application No: 2002/022 Accepted: 26 Mar 2002.
Applicant**: Heather & Mike Philpott**.
Agent: **Plants Management Australia Pty Ltd**, Wonga Park, VIC.

Zantedeschia sprengeri
Zantedeschia/Calla Lily

'Schwarzwalder' syn **Black Forest**
Application No: 2002/002 Accepted: 26 Mar 2002.
Applicant**: Sande B.V.**.
Agent: **John Robb**, Kariong, NSW.

Zoysia japonica
Zoysia Grass

'Palisades'
Application No: 2001/199 Accepted: 26 Mar 2002.
Applicant**: The Texas A&M University System**.
Agent: **Pizzeys Patent and Trade Mark Attorneys**, Brisbane, QLD.

VARIETY DESCRIPTIONS

Key to definitions/symbols/words used in the detailed descriptions

*	=	Variety used as comparator
Agent	=	Australian agent acting on behalf of an applicant (often where application is from overseas).
ca.	=	about
CPVO	=	Community Plant Variety Office
DMRT	=	Duncan's Multiple Range Test
DUS	=	Distinctiveness, Uniformity and Stability
Hyphened colours	=	A hyphen (-) between two different colours (eg. greyed-green) designates an intermediate colour between those two colours, where possible the RHS colour chart reference is also given.
LSD	=	Least Significant Difference
LSD/sig	=	The numerical value for the LSD (at P≤0.01) is in the first column and the level of significance between the candidate and the relevant comparator in subsequent columns
PBR	=	Plant Breeder's Rights
PBRO	=	Plant Breeder's Rights Office
PVRO	=	Plant Variety Rights Office
PVJ	=	Plant Varieties Journal
n/a	=	Not available
ns	=	Not significant
RHS	=	Royal Horticultural Society Colour Chart (Chip Number). The year following RHS indicates the edition.
std deviation	=	Standard deviation of the sample
syn	=	synonym
UPOV	=	International Union for the Protection of New Plant Varieties
+	=	When used in conjunction with an RHS colour, '+' indicates a notional extension of a colour series when a precise match can not be made. It is most commonly used when the adjacent colour chip(s) are of a different sequence
#	=	Values followed by the same letter are not significantly different at P≤0.01
Origin	=	Unless otherwise stated the female parent of the cross precedes the male parent
S-N-K test	=	Student-Newman-Keuls test
(Þ	=	Variety(s) for which PBR has been granted in Australia.

Aglaonema hybrid
Aglaonema

'Glory of India'

Application No: 2001/134 Accepted: 13 Aug 2001.
Applicant: **Parthasarathy Mukundan and Gopalaswamy Parthasarathy**, Bangalore, India.
Agent: **Tanah Kita Nurseries (QLD)**, Pimpama, QLD.

Characteristics (Figure 20) Plant: growth habit bushy, density very compact, height medium, number of basal shoots numerous, main stem diameter small, main stem colour green. Leaf blade: undulation of margin weak, approximate length small to medium (19 to 25cm), approximate width medium (5 to 8cm), shape narrow lanceolate, shape of apex acuminate, shape of base obtuse to cordate, main colour on upper side of main vein yellow-green (RHS 147A), secondary colour on upper side of main vein yellow green group (RHS 145A), type of variegation 'type 7', number of colours of blade tri-colour, colour darkens with maturity, new leaf adaxial surface; background colour yellow-green (ca. RHS 145A-B), secondary colour of (mainly margin) green (RHS 143A-B), tertiary colour random spots of light green (RHS 143 D), new leaf abaxial surface; main colour yellow-green (RHS 144B-C), secondary colour none, mature leaf adaxial surface; background colour yellow-green (RHS 147B) but seems somewhat silvery, secondary colour mainly on margin darker yellow-green (RHS 147A), tertiary colour random spots of grey-green (RHS 189 A), mature leaf abaxial surface; main colour yellow-green (RHS 147 B), secondary colour lighter yellow-green (RHS 147 C-D). Petiole: approximate length 11cm, approximate wing length 8.5cm, number of colours two, main colour green (RHS 138B), secondary colour various white spots (RHS 155D) resulting in marbling effect. Petiole wing: colour same as petiole. (Note: All RHS colour chart numbers refer to 1995 edition.)

Origin and Breeding Controlled pollination: seed parent *Aglaonema commutatum* 'Malay Lady' x pollen parent *Aglaonema crispum* 'Dow hybrid' in a planned breeding program in Bangalore, India. Both parents are characterised by bi-colour leaves. The hybrid is characterised by tri-colour leaves, dark green margin and light green or silvery background colour and numerous grey green spots, profuse branching and quick growth. It was vegetatively propagated through several generations and was found to be stable and distinct. Selection criteria: tri-colour leaves with two shades of green and white spots, enormous branching and filling of pots, quick growing and cold tolerant. Propagation: vegetatively propagated through cuttings. Breeders: Parthasarathy Mukundan and Gopalaswamy Parthasarathy, Bangalore, India.

Choice of Comparators Grouping characteristic used in identifying the most similar varieties of common knowledge was based on UPOV TG/132/4 – Leaf blade: type of variegation 'type 7'. On this basis, 'Silver Queen' is considered as the most similar variety of common knowledge. The candidate variety differs from 'Silver Queen' in the following combination of characteristics: smaller and narrower lanceolate leaves; leaf petioles mottled and marble white; tri-colour leaves as against bi-colour leaves. Parental varieties were not included for reasons stated above.

Comparative Trial The description is based on overseas data gathered from US Plant Patent 10, 658 dated 20 Oct 1998 in conjunction with characteristics verified under Australian conditions. Australian Trial Location: Tanah Kita Nurseries, Pimpama, QLD for colour coding and measurement confirmation. The variety was also evaluated against another PBR trial in Wellington Point, QLD, which included a wide range of *Aglaonemas*.

Prior Applications and Sales

Country	Year	Status	Name Applied
USA	1997	Granted	'Jewel of India'

First sold in USA in Aug 1998. First Australian sales Nil.

Description: **Deo Singh,** Ornatec Pty Ltd**,** QLD.

'Star of India'

Application No: 2001/135 Accepted: 13 Aug 2001.
Applicant: **Parthasarathy Mukundan and Gopalaswamy Parthasarathy**, Bangalore, India.
Agent: **Tanah Kita Nurseries (QLD)**, Pimpama, QLD.

Characteristics (Figure 20) Plant: growth habit bushy, density compact, height medium, number of basal shoots numerous, main stem diameter small, main stem colour green. Leaf blade: undulation of margin weak to medium, approximate length medium (28 to 31cm), approximate width medium (8 to 10cm), shape lanceolate, shape of apex acuminate, shape of base obtuse, main colour on upper side of main vein white (RHS 155D), secondary colour on upper side of main vein green (RHS 138B), type of variegation 'type 7', number of colours of blade tri-colour, colour darkens with maturity, new leaf adaxial surface; background colour green (ca. RHS 137C-D), secondary colour of (mainly margin) green (RHS 137A-C), tertiary colour white spots (RHS 155D), new leaf abaxial surface; main colour green (RHS 138B-C), secondary colour random white spots (RHS 155 D), mature leaf adaxial surface; background colour (mainly margins) dark green (RHS 139A), secondary colour diffuse patches of light green (RHS 138 B), tertiary colour white spots (RHS 155 D), mature leaf abaxial surface; main colour green (RHS 138 A), secondary colour white spots (RHS 155 D). Petiole: approximate length 8cm, approximate wing length 6cm, number of colours two, main colour green (RHS 138B), secondary colour random white spots (RHS 155D). Petiole wing: colour same as petiole. (Note: All RHS colour chart numbers refer to 1995 edition.)

Origin and Breeding Controlled pollination: seed parent (*Aglaonema* hybrid 'Manila' x *Aglaonema commutatum* 'Elegans') x pollen parent *Aglaonema costatum* unnamed variety in a planned breeding program in Bangalore, India. Both parents in the first cross are characterised by bi-coloured leaves. The pollen parent in the second cross is characterised by small cordate leaves. The hybrid is characterised by tri-coloured leaves, dark green margin and light green diffuse patches and numerous white spots, profuse branching and quick growth. It was vegetatively propagated through several generations and was found to be stable and distinct. Selection criteria: tri-coloured leaves with two shades of green and white spots, enormous branching and filling of pots, quick growing and cold tolerant. Propagation: vegetatively propagated through cuttings. Breeders: Parthasarathy Mukundan and Gopalaswamy Parthasarathy, Bangalore, India.

Choice of Comparators Grouping characteristic used in identifying the most similar varieties of common knowledge was based on UPOV TG/132/4 – Leaf blade: type of variegation 'type 7'. On this basis, 'Silver Queen' is considered as the most similar variety of common knowledge. The candidate variety differs from 'Silver Queen' in the following combination of characteristics: larger lanceolate leaves; leaves with a distinct white mid-rib; tri-colour leaves as against bi-colour leaves. Parental varieties were not included for reasons stated above.

Comparative Trial The description is based on overseas data gathered from US Plant Patent 10, 658 dated 20 Oct 1998 in conjunction with characteristics verified under Australian conditions. Australian Trial Location: Tanah Kita Nurseries, Pimpama, QLD for colour coding and measurement confirmation. The variety was also evaluated against another PBR trial in Wellington Point, QLD, which included a wide range of *Aglaonemas*.

Prior Applications and Sales

Country	Year	Status	Name Applied
USA	1997	Granted	'Emerald Star'

First sold in USA in Aug 1998. First Australian sales Nil.

Description: **Deo Singh,** Ornatec Pty Ltd**,** QLD.

Argyranthemum frutescens
Marguerite Daisy

'Cosupri'

Application No: 2000/260 Accepted: 14 Feb 2001.
Applicant: **NuFlora International Pty Ltd**, Macquarie Fields, NSW.

Characteristics (Table 1, Figure 13) Plant: growth habit semi-erect, size compact, height short. Stem: branching multi-basal. Leaves: arrangement alternate, petiole absent (sessile), margin bipinnatisect, length medium (70.80mm), width medium (28.70mm), ratio length to width medium (mean 2.58), colour of adaxial surface green (RHS 137A); abaxial surface yellow-green (RHS 147B). Leaf lobe: stem width above first and below second lobe narrow (mean 2.45mm), margin pinnatisect, tip acuminate. Inflorescence: form ligulate capitulum, diameter medium (mean 38.86mm). Ray floret: number medium (mean 28), arrangement regular, colour white (RHS 155D). Flowering time: early. Flowering habit: continuous. (Note: RHS colour chart numbers refer to 1995 edition.)

Origin and Breeding Controlled pollination: seed parent X96.14.29.1 x pollen parent 'Compacta' in a planned breeding program. The seed parent is a breeding line distinguished by finer foliage and more compact growth habit. The pollen parent is distinguished by grey foliage. Hybridisation took place in Cobbitty, NSW, in 1997. From this cross, seedling number 97.1071.1 was chosen in 1997 on the basis of flower type, flower colour and growth habit. Selection criteria: flower colour, flower form, leaf colour and plant growth habit. Propagation: 'Cosupri' has been propagated through ten (10) generations and no off types have been observed. It is commercially propagated by vegetative cuttings. Breeder: Dr. Thomas Cunneen, Buxton, NSW.

Choice of Comparators Grouping characteristics used in identifying the most similar varieties of common knowledge were – Inflorescence: form ligulate and Ray floret: colour white. On the basis of these grouping

characteristics 'Single White' was included in the trial. No other varieties of common knowledge have been identified that fit in to the grouping characteristic. The parents were not included for reasons stated above.

Comparative Trial Location: Plant Breeding Institute, Cobbitty, NSW (Latitude 35º06′ South, elevation 70m), spring 2001. Conditions: trial conducted in raised garden beds in open. All plants were started from plugs, transplanted to 10cm pots on Aug 15 and planted in raised beds on Oct 3. Beds were drip irrigated as required; no treatments were needed for pests or diseases. Nutrition was maintained with slow release fertiliser. Trial design: 20 plants of 'Cosupri' and 10 plants of the 'Single White' were arranged in a completely randomised design. Measurements: taken from 10 random 'Cosupri' plants and from each of the comparators.

Prior Applications and Sales

Country	Year	Current Status	Name Applied
New Zealand	2000	Granted	'Cosupri'
Canada	2000	Applied	'Cobrey'
USA	2000	Applied	'Cobrey'

First sold in Australia in Aug 1999.

Description: **John Oates,** VF Solutions, Tuross Head, NSW.

Table 1 *Argyranthemum* varieties

	'Cosupri'	*'SingleWhite'
PLANT HEIGHT (cm)		
mean	28	43
std deviation	1.95	1.88
LSD/sig	2.28	P≤0.01
LEAF LENGTH / WIDTH RATIO		
mean	2.58	2.15
std deviation	0.37	0.83
LSD/sig	0.82	ns
LEAF LOBE: STEM WIDTH – above first and below second lobe (mm)		
mean	2.45	4.42
std deviation	0.50	0.45
LSD/sig	0.39	P≤0.01
INFLORESCENCE DIAMETER (mm)		
mean	38.86	35.25
std deviation	1.76	2.81
LSD/sig	2.21	P≤0.01
RAY FLORET NUMBER		
mean	28	18
std deviation	3.62	2.20
LSD/sig	3.57	P≤0.01
LEAF COLOUR (RHS 1995)		
adaxial	137A	137B
abaxial	147B	147B
INFLORESCENCE COLOUR (RHS 1995)		
disk floret colour	14A	15A
ray floret colour	155D	155D

Boronia heterophylla x *Boronia megastigma*
Boronia

'Purple Jared'

Application No: 1999/335 Accepted: 9 Dec 1999.
Applicant: **The University of Western Australia**, Crawley, WA.

Characteristics (Table 2, Figure 34) Plant: height tall, habit bushy, vigour strong. Leaf: length medium. Flowering time: early. Flower: shape flared bell-shaped, diameter large. Petal: shape of tip pointed, length long. Outer petal: colour red-purple (RHS 71A). Inner petal: main colour red-purple (RHS 71A), base colour green-white (RHS 157A). Anther: colour black. Stigma: shape squat cone-shaped, colour medium brown. (Note: all RHS colour chart numbers refer to 1986 edition.)

Origin and breeding Controlled pollination: seed parent *B. heterophylla* 'Red' x *B. megastigma* 'Brown Boronia' at Sunglow Flowers farm, Oldbury, WA. The seed parent is characterised by dark pink inner and outer petal colour. The pollen parent is characterised by brown outer petal colour and yellow inner petal colour. Hybridisation undertaken on 19-26 Sep 1995, fruit harvested 5 weeks after pollination and the resultant embryos were put into tissue culture, germinated, sub-cultured, deflasked and planted out in pots in 1996. 'Purple Jared' was selected from one of the embryos' tissue cultured plantlets after flowering in Sep 1997. All 'Purple Jared' plantlets were found to be uniform and stable. The plantlets were further vegetatively propagated from cuttings in Jul 99. All plants were found to be uniform and stable. Selection criteria: early flowering time, large perfumed purple flowers, strong plant vigour. Propagation: embryo rescue, tissue culture, cutting. Breeder: University of Western Australia.

Choice of Comparators The two parents *B. heterophylla* and *B. megastigma* were considered as the most similar varieties. No other varieties of *Boronia* have similar purple flowers.

Comparative Trial Location: Sunglow Flowers farm, Oldbury, WA. Conditions: plants propagated by cuttings and planted in open field of sandy soil with drip irrigation and fertigation. Trial design: 15 plants of each variety of same age and given identical conditions. Measurements: made on 20 typical organs from all plants.

Prior Application and Sales Nil.

Description: **Philip Watkins**, Sunglow Flowers Pty Ltd, Perth, WA.

Table 2 *Boronia* varieties

	'Purple Jared'	*Boronia megastigma	*Boronia heterophylla
PLANT VIGOUR	strong	weak-medium	medium
PLANT HEIGHT	tall	short-medium	medium-tall

Table 2 continued

LEAF LENGTH (mm)			
mean	19.88	13.15	49.50
std deviation	1.64	0.86	2.89
LSD/sig	1.46	P≤0.01	P≤0.01
FIRST FLOWERING (date)			
	15 Sep	28 Aug	25 Sep
	early	very early	medium
FLOWER SHAPE			
	flared bell-shaped	rounded bell-shaped	tapered bell-shaped
FLOWER DIAMETER (mm)			
mean	11.75	8.85	6.95
std deviation	0.72	0.59	0.67
LSD/sig	0.49	P≤0.01	P≤0.01
PETAL TIP SHAPE			
	pointed	rounded	pointed
PETAL LENGTH (mm)			
mean	9.05	7.03	8.88
std deviation	0.43	0.30	0.48
LSD/sig	0.30	P≤0.01	ns
OUTER PETAL COLOUR (RHS, 1986)			
	71A purple	166A brown	57B dark pink
INNER PETAL MAIN COLOUR (RHS, 1986)			
	71A purple	7A yellow	57B dark pink
INNER PETAL BASE COLOUR (RHS, 1986)			
	157A green-white	151B yellow-green	58B dark pink
STIGMA SHAPE			
	squat cone-shaped	squat cone-shaped	elongated cone-shaped
STIGMA COLOUR			
	medium brown	dark brown	green

Bracteantha bracteata
Everlasting Daisy

'NN-9812AA'

'Application No: 2000/236 Accepted: 21 Aug 2000.
Applicant: **Oasis Horticulture Pty Ltd,** Winmalee, NSW.

Characteristics (Table 3, Figure 28) Plant: type bushy, growth habit (bushy types only) erect, height short, density dense. Stem hairiness slightly hairy. Leaf: length short (mean 99.3mm), width very narrow to narrow (mean 12mm), ratio length/width (mean 8.3), position of broadest part at midpoint, shape of apex acute, variegation absent, main colour of upper side yellow -green (RHS 147A), hairiness of upper side slightly hairy, hairiness of lower side slightly hairy, undulation of margin absent. Flower shoot: length (mean 94.5mm), branching absent. Flower bud: lateral view of apex pointed, main colour greyed-orange (RHS 166B). Flower head: predominant position in relation to foliage level, diameter very small to small (mean 36.2mm), lateral view of lower part concave, lateral view of upper part concave, number of bracts medium to many. Involucre: number of colours more than one, main colour yellow-orange (ca RHS 17A/23A). Bract: length short to medium (mean 12.9mm), bract width medium (mean 4.6mm), main colour of lower third of bract from inner third of involucre yellow (RHS 6A), main colour of middle third of bract from inner third of involucre yellow -orange (RHS 17A), main colour of upper third of bract from inner third of involucre yellow-orange (RHS 23A), main colour of apex of bract from inner third of involucre yellow-orange (RHS 23A), main colour of lower third of bract from middle third of involucre yellow (RHS 6A), main colour of middle third of bract from middle third of involucre yellow-orange (RHS 17A/23A), main colour of upper third of bract from middle third of involucre yellow-orange (RHS 17A/23A), main colour of apex of bract from middle third of involucre greyed-orange (RHS 169A), main colour of lower third of bract from outer third of involucre yellow-white (RHS 158B), main colour of middle third of bract from outer third of involucre greyed-orange (RHS 164B), main colour of upper third of bract from outer third of involucre greyed-orange (RHS 171A), main colour of apex of bract from outer third of involucre greyed -orange (RHS 172A). Pappus: colour yellow. (All RHS colour chart numbers refer to 1986 edition.)

Origin and Breeding Controlled pollination: seed parent 'Nullabor Flame' x pollen parent 'Diamond Head' in a planned breeding program in Winmalee, NSW. The seed parent is characterised by red (RHS 46A) bract colour and tall plant height. The pollen parent is characterised by semi-prostrate plant habit and low bract number. 'NN-9812AA' was selected from the seedling progeny of this cross in Aug 1998 at Winmalee, NSW. Selection criteria: flower colour, compact plant habit, ease of propagation, vigour. Propagation: vegetative tip cuttings. 'NN-9812AA' has been found to be uniform and stable through many generations since selection. Breeder: Dr. Matthew Turner, Winmalee, NSW.

Choice of Comparators Grouping characteristics used in identifying the most similar varieties of common knowledge were-: Plant: type bushy, habit erect, height short. Leaf: length short, width very narrow to narrow. Flower bud: lateral view of apex pointed, main colour greyed-orange. Flower head: number of bracts medium to many, head diameter very small to small. Involucre: number of colours more than one, main colour yellow orange. On the basis of these grouping characteristics the following varieties were included in the trial: 'Sunraysia Splendour'(Φ) and 'Coolgardie Gold' (Φ). The varieties 'Diamond Head', 'Gold 'N' Bronze', and 'Nullabor Flame' were also considered but later excluded because they do not fit within the grouping characteristics stated above. The parental lines were not included because they can be clearly distinguishable by their plant height and bract colour or plant habit and bract number.

Comparative Trial Comparators: Location: Winmalee, NSW, Apr – Jul 2001. Conditions: trial conducted in heated/ventilated polyhouse, rooted cuttings (propagated from stock plants grown at Winmalee) potted in May into 150mm standard pots in commercial potting mix, nutrients supplied by slow release and liquid feed fertiliser applications, plant protection treatments applied as necessary. Trial design: 15 pots of each variety arranged in a completely randomised design. Measurements taken from 10 plants per variety selected at random (one sample per plant).

Prior Applications and Sales

No prior applications. First sold in Australia in Aug 2000.

Description: **Tim Angus**, Tim Angus Horticulture, Wellington, NZ.

'NN-9812AE'

Application No: 1999/318 Accepted: 21 Dec 1999.
Applicant: **Oasis Horticulture Pty Ltd,** Winmalee, NSW.

Characteristics (Table 3, Figure 28) Plant: type bushy, growth habit (bushy types only) erect, height short, density dense. Stem: hairiness strongly hairy. Leaf: length short (mean 107.1mm), width very narrow to narrow (mean 13.7mm), ratio length/width mean 7.9, position of broadest part at midpoint, shape of apex acute, variegation absent, main colour of upper side yellow-green (ca RHS 146A), hairiness of upper side slightly hairy, hairiness of lower side slightly hairy, undulation of margin absent. Flower shoot: length mean 102.8mm, branching absent. Flower bud: lateral view of apex pointed, main colour yellow (RHS 2B). Flower head: predominant position in relation to foliage below, diameter very small to small (mean 34mm), lateral view of lower part concave, lateral view of upper part concave, number of bracts medium to many. Involucre: number of colours more than one, main colour yellow (ca RHS 6A). Bract: length short to medium (mean 12.5mm), bract width medium (mean 5.0mm), main colour of lower third of bract from inner third of involucre yellow (RHS 6B), main colour of middle third of bract from inner third of involucre yellow (RHS 6A), main colour of upper third of bract from inner third of involucre yellow (RHS 9A), main colour of apex of bract from inner third of involucre yellow (RHS 9A), main colour of lower third of bract from middle third of involucre yellow (RHS 6B), main colour of middle third of bract from middle third of involucre yellow (RHS 6A), main colour of upper third of bract from middle third of involucre yellow (RHS 7A), main colour of apex of bract from middle third of involucre greyed-orange (RHS 168A), main colour of lower third of bract from outer third of involucre greyed-yellow (RHS 161D), main colour of middle third of bract from outer third of involucre greyed-orange (RHS 163C), main colour of upper third of bract from outer third of involucre greyed-orange (RHS 172A), main colour of apex of bract from outer third of involucre greyed-orange (RHS 172A). Pappus: colour yellow. (All RHS colour chart numbers refer to 1986 edition.)

Origin and Breeding Controlled pollination: seed parent breeding line accession "E" x pollen parent breeding line accession "B" in a planned breeding program in Winmalee, NSW. The seed parent is characterised by red (RHS 46A) bract colour and tall plant height. The pollen parent is characterised by low bract number. 'NN-9812AE' was selected from the seedling progeny of this cross in Aug 1998 at Winmalee, NSW. Selection criteria: flower colour, compact plant habit, ease of propagation, vigour. Propagation: vegetative tip cuttings. 'NN-9812AE' has been found to be uniform and stable through many generations since selection. Breeder: Dr. Matthew Turner, Winmalee, NSW

Choice of Comparators Grouping characteristics used in identifying the most similar varieties of common knowledge were:- Plant: type erect, habit bushy, height short. Leaf: length short, width very narrow to narrow. Flower bud: lateral view of apex pointed, main colour yellow. Flower head: number of bracts medium to many, head diameter very small to small. Involucre: number of colours more than one, main colour yellow. On the basis of these grouping characteristics the following varieties were included in the trial: 'Sunraysia Splendour'(D), 'Coolgardie Gold'(D). The varieties 'Diamond Head' and 'Gold 'N' Bronze' were also considered but later excluded because they do not fit within the grouping characteristics stated above. The parental lines were not included because they can be clearly distinguishable by their plant height and bract colour or bract number.

For the purpose of providing evidence of breeding, the parent material can be clearly distinguished from the candidate variety using the grouping characteristics: Plant: height; Flower bud: bract number; Bract: colour.

Comparative Trial Comparators: Location: Winmalee, NSW, Apr – Jul 2001. Conditions: trial conducted in heated/ventilated polyhouse, rooted cuttings (propagated from stock plants grown at Winmalee) potted in May into 150mm standard pots in commercial potting mix, nutrients supplied by slow release and liquid feed fertiliser applications, plant protection treatments applied as necessary. Trial design: 15 pots of each variety arranged in a completely randomised design. Measurements taken from 10 plants per variety selected at random (one sample per plant).

Prior Applications and Sales

No prior applications. First sold in Australia in Aug 2000.

Description: prepared by **Tim Angus**, Tim Angus Horticulture, Wellington, NZ.

Table 3 *Bracteantha* varieties

	'NN-9812AA'	**'NN-9812AE'**	***'Coolgardie Gold'ϕ**	***'Sunraysia Splendour'ϕ**
PLANT: DENSITY				
	dense	dense	medium	dense
STEM: HAIRINESS				
	slightly hairy	strongly hairy	slightly hairy	strongly hairy
LEAF: LENGTH (mm) LSD (P≤0.01) = 16.3				
mean	99.3[a]	107.1[a]	131.2[b]	145.7[b]
std deviation	12.5	9.5	15.6	15.2
LEAF: WIDTH (mm) LSD (P≤0.01) = 4.1				
mean	12[a]	13.7[a]	22.0[b]	29.5[c]
std deviation	1.3	2.0	3.3	5.3
LEAF: RATIO LENGTH TO WIDTH LSD (P≤0.01) = 1.1				
mean	8.3[a]	7.9[a]	6.0[b]	5.1[b]
std deviation	0.8	1.0	0.7	0.9
LEAF: POSITION OF BROADEST PART				
	at midpoint	above midpoint	above midpoint	above midpoint
LEAF: MAIN COLOUR OF UPPER SIDE (RHS, 1986)				
	yellow-green 147A	yellow-green 146A	green 137A	green 137A
LEAF: HAIRINESS OF UPPER SIDE				
	slightly hairy	slightly hairy	absent	very hairy
LEAF: HAIRINESS OF LOWER SIDE				
	slightly hairy	slightly hairy	slightly hairy	very hairy
LEAF: UNDULATION OF MARGIN				
	absent or v. weak	absent or v. weak	absent or v. weak	weak
FLOWER SHOOT: LENGTH (mm) LSD (P≤0.01) = 18.5				
mean	94.5[a]	102.8[a]	91.7[a]	241.8[b]
std deviation	10.2	19.5	11.4	17.7
FLOWER BUD: LATERAL VIEW OF APEX				
	pointed	pointed	rounded	pointed
FLOWER BUD: MAIN COLOUR (RHS, 1986)				
	greyed-orange 166B	yellow 2B	greyed-orange 163A	greyed-orange 163A
FLOWER HEAD: PREDOMINANT POSITION IN RELATION TO FOLIAGE				
	level	below	level	above
FLOWER HEAD: DIAMETER (mm) LSD (P≤0.01) = 2.4				
mean	36.2[a]	34[a]	55.1[b]	46.8[b]
std deviation	1.0	1.7	2.5	2.2
FLOWER HEAD: LATERAL VIEW OF LOWER PART				
	concave	concave	convex	concave
FLOWER HEAD: NUMBER OF BRACTS				
	medium to many	medium to many	medium	medium
INVOLUCRE: MAIN COLOUR (RHS, 1986)				
	yellow-orange 17A/23A	yellow 6A	yellow 3A	yellow 7A/12A

BRACT: LENGTH (mm) LSD (P≤0.01) = 0.9				
mean	12.9[a]	12.5[a]	17.1[b]	17.8[b]
std deviation	0.6	0.5	1.0	0.7
BRACT: WIDTH (mm) LSD (P≤0.01) = 0.8				
mean	4.6[a]	5.0[b]	4.7[ab]	5.5[b]
std deviation	0.6	0.6	0.7	0.8
BRACT: MAIN COLOUR OF INNER THIRD OF INVOLUCRE (RHS, 1986)				
Lower third of bract	yellow 6A	yellow 6B	yellow 2A	yellow 5A
Middle third of bract	yellow-orange 17A	yellow 6A	yellow 3A	yellow 7A
Upper third of bract	yellow-orange 23A	yellow 9A	yellow 5A	yellow 12A
Apex of bract	yellow-orange 23A	yellow 9A	yellow 5A	yellow 12A
BRACT: MAIN COLOUR OF MIDDLE THIRD OF INVOLUCRE (RHS, 1986)				
Lower third of bract	yellow 6A	yellow 6B	yellow 2A	yellow 5A
Middle third of bract	yellow-orange 17A/23A	yellow 6A	yellow 3A	yellow 7A
Upper third of bract	yellow-orange 17A/23A	yellow 7A	yellow 5A	yellow 12A
Apex of bract	greyed-orange 169A	greyed-orange 168A	yellow 5A	yellow 12A
BRACT: MAIN COLOUR OF OUTER THIRD OF INVOLUCRE (RHS, 1986)				
Lower third of bract	yellow-white 158B	greyed-yellow 161D	yellow and greyed-orange 5A/163ABC	yellow and greyed-orange 7A/163ABC
Middle third of bract	greyed-orange 164B	greyed-orange 163C	yellow and greyed-orange 5A/163ABC	yellow and greyed-orange 7A/163ABC
Upper third of bract	greyed-orange 171A	greyed-orange 172A	yellow and greyed-orange 5A/163ABC	yellow and greyed-orange 7A/163ABC
Apex of bract	greyed-orange 172A	greyed-orange 172A	yellow and greyed-orange 5A/163ABC	yellow and greyed-orange 7A/163ABC

Note: mean values followed by the same letter are not significantly different at P≤0.01.

'NN-99131A'

Application No: 2000/237 Accepted: 21 Aug 2000
Applicant: **Oasis Horticulture Pty Ltd,** Winmalee, NSW

Characteristics (Table 4, Figure 26) Plant: type bushy, growth habit (bushy types only) erect, height short, density medium to dense, stem hairiness moderately hairy. Leaf: length short to medium (mean 111.4mm), width narrow (mean 14.5mm), ratio length/width (mean 7.73), position of broadest part at midpoint, shape of apex acute, variegation absent, main colour of upper side yellow-green (ca RHS ca 146A), hairiness of upper side slightly hairy, hairiness of lower side absent or slightly hairy, undulation of margin medium. Flower shoot: length (mean 130.05mm), branching present. Flower bud: lateral view of apex pointed, main colour greyed-purple (ca RHS 186A). Flower head: predominant position in relation to foliage level, diameter small to medium (mean 48.8mm), lateral view of lower part slightly concave, lateral view of upper part flat, number of bracts medium. Involucre: number of colours more than one, main colour red-purple (ca RHS 64B/-C). Bract: length short to medium (mean 16.1mm), bract width medium (mean 4.15mm), main colour of lower third of bract from inner third of involucre white (RHS 155A), main colour of middle third of bract from inner third of involucre red-purple (RHS 64C), main colour of upper third of bract from inner third of involucre red-purple (RHS 64B), main colour of apex of bract from inner third of involucre red purple (RHS 64B), main colour of lower third of bract from middle third of involucre white at base changing to red-purple (RHS 155D to 62D), main colour of middle third of bract from middle third of involucre red purple (RHS 64B), main colour of upper third of bract from middle third of involucre red purple (RHS 61A), main colour of apex of bract from middle third of involucre red-purple (RHS 61A), main colour of lower third of bract from outer third of involucre white at base changing to red-purple (RHS 155D to 64C), main colour of middle third of bract from outer third of involucre red-purple (RHS 64C), main colour of upper third of bract from outer third of involucre red-purple (RHS

61A), main colour of apex of bract from outer third of involucre red-purple (RHS 59A). Pappus: colour yellow. (All RHS colour chart numbers refer to 1986 edition.)

Origin and Breeding Controlled pollination: seed parent breeding line 12A-5 (seed parent) x pollen parent breeding line 26A in a planned breeding program in Winmalee, NSW. The seed parent is characterised by yellow (RHS 9A) bract colour. The pollen parent is characterised by green-yellow (RHS 1D) bract colour. 'NN-99131A' was selected from the seedling progeny of this cross in August 1998 at Winmalee, NSW Australia. Selection criteria: flower colour, compact plant habit, ease of propagation, vigour. Propagation: Vegetative tip cuttings. 'NN-9812AA' has been found to be uniform and stable through many generations since selection. Breeder: Dr. Matthew Turner, Winmalee, NSW, Australia

Choice of Comparators Grouping characteristics used in identifying the most similar varieties of common knowledge were:- Plant: type bushy, habit erect. Flower bud: lateral view of apex pointed, main colour greyed-purple. Flower head: number of bracts medium. Involucre: number of colours more than one, main colour red-purple. Bract: colour. On the basis of these grouping characteristics the following varieties were included in the trial: 'Colourburst Pink'(ϕ, and 'Pink Sunrise'. Initially 'Spectrum' and 'Menindee Magic'(ϕ were also considered but later excluded because they do not fit within the grouping characteristics stated above. The parental lines were not included because they can be clearly distinguishable by their bract colour.

For the purpose of providing evidence of breeding, the parent material can be clearly distinguished from the candidate variety using the grouping characteristics: Bract: colour.

Comparative Trial Comparators: Location: Winmalee, NSW, April – July 2001. Conditions: trial conducted in heated/ventilated polyhouse, rooted cuttings (propagated from stock plants grown at Winmalee) potted in May into 150 mm standard pots in commercial potting mix, nutrients supplied by slow release and liquid feed fertiliser applications, plant protection treatments applied as necessary. Trial design: 15 pots of each variety arranged in a completely randomised design. Measurements taken from 10 plants per variety selected at random (one sample per plant).

Prior Applications and Sales
No prior applications.

First sold in Australia in August 2000.

Description: **Tim Angus**, Tim Angus Horticulture, Wellington, NZ.

Table 4 *Bracteantha* varieties

	'NN-99131A'	*'Colourburst Pink'ϕ	*'Pink Sunrise'
PLANT: HEIGHT			
	short	short	medium-short
PLANT: DENSITY			
	medium to dense	medium	medium
STEM: HAIRINESS			
	moderately hairy	strongly hairy	slightly hairy
LEAF: WIDTH (mm)			
mean	14.5	26.6	13.5
std deviation	1.7	3.8	2.1
LSD/sig	2.4	P≤0.01	ns
LEAF: RATIO LENGTH TO WIDTH			
mean	7.73	4.84	9.38
std deviation	0.8	0.55	1.02
LSD/sig	1.0	P≤0.01	P≤0.01
LEAF: POSITION OF BROADEST PART			
	at midpoint	at midpoint	at midpoint
LEAF: SHAPE OF APEX			
	acute	obtuse	obtuse
LEAF: VARIEGATION			
	absent	absent	absent
LEAF: MAIN COLOUR OF UPPER SIDE (RHS, 1986)			
	yellow-green ca 146A	yellow-green darker than 146A	yellow-green ca 147A
LEAF: HAIRINESS OF UPPER SIDE			
	slightly hairy	absent or very slightly hairy	slightly hairy
LEAF: HAIRINESS OF LOWER SIDE			
	absent or slightly hairy	slightly hairy	absent or slightly hairy
LEAF: UNDULATION OF MARGIN			
	medium	weak	weak
FLOWER SHOOT: LENGTH (mm)			
mean	130.05	90.1	227.7
std deviation	14.8	20.0	29.6
LSD/sig	33.3	P≤0.01	P≤0.01
FLOWER SHOOT: BRANCHING			
	present	present	absent
FLOWER BUD: LATERAL VIEW OF APEX			
	pointed	pointed	rounded
FLOWER BUD: MAIN COLOUR (RHS, 1986)			
	greyed-purple ca 186A	red-purple 60C	white 155D

FLOWER HEAD: PREDOMINANT POSITION IN RELATION TO FOLIAGE			
	level	level	moderately above
FLOWER HEAD: DIAMETER (mm)			
mean	48.8	44.1	34.8
std deviation	1.4	1.78	1.97
LSD/sig	3.7	P≤0.01	P≤0.01
FLOWER HEAD: LATERAL VIEW OF LOWER PART			
	flat	convex	concave
FLOWER HEAD: LATERAL VIEW OF UPPER PART			
	flat	convex	convex
FLOWER HEAD: NUMBER OF BRACTS			
	medium	medium	many
INVOLUCRE: NUMBER OF COLOURS			
	more than one	more than one	more than one
INVOLUCRE: MAIN COLOUR (RHS, 1986)			
	red-purple ca RHS 64B-C	purple 75A	white 155C
BRACT: LENGTH (mm)			
mean	16.1	13.6	14.8
std deviation	0.57	0.6	0.6
LSD/sig	1.0	P≤0.01	P≤0.01
BRACT: WIDTH (mm)			
mean	4.15	4.20	5.2
std deviation	0.75	0.4	0.6
LSD/sig	0.75	ns	P≤0.01
BRACT: MAIN COLOUR OF INNER THIRD OF INVOLUCRE (RHS, 1986)			
Lower third of bract			
	white 155D	white 155C	yellow 1D
Middle third of bract			
	red-purple 64C	purple 75B	yellow 1D
Upper third of bract			
	red-purple 64B	purple 75A	yellow 1C
Apex of bract	red-purple 64B	purple 75A	yellow 1C
BRACT: MAIN COLOUR OF MIDDLE THIRD OF INVOLUCRE (RHS, 1986)			
Lower third of bract			
	white at base changing to red-purple 155D to 62D	purple 75A	white 155C
Middle third of bract			
	red-purple 64B	red-purple 73A	white 155C
Upper third of bract			
	red-purple 61A	red-purple 70C/B	white 155C with pink striations
Apex of bract	red-purple 61A	red-purple 70C/B	red-purple ca 61A
BRACT: MAIN COLOUR OF OUTER THIRD OF INVOLUCRE (RHS, 1986)			
Lower third of bract			
	white at base changing to red-purple 155D to 64C	red-purple 70C/B	white 155C
Middle third of bract			
	red purple 64C	red-purple 70C/B	white 155C
Upper third of bract			
	red purple 61A	red-purple 70C/B	white 155C with pink striations
Apex of bract	red purple 59A	red-purple 61A	red-purple 61A
PAPPUS COLOUR			
	yellow	white	white

'NN-B9821A'

Application No: 1999/319 Accepted: 21 Dec 1999.
Applicant: **Oasis Horticulture Pty Ltd,** Winmalee, NSW.

Characteristics (Table 5, Figure 25) Plant: type bushy, growth habit (bushy types only) erect, height short, density dense. Stem hairiness strongly hairy. Leaf: length short (mean 100.6mm), width very narrow to narrow (mean 13.4mm), ratio length/width (mean 7.6), position of broadest part at midpoint, shape of apex acute, variegation absent, main colour of upper side yellow-green (ca RHS 146A), hairiness of upper side slightly hairy, hairiness of lower side slightly hairy, undulation of margin weak. Flower shoot: length mean 125.4mm, branching absent. Flower bud: lateral view of apex pointed, main colour red-purple (ca RHS 59A). Flower head: predominant position in relation to foliage level, diameter mean 33.7mm, lateral view of lower part concave, lateral view of upper part concave, number of bracts medium. Involucre: number of colours more than one, main colour yellow (ca RHS 4C/D). Bract: length short to medium (mean 13.4mm), bract width medium (mean 5.5mm), main colour of lower third of bract from inner third of involucre green-white (RHS 157C), main colour of middle third of bract from inner third of involucre yellow (RHS 4C), main colour of upper third of bract from inner third of involucre yellow (RHS 4C), main colour of apex of bract from inner third of involucre yellow (RHS 4C), main colour of lower third of bract from middle third of involucre green-white (RHS 157D), main colour of middle third of bract from middle third of involucre orange-white (RHS 159C), main colour of upper third of bract from middle third of involucre yellow (RHS 4D), main colour of apex of bract from middle third of involucre yellow (RHS 4D), main colour of lower third of bract from outer third of involucre white (RHS 155D), main colour of middle third of bract from outer third of involucre red-purple (lighter than RHS 71A), main colour of upper third of bract from outer third of involucre red-purple (RHS 71A), main colour of apex of bract from outer third of involucre red- purple (RHS 71A). Pappus: colour white. (All RHS colour chart numbers refer to 1986 edition.)

Origin and Breeding Controlled pollination: seed parent breeding line accession "D" x pollen parent breeding line accession "B" in a planned breeding program in Winmalee, NSW. The seed parent is characterised by medium tall plant

height and red-purple (RHS 60D) bract colour. The pollen parent is characterised by yellow (RHS 9A) bract colour. 'NN-B9821A' was selected from the seedling progeny of this cross in Aug 1998 at Winmalee, NSW. Selection criteria: flower colour, compact plant habit, ease of propagation, vigour. Propagation: vegetative tip cuttings. 'NN-B9821A' has been found to be uniform and stable through many generations since selection. Breeder: Dr. Matthew Turner, Winmalee, NSW.

Choice of Comparators Grouping characteristics used in identifying the most similar varieties of common knowledge were: Plant: type bushy, habit erect, height short. Leaf: length short, width very narrow to narrow. Flower bud: lateral view of apex pointed, main colour red-purple. Flower head: number of bracts medium, head diameter very small to small. Involucre: number of colours more than one, colour of inner bracts yellow, colour of outer bracts red-purple. On the basis of these grouping characteristics the following varieties were included in the trial: 'Florabella Pink', 'Menindee Magic'Φ. The varieties 'Pink Sunrise', 'Spectrum', 'Florabella Lemon', and 'Colourburst Pink'Φ were also considered but later excluded because they do not fit within the grouping characteristics stated above. The parental lines were not included because they can be clearly distinguishable by their bract colour or plant height.

Comparative Trial Comparators: Location: Winmalee, NSW, Apr – Jul 2001. Conditions: trial conducted in heated/ventilated polyhouse, rooted cuttings (propagated from stock plants grown at Winmalee) potted in May into 150mm standard pots in commercial potting mix, nutrients supplied by slow release and liquid feed fertiliser applications, plant protection treatments applied as necessary. Trial design: 15 pots of each variety arranged in a completely randomised design. Measurements taken from 10 plants per variety selected at random (one sample per plant).

Prior Applications and Sales

No prior applications. First sold in Australia in Aug 2000.

Description: **Tim Angus**, Tim Angus Horticulture, Wellington, NZ.

Table 5 *Bracteantha* varieties

	'NN–B9821A'	*'Florabella Pink'	*'Menindee Magic'Φ
PLANT: HEIGHT			
	short	medium tall	short
PLANT: DENSITY			
	dense	medium	dense
LEAF: LENGTH (mm)			
mean	100.6	122.3	163.7
std deviation	8.6	9.7	10.7
LSD/sig	12.0	P≤0.01	P≤0.01
LEAF: WIDTH (mm)			
mean	13.4	22.3	43.5
std deviation	1.7	1.9	2.1
LSD/sig	2.4	P≤0.01	P≤0.01
LEAF: RATIO LENGTH TO WIDTH			
mean	7.6	5.5	3.9
std deviation	0.8	0.7	1.2
LSD/sig	1.2	P≤0.01	P≤0.01
FLOWER SHOOT: LENGTH (mm)			
mean	125.4	182	181.1
std deviation	24.1	19.1	35.0
LSD/sig	33.3	P≤0.01	P≤0.01
FLOWER SHOOT: BRANCHING			
	absent	absent	present
FLOWER BUD: MAIN COLOUR (RHS, 1986)			
	red-purple 59A	red-purple 71A	red-purple 59A
FLOWER HEAD: PREDOMINANT POSITION IN RELATION TO FOLIAGE			
	level	above	level
FLOWER HEAD: DIAMETER (mm)			
mean	33.7	49.8	64.9
std deviation	1.9	4.0	2.7
LSD/sig	3.7	P≤0.01	P≤0.01
FLOWER HEAD: LATERAL VIEW OF LOWER PART			
	concave	convex	convex
FLOWER HEAD: LATERAL VIEW OF UPPER PART			
	concave	flat	convex
FLOWER HEAD: NUMBER OF BRACTS			
	medium	medium	many
INVOLUCRE: MAIN COLOUR (RHS, 1986)			
	yellow ca RHS 4C/D	white with red-purple 155A/73C	yellow 2C/4D
BRACT: LENGTH (mm)			
mean	13.4	15	19.6
std deviation	0.7	0.8	0.9
LSD/sig	1.0	P≤0.01	P≤0.01
BRACT: WIDTH (mm)			
mean	5.5	4.7	6.2
std deviation	0.5	0.7	0.6
LSD/sig	0.75	P≤0.01	ns
BRACT: MAIN COLOUR OF INNER THIRD OF INVOLUCRE (RHS, 1986)			
Lower third of bract			
	green-white 157C	white 155A	yellow 2C
Middle third of bract			
	yellow 4C	white 155A	yellow 2C
Upper third of bract			
	yellow 4C	white 155A	yellow 2C
Apex of bract	yellow 4C	white 155A	yellow 2C

BRACT: MAIN COLOUR OF MIDDLE THIRD OF INVOLUCRE (RHS, 1986)			
Lower third of bract	green-white 157D	white with red-purple 155A and 73C	white at base changing to yellow155C to 4D
Middle third of bract	orange-white 159C	red-purple 73B	yellow 4D
Upper third of bract	yellow 4D	red-purple 73A	yellow 4D
Apex of bract	yellow 4D	red-purple 73A	yellow 4D

BRACT: MAIN COLOUR OF OUTER THIRD OF INVOLUCRE (RHS, 1986)			
Lower third of bract	white 155D	white 155A	yellow 4D
Middle third of bract	red-purple lighter than 71A	white 155A	yellow 4D
Upper third of bract	red-purple 71A	red-purple 73B	yellow 4D
Apex of bract	red-purple 71A	red-purple 71A	red-purple 62C

PAPPUS: COLOUR			
	white	white	yellow

‘NN-B9892’

Application No: 1999/320 Accepted: 21 Dec 1999.
Applicant: **Oasis Horticulture Pty Ltd,** Winmalee, NSW.

Characteristics (Table 6, Figure 27) Plant: type bushy, growth habit (bushy types only) erect, height short, density dense. Stem hairiness strongly hairy. Leaf: length medium (mean 133.8mm), width very narrow to narrow (mean 12.7mm), ratio length/width mean 10.6, position of broadest part at midpoint, shape of apex acute, variegation absent, main colour of upper side yellow-green (ca RHS 146A), hairiness of upper side slightly hairy, hairiness of lower side slightly hairy, undulation of margin medium. Flower shoot: length mean 156.3mm, branching absent. Flower bud: lateral view of apex pointed, main colour green-white (RHS 157C). Flower head: predominant position in relation to foliage level, diameter small to medium (mean 45.55mm), lateral view of lower part concave, lateral view of upper part concave, number of bracts medium. Involucre: number of colours one, main colour yellow (RHS 4C). Bract: length medium (mean 17.5mm), bract width medium (mean 4.7mm), main colour of lower third of bract from inner third of involucre yellow (RHS 4D), main colour of middle third of bract from inner third of involucre yellow (RHS 4C), main colour of upper third of bract from inner third of involucre yellow (RHS 4B/C), main colour of apex of bract from inner third of involucre yellow (RHS 4B/C), main colour of lower third of bract from middle third of involucre yellow (RHS 4D), main colour of middle third of bract from middle third of involucre yellow (ca RHS 4C), main colour of upper third of bract from middle third of involucre yellow (RHS 4B/C), main colour of apex of bract from middle third of involucre yellow (RHS 4B/C), main colour of lower third of bract from outer third of involucre white (RHS 157D), main colour of middle third of bract from outer third of involucre yellow (RHS 4D), main colour of upper third of bract from outer third of involucre yellow (RHS 4D), main colour of apex of bract from outer third of involucre yellow (RHS 4D). Pappus: colour white.

Origin and Breeding Controlled pollination: seed parent breeding line accession “B” x pollen parent breeding line accession “C” in a planned breeding program in Winmalee, NSW. The seed parent is characterised by yellow (RHS 9A) bract colour. The pollen parent is characterised by tall plant height and yellow (RHS 1D) bract colour. ‘NN-B9892’ was selected from the seedling progeny of this cross in Aug 1998 at Winmalee, NSW. Selection criteria: flower colour, compact plant habit, ease of propagation, vigour. Propagation: vegetative tip cuttings. ‘NN-B9892’ has been found to be uniform and stable through many generations since selection. Breeder: Dr. Matthew Turner, Winmalee, NSW.

Choice of Comparators Grouping characteristics used in identifying the most similar varieties of common knowledge were: Plant: bushy habit, type erect, height short. Leaf: length medium, width very narrow to narrow. Flower bud: lateral view of apex pointed, main colour green-white. Flower head: number of bracts medium, diameter very small to small. Involucre: number of colours one, main colour yellow. On the basis of these grouping characteristics the following varieties were included in the trial: ‘Florabella Lemon’, ‘Florabella White’, ‘Argyle Star’(D). The varieties ‘Broome Pearl’, ‘Dargan Hill Monarch Lemon’ and ‘Dargan Hill Monarch White’ were also considered but later excluded because they do not fit within the grouping characteristics stated above. The parental lines were not included because they can be clearly distinguishable by their bract colour or plant height.

Comparative Trial Comparators: Location: Winmalee, NSW, Apr – Jul 2001. Conditions: trial conducted in heated/ventilated polyhouse, rooted cuttings (propagated from stock plants grown at Winmalee) potted in May into 150mm standard pots in commercial potting mix, nutrients supplied by slow release and liquid feed fertiliser applications, plant protection treatments applied as necessary. Trial design: 15 pots of each variety arranged in a completely randomised design. Measurements taken from 10 plants per variety selected at random (one sample per plant).

Prior Applications and Sales

No prior applications. First sold in Australia in Aug 2000.

Description: **Tim Angus**, Tim Angus Horticulture, Wellington, NZ.

Table 6 *Bracteantha* varieties

	'NN-B9892'	*'Florabella Lemon'	*'Florabella White'	*'Argyle Star'Φ
PLANT: DENSITY				
	dense	sparse to medium	medium	sparse to medium
STEM: HAIRINESS				
	strongly hairy	strongly hairy	slightly hairy	strongly hairy
LEAF: LENGTH (mm)				
mean	133.8	140.1	126.5	165.6
std deviation	8.8	18.5	13.1	16.9
LSD/sig	18.1	ns	ns	P≤0.01
LEAF: WIDTH (mm)				
mean	12.7	19.1	16.4	31.1
std deviation	1.8	3.2	2.7	3.5
LSD/sig	3.5	P≤0.01	P≤0.01	P≤0.01
LEAF: RATIO LENGTH TO WIDTH				
mean	10.6	7.4	7.8	5.37
std deviation	1.0	0.7	0.7	0.6
LSD/sig	0.92	P≤0.01	P≤0.01	P≤0.01
LEAF: POSITION OF BROADEST PART				
	at midpoint	above midpoint	at midpoint	above midpoint
LEAF: MAIN COLOUR OF UPPER SIDE (RHS,1986)				
	yellow-green	green	green	green
	146A	137A	137A	136A
LEAF: HAIRINESS OF LOWER SIDE				
	slightly hairy	absent	absent	absent
LEAF: UNDULATION OF MARGIN				
	medium	weak	weak	weak
FLOWER SHOOT: LENGTH (mm)				
mean	156.3	220.1	209.7	188.1
std deviation	15.1	43.3	25.7	32.8
LSD/sig	37.7	P≤0.01	P≤0.01	ns
FLOWER BUD: MAIN COLOUR (RHS, 1986)				
	green-white	yellow-white	white	yellow-white
	157C	158A	155C	158B/D
FLOWER HEAD: PREDOMINANT POSITION IN RELATION TO FOLIAGE				
	level	above	above	level
FLOWER HEAD: DIAMETER (mm)				
mean	45.55	46.48	46.73	65.97
std deviation	1.9	2.0	1.8	2.3
LSD/sig	2.4	ns	ns	P≤0.01
FLOWER HEAD: LATERAL VIEW OF LOWER PART				
	concave	convex	convex	flat
FLOWER HEAD: LATERAL VIEW OF UPPER PART				
	concave	concave	flat	concave
FLOWER HEAD: NUMBER OF BRACTS				
	medium	medium	medium	few
INVOLUCRE: MAIN COLOUR (RHS,1986)				
	yellow	green-yellow	green-white	green-white
	4C	1C	157D	157C
BRACT: LENGTH (mm)				
mean	17.5	13.4	13.8	23.1
std deviation	1.1	0.5	0.7	1.1
LSD/sig	1.1	P≤0.01	P≤0.01	P≤0.01
BRACT: WIDTH (mm)				
mean	4.7	4.6	5.1	7.1
std deviation	0.7	0.5	0.7	0.7
LSD/sig	0.75	ns	ns	P≤0.01
BRACT: MAIN COLOUR OF INNER THIRD OF INVOLUCRE (RHS, 1986)				
Lower third of bract				
	yellow	green-yellow	white	green-white
	4D	1C	155D	157D
Middle third of bract				
	yellow	green-yellow	green-white	green-white
	4C	1C	157D	157C
Upper third of bract				
	yellow	green-yellow	green-white	green-white
	4B/C	1C	157D	157A
Apex of bract	yellow	green-yellow	green-white	green-white
	4B/C	1C	157D	157A
BRACT: MAIN COLOUR OF MIDDLE THIRD OF INVOLUCRE (RHS, 1986)				
Lower third of bract				
	yellow	white and yellow	white	green-white
	4D	155C/4C	155D	157D
Middle third of bract				
	yellow	green-yellow	green-yellow	green-white
	4C	1C	157D	157A
Upper third of bract				
	yellow	green-yellow	green-yellow	green-white
	4B/C	1C	157A	157A
Apex of bract	yellow	green-yellow	green-yellow	green-white
	4B/C	1C	157A	157A
BRACT: MAIN COLOUR OF OUTER THIRD OF INVOLUCRE (RHS, 1986)				
Lower third of bract				
	green-white	white	white	green-white
	157D	155D	155D	157D
Middle third of bract				
	yellow	green-yellow	green-white	green-white
	4D	1D	157D	157C

Upper third of bract				
	yellow	green-yellow	green-white	green-white
	4D	1D	157D	157A
Apex of bract	yellow	green-yellow	green-white	green-white
	4D	1D	157D	157A
PAPPUS COLOUR				
	white	yellow	white	white

'Pink Delight'

Application No: 2000/250 Accepted: 28 Aug 2000.
Applicant: **Luff Partnership,** Kulnura, NSW.

Characteristics (Table 7, Figure 24) Plant: type bushy, growth habit (bushy types only) erect, height very tall, density medium. Stem: hairiness weak. Leaf: length medium, width medium, ratio width/length 1:4, position of broadest part at middle, shape of apex acute, variegation absent, main colour of upper side medium green, hairiness of upper side very weak, hairiness of lower side very weak, undulation of margin weak. Flower shoot: branching present. Flower bud: lateral view of apex rounded, main colour greyed-purple (RHS 186B). Flower head: predominant position in relation to foliage above, diameter medium, lateral view of lower part convex, lateral view of upper part concave, number of bracts many. Involucre: number of colours 1, main colour pink. Bract: length medium, width medium, ratio width/length 1:3, main colour of lower third of bract from inner third of involucre white (RHS 155C), main colour of middle third of bract from inner third of involucre white (RHS 155C), main colour of upper third of bract from inner third of involucre white (RHS 155C), main colour of lower third of bract from middle third of involucre white (RHS 155C), main colour of middle third of bract from middle third of involucre greyed-purple (RHS 186D), main colour of upper third of bract from middle third of involucre greyed-purple (RHS 186C), main colour of middle third of bract from outer third of involucre greyed-purple (RHS 186C), main colour of upper third of bract from outer third of involucre 186B. Pappus: colour white. (All RHS colour chart numbers refer to 2001 edition.)

Origin and Breeding Controlled pollination: seed parent breeders code G4/11/6 x pollen parent breeders code P9/8/7. Hybridisation took place in Kulnura, NSW in 1998. Parent plants selected after 6 cycles of selection from a breeding program that included the following varieties: 'Dargan Hill White', 'Princess of Wales', 'Dargan Hill Apricot', 'Cockatoo' and an unnamed selection of *Bracteantha bracteata*, breeders code 17/8/9. The seed parent was characterised by medium diameter, yellow flower heads with small bracts. The pollen parent was characterised by medium diameter dark pink and white flower heads and tall plant height. Selection criteria: very tall plants with pink flowers. Propagation: the original seedling selection has been propagated vegetatively by cutting through 5 generations and found to be uniform and stable. Breeder: R Luff, Kulnura, NSW.

Choice of Comparators Grouping characteristics used in identifying the most similar varieties of common knowledge were- Flower: colour pink, Plant height: tall to very tall. On these bases the following varieties were included in the trial: 'Dargan Hill Apricot', 'Rose' (syn. *Helichrysum bracteatum monstrosum* 'Rose', AustraHort Pty Ltd) 'Bright Pink' (syn. *Helichrysum bracteatum monstrosum* 'Bright Pink', AustraHort Pty Ltd). The original source material from which the variety was selected was also included.

Comparative Trial Location: Kulnura, NSW (Latitude 33º14′ South, Elevation 320m) spring – summer 2001. Conditions: plants propagated from cutting then field grown in raised beds and supported by flower mesh. Pre-planting soil dressing of 2000kg/Ha dolomite and 18m3/Ha fowl manure. Soluble fertiliser applied though drip irrigation at 10-day intervals, water daily. Trial design: 20 plants of each variety arranged in a completely randomised design. Measurements: from at least 10 plants from each variety selected randomly.

Prior Applications and Sales

No prior applications. First sold in Australia in Sep 1999.

Description: **Iain Dawson,** Aranda, ACT.

'Pink Star'

Application No: 2000/247 Accepted: 28 Aug 2000.
Applicant: **Luff Partnership,** Kulnura, NSW.

Characteristics (Table 7, Figure 24) Plant: type bushy, growth habit (bushy types only) erect, height very tall, density medium. Stem: hairiness weak. Leaf: length short, width medium, ratio width/length 1:5, position of broadest part at middle, shape of apex acute, variegation absent, main colour of upper side medium green, hairiness of upper side very weak, hairiness of lower side very weak, undulation of margin weak. Flower shoot: branching present. Flower bud: lateral view of apex pointed, main colour greyed purple (RHS 186B). Flower head: predominant position in relation to foliage level, diameter medium, lateral view of lower part flat, lateral view of upper part flat, number of bracts medium. Involucre: number of colours 1, main colour pink. Bract: length medium, width medium, ratio width/length 1:3, main colour of lower third of bract from inner third of involucre greyed-purple (RHS 186D), main colour of middle third of bract from inner third of involucre greyed-purple (RHS 186C), main colour of upper third of bract from inner third of involucre greyed-purple (RHS 186B), main colour of lower third of bract from middle third of involucre greyed-purple (RHS 186D), main colour of middle third of bract from middle third of involucre greyed-purple (RHS 186B), main colour of upper third of bract from middle third of involucre greyed-purple (RHS 186B), main colour of middle third of bract from outer third of involucre greyed-purple (RHS 186C), main colour of upper third of bract from outer third of involucre greyed-purple (RHS 186C). Pappus: colour white. (All RHS colour chart numbers refer to 2001 edition.)

Origin and Breeding Controlled pollination: seed parent breeders code P10/8/7 x pollen parent P9/8/7. Hybridisation took place in Kulnura, NSW in 1998. Parent plants selected after 6 cycles of selection from a breeding program that included the following varieties: 'Dargan Hill White', 'Princess of Wales', 'Dargan Hill Apricot', 'Cockatoo' and

an unnamed selection of *Bracteantha bracteata*, breeders code 17/8/9. The seed parent was characterised by pink flowers and medium plant height. The pollen parent was characterised by dark pink and white flowers and tall plant height. Selection criteria: uniform medium pink flowers on tall plants. Propagation: the original seedling selection has been propagated vegetatively by cutting through 5 generations and found to be uniform and stable. Breeder: R Luff, Kulnura, NSW.

Choice of Comparators Grouping characteristics used in identifying the most similar varieties of common knowledge were- Flower: colour pink, Plant height: medium or tall. On these bases the following varieties were included in the trial: 'Dargan Hill Apricot', 'Rose' (syn. *Helichrysum bracteatum monstrosum* 'Rose', AustraHort Pty Ltd), 'Bright Pink' (syn. *Helichrysum bracteatum monstrosum* 'Bright Pink', AustraHort Pty Ltd). The original source material from which the variety was selected was also included.

Comparative Trial Location: Kulnura, NSW (Latitude 33º14′ South, Elevation 320m) spring – summer 2001. Conditions: plants propagated from cutting then field grown in raised beds and supported by flower mesh. Pre-planting soil dressing of 2000kg/Ha dolomite and 18m3/Ha fowl manure. Soluble fertiliser applied though drip irrigation at 10-day intervals, water daily. Trial design: 20 plants of each variety arranged in a completely randomised design. Measurements: from at least 10 plants from each variety selected randomly.

Prior Applications and Sales

No prior applications. First sold in Australia in Oct 1999.

Description: **Iain Dawson,** Aranda, ACT.

Table 7 *Bracteantha* varieties

	'Pink Delight'	**'Pink Star'**	***'Dargan Hill Apricot'**	***'Bright Pink'**	***'Rose'**
PLANT: HEIGHT	very tall	very tall	tall	very tall	tall
PLANT: DENSITY	medium	medium	medium	sparse	sparse
LEAF: LENGTH	medium	short	medium	medium	medium
LEAF: WIDTH/LENGTH RATIO	1:4	1:5	1:5	1:4	1:5
LEAF: POSITION OF BROADEST PART	at middle	at middle	at middle	at middle	below middle
LEAF: MAIN COLOUR OF UPPER SIDE	medium green	medium green	medium green	medium green	dark green
LEAF: UNDULATION OF MARGIN	weak	weak	medium to strong	medium	weak
FLOWER BUD: LATERAL VIEW OF APEX	rounded	pointed	rounded	rounded	pointed
FLOWER BUD: MAIN COLOUR (RHS, 2001)	186B	186B	186A	186A	186B
FLOWER HEAD: PREDOMINANT POSITION IN RELATION TO FOLIAGE	above	level	above	above	above
FLOWER HEAD: DIAMETER	medium	medium	small to medium	small	medium
FLOWER HEAD: LATERAL VIEW OF LOWER PART	convex	flat	flat	convex	concave
FLOWER HEAD: LATERAL VIEW OF UPPER PART	concave	flat	concave	concave	concave
FLOWER HEAD: NUMBER OF BRACTS	many	medium	medium	many	many

INVOLUCRE: NUMBER OF COLOURS	1	1	2	1	1
BRACT LENGTH	medium	medium	medium	short	short to medium
BRACT WIDTH	medium	medium	medium	narrow to medium	narrow to medium
BRACT WIDTH/LENGTH RATIO	1:3	1:3	1:2	1:2	1:3
BRACT: MAIN COLOUR OF INNER THIRD OF INVOLUCRE (RHS, 2001)					
Lower third of bract	N155C	186D	2C	64D	186D
Middle third of bract	N155C	186C	2C	64D	186D
Upper third of bract	N155C	186B	2C	64D	186D
BRACT: MAIN COLOUR OF MIDDLE THIRD OF INVOLUCRE (RHS, 2001)					
Lower third of bract	N155C	186D	N155C	64B	N155C
Middle third of bract	186D	186B	N155C	64B	186D
Upper third of bract	186C	186B	186C	64B	N155C
BRACT: MAIN COLOUR OF OUTER THIRD OF INVOLUCRE (RHS, 2001)					
Lower third of bract	n/a	n/a	N155C	64A	N155C
Middle third of bract	186C	186C	N155C	64A	186C
Upper third of bract	186B	186C	186C	64A	N155C
PAPPUS: COLOUR	white	white	green	white	white

‘Sweet Sensation’

Application No: 2000/251 Accepted: 28 Aug 2000.
Applicant: **Luff Partnership,** Kulnura, NSW.

Characteristics (Table 8, Figure 24) Plant: type bushy, growth habit (bushy types only) erect, height short, density medium to dense. Stem: hairiness weak. Leaf: length short, width medium, ratio width/length 1:5, position of broadest part above middle, shape of apex acute, variegation absent, main colour of upper side light green, hairiness of upper side very weak, hairiness of lower side very weak, undulation of margin weak. Flower shoot: branching present. Flower bud: lateral view of apex pointed, main colour greyed-purple (RHS 186D). Flower head: predominant position in relation to foliage level, diameter medium, lateral view of lower part concave, lateral view of upper part flat, number of bracts medium to many. Involucre: number of colours 2, main colour white. Bract: length medium to long, width narrow to medium, ratio width/length 1:4, main colour of lower third of bract from inner third of involucre greyed-purple (RHS 186D), main colour of middle third of bract from inner third of involucre greyed-purple (RHS 186D), main colour of upper third of bract from inner third of involucre white (RHS N155C), main colour of lower third of bract from middle third of involucre greyed-purple (RHS 186D), main colour of middle third of bract from middle third of involucre white (RHS N155C), main colour of upper third of bract from middle third of involucre white (RHS N155C), main colour of lower third of bract from outer third of involucre white (RHS N155C), main colour of middle third of bract from outer third of involucre white (RHS N155C), main colour of upper third of bract from outer third of involucre white (RHS N155C). Pappus: colour green. (All RHS colour chart numbers refer to 2001 edition.)

Origin and Breeding Controlled pollination: seed parent breeders code P10/8/7 x pollen parent breeders code P6/8/7. Hybridisation took place in Kulnura, NSW in 1998. Parent plants selected after 5 cycles of selection from a breeding program that included the following varieties: ‘Dargan Hill White’, ‘Princess of Wales’, ‘Dargan Hill Apricot’, ‘Cockatoo’ and an unnamed selection of *Bracteantha bracteata*, breeders code 17/8/9. The seed parent was characterised by a very upright habit, medium bract number and medium pink bract colour. The pollen parent was characterised by pale pink flower heads with few bracts and tall plant height. Selection criteria: more compact habit with pale pink and white flower heads. Propagation: the original seedling selection has been propagated vegetatively by cutting through 6 generations and found to be uniform and stable. Breeder: R Luff, Kulnura, NSW.

Choice of Comparators Grouping characteristics used in identifying the most similar varieties of common knowledge were – Flower: colour white or pale pink, Plant height: short to medium. On these bases the following variety was included in the trial: ‘Dargan Hill White’. ‘Pink Sunrise’ was considered and rejected on the basis of flower colour (RHS 36C) and the position of the flower heads in relation to the foliage (far above). The original source material from which the variety was selected was also included.

Comparative Trial Location: Kulnura, NSW (Latitude 33°14′ South, Elevation 320m) spring – summer 2001. Conditions: plants propagated from cutting then field grown in raised beds and supported by flower mesh. Pre-planting soil dressing of 2000kg/Ha dolomite and 18m3/Ha fowl manure. Soluble fertiliser applied though drip irrigation at 10-day intervals, water daily. Trial design: 20 plants of each variety arranged in a completely randomised design. Measurements: from at least 10 plants from each variety selected randomly.

Prior Applications and Sales

Country	Year	Status	Name Applied
New Zealand	2000	Applied	'Sweet Sensation'
EU	2001	Applied	'Sweet Sensation'

First sold in Australia in Sep 1999.

Description: **Iain Dawson,** Aranda, ACT.

'White Lace'

Application No: 2000/248 Accepted: 28 Aug 2000.
Applicant: **Luff Partnership,** Kulnura, NSW.

Characteristics (Table 8, Figure 24) Plant: type bushy, growth habit (bushy types only) erect, height medium, density medium. Stem: hairiness weak. Leaf: length medium, width medium, ratio width/length 1:5, position of broadest part above middle, shape of apex acute, variegation absent, main colour of upper side medium green, hairiness of upper side very weak, hairiness of lower side very weak, undulation of margin medium. Flower shoot: branching present. Flower bud: lateral view of apex pointed, main colour greyed-yellow (RHS 161C). Flower head: predominant position in relation to foliage above, diameter large, lateral view of lower part concave, lateral view of upper part flat, number of bracts many. Involucre: number of colours 1, main colour white. Bract: length long to very long, width medium, ratio width/length 1:4, main colour of lower third of bract from inner third of involucre white (RHS 155B), main colour of middle third of bract from inner third of involucre white (RHS 155B), main colour of upper third of bract from inner third of involucre white (RHS 155B), main colour of lower third of bract from middle third of involucre white (RHS 155B), main colour of middle third of bract from middle third of involucre white (RHS 155B), main colour of upper third of bract from middle third of involucre white (RHS 155B), main colour of lower third of bract from outer third of involucre white (RHS N155D), main colour of middle third of bract from outer third of involucre white (RHS N155D), main colour of upper third of bract from outer third of involucre white (RHS N155D). Pappus: colour white. (All RHS colour chart numbers refer to 2001 edition.)

Origin and Breeding Controlled pollination: seed parent breeders code W1/11/6 x pollen parent 'Cockatoo'. The seed parent plant selected after 4 cycles of selection from a breeding program that included the following varieties: 'Dargan Hill White', 'Princess of Wales', 'Dargan Hill Apricot', 'Cockatoo' and an unnamed selection of *Bracteantha bracteata*, breeders code 17/8/9. The seed parent was characterised by medium large, off-white colour flower heads. The pollen parent was characterised by medium diameter, lemon colour flower heads. Selection criteria: large diameter, white flowers. Propagation: the original seedling selection has been propagated vegetatively by cutting through 7 generations and found to be uniform and stable. Breeder: R Luff, Kulnura, NSW.

Choice of Comparators Grouping characteristics used in identifying the most similar varieties of common knowledge were – Flower: colour white, Plant height: medium. On these bases the following variety was included in the trial: 'Dargan Hill White'. The original source material from which the variety was selected was also included.

Comparative Trial Location: Kulnura, NSW (Latitude 33°14′ South, Elevation 320m) spring – summer 2001. Conditions: plants propagated from cutting then field grown in raised beds and supported by flower mesh. Pre-planting soil dressing of 2000kg/Ha dolomite and 18m3/Ha fowl manure. Soluble fertiliser applied though drip irrigation at 10-day intervals, water daily. Trial design: 20 plants of each variety arranged in a completely randomised design. Measurements: from at least 10 plants from each variety selected randomly.

Prior Applications and Sales

Country	Year	Status	Name Applied
New Zealand	2000	Applied	'White Lace'
EU	2001	Applied	'White Lace'

First sold in Australia in Sep 1999.

Description: **Iain Dawson,** Aranda, ACT.

Table 8 *Bracteantha* varieties

	'Sweet Sensation'	'White Lace'	*'Dargan Hill White'
PLANT HEIGHT	short	medium	medium
PLANT DENSITY	medium to dense	medium	medium to dense
LEAF LENGTH	short	medium	medium
LEAF WIDTH / LENGTH RATIO	1:5	1:5	1:6
LEAF: MAIN COLOUR OF UPPER SIDE	light green	medium green	medium green
LEAF: UNDULATION OF MARGIN	weak	medium	weak
FLOWER BUD MAIN COLOUR (RHS, 2001)	186D	161C	161D
FLOWER HEAD: PREDOMINANT POSITION IN RELATION TO FOLIAGE	level	above	level

FLOWER HEAD DIAMETER			
	medium	large	medium
FLOWER HEAD NUMBER OF BRACTS			
	medium to many	many	medium
INVOLUCRE: NUMBER OF COLOURS			
	2	1	1
BRACT LENGTH			
	medium to long	long to very long	medium
BRACT WIDTH			
	narrow to medium	medium	medium
BRACT: WIDTH/ LENGTH RATIO			
	1:4	1:4	1:3
BRACT: MAIN COLOUR OF INNER THIRD OF INVOLUCRE (RHS, 2001)			
Lower third of bract			
	186D	155B	155C
Middle third of bract			
	186D	155B	155C
Upper third of bract			
	N155C	155B	155C
BRACT: MAIN COLOUR OF MIDDLE THIRD OF INVOLUCRE (RHS, 2001)			
Lower third of bract			
	186D	155B	155C
Middle third of bract			
	N155C	155B	155C
Upper third of bract			
	N155C	155B	155C
BRACT: MAIN COLOUR OF OUTER THIRD OF INVOLUCRE (RHS, 2001)			
Lower third of bract			
	N155C	N155D	155C
Middle third of bract			
	N155C	N155D	155C
Upper third of bract			
	N155C	N155D	155C
PAPPUS COLOUR			
	green	white	white

‘Fire Ball’

Application No: 2000/254 Accepted: 28 Aug 2000.
Applicant: Luff Partnership, Kulnura, NSW

Characteristics (Table 9, Figure 24) Plant: type bushy, growth habit (bushy types only) erect, height medium, density medium. Stem: hairiness weak. Leaf: length medium, width medium, ratio width/length 1:7, position of broadest part at middle, shape of apex acute, variegation absent, main colour of upper side medium green, hairiness of upper side very weak, hairiness of lower side very weak, undulation of margin medium. Flower shoot: branching present. Flower bud: lateral view of apex pointed, main colour greyed-red (RHS 178B) Flower head: predominant position in relation to foliage level, diameter small to medium, lateral view of lower part flat, lateral view of upper part concave, number of bracts many. Involucre: number of colours 2, main colour yellow. Bract: length medium, width narrow to medium, ratio width/length 1:3, main colour of lower third of bract from inner third of involucre yellow (RHS 12A), main colour of middle third of bract from inner third of involucre yellow-orange (RHS 17A), main colour of upper third of bract from inner third of involucre yellow (RHS 12A), main colour of lower third of bract from middle third of involucre yellow (RHS 12A), main colour of middle third of bract from middle third of involucre yellow-orange (RHS 17A), main colour of upper third of bract from middle third of involucre yellow-orange (RHS 17A), main colour of middle third of bract from outer third of involucre greyed-purple (RHS 187D), main colour of upper third of bract from outer third of involucre greyed red (RHS 178A). Pappus: colour yellow green. (All RHS colour chart numbers refer to 2001 edition.)

Origin and Breeding Controlled pollination: seed parent breeders code O7/5/7 x pollen parent breeders code O8/5/7. Hybridisation took place in Kulnura, NSW in 1998. Parent plants selected after 5 cycles of selection from a breeding program that included the following varieties: ‘Dargan Hill White’, ‘Princess of Wales’, ‘Dargan Hill Apricot’, ‘Cockatoo’ and an unnamed selection of *Bracteantha bracteata*, breeders code 17/8/9. The seed parent was characterised by orange flower heads and tall plant height. The pollen parent was characterised by orange flower heads and tall plant height. Selection criteria: orange flowers and medium plant height. Propagation: the original seedling selection has been propagated vegetatively by cutting through 6 generations and found to be uniform and stable. Breeder: R Luff, Kulnura, NSW.

Choice of Comparators Grouping characteristics used in identifying the most similar varieties of common knowledge were – Flower: colour yellow/orange, Plant height: medium to tall. On the basis of this the following variety was included in the trial: ‘Golden Yellow’ (syn. *Helichrysum bracteatum monstrosum* ‘Golden Yellow’, AustraHort Pty Ltd). ‘Orange’ (syn. *Helichrysum bracteatum monstrosum* ‘Orange’, AustraHort Pty Ltd) was rejected because of its red flower colour and very tall plant height. The original source materials from which the variety was selected were also included.

Comparative Trial Location: Kulnura, NSW (Latitude 33°14′ South, Elevation 320m) spring – summer 2001. Conditions: plants propagated from cutting then field grown in raised beds and supported by flower mesh. Pre-planting soil dressing of 2000kg/Ha dolomite and 18m3/Ha fowl manure. Soluble fertiliser applied though drip irrigation at 10-day intervals, water daily. Trial design: 20 plants of each variety arranged in a completely randomised design. Measurements: from at least 10 plants from each variety selected randomly.

Prior Applications and Sales

Country	Year	Status	Name Applied
New Zealand	2000	Applied	‘Fire Ball’
EU	2001	Applied	‘Fire Ball’

First sold in Australia in Sep 1999.

Description: **Iain Dawson,** Aranda, ACT.

'Golden Wish'

Application No: 2000/249 Accepted: 28 Aug 2000.
Applicant: **Luff Partnership,** Kulnura, NSW

Characteristics (Table 9, Figure 24) Plant: type bushy, growth habit (bushy types only) erect, height tall, density medium. Stem: hairiness weak. Leaf: length medium, width medium, ratio width/length 1:4, position of broadest part at middle, shape of apex acute, variegation absent, main colour of upper side medium green, hairiness of upper side very weak, hairiness of lower side very weak, undulation of margin weak. Flower shoot: branching present. Flower bud: lateral view of apex rounded. Flower bud: main colour greyed-orange (RHS N172C). Flower head: predominant position in relation to foliage above, diameter medium, lateral view of lower part convex, lateral view of upper part concave, number of bracts many. Involucre: number of colours 1, main colour yellow. Bract: length medium to long, width medium, ratio width/length 1:3, main colour of lower third of bract from inner third of involucre yellow (RHS 9A), main colour of middle third of bract from inner third of involucre yellow (RHS 9A), main colour of upper third of bract from inner third of involucre yellow (RHS 9A), main colour of lower third of bract from middle third of involucre yellow (RHS 9A), main colour of middle third of bract from middle third of involucre yellow (RHS 9A), main colour of upper third of bract from middle third of involucre yellow (RHS 9A), main colour of lower third of bract from outer third of involucre yellow (RHS 9A), main colour of middle third of bract from outer third of involucre yellow (RHS 9A), main colour of upper third of bract from outer third of involucre yellow (RHS 9A). Pappus: colour yellow green. (All RHS colour chart numbers refer to 2001 edition.)

Origin and Breeding Controlled pollination: seed parent breeders code G11/8/7 x pollen parent G4/11/6. Hybridisation took place in Kulnura, NSW in 1997. Parent plants selected after 4 cycles of selection from a breeding program that included the following varieties: 'Dargan Hill White', 'Princess of Wales', 'Dargan Hill Apricot', 'Cockatoo' and an unnamed selection of *Bracteantha bracteata*, breeders code 17/8/9. The seed parent was characterised by large flat flower heads, tall plant height and large flowers. The pollen parent was characterised by medium flower heads with short bracts. Selection criteria: large, concave flower heads with medium to long bracts. Propagation: the original seedling selection has been propagated vegetatively by cutting through 7 generations and found to be uniform and stable. Breeder: R Luff, Kulnura, NSW.

Choice of Comparators Grouping characteristics used in identifying the most similar varieties of common knowledge were – Flower: colour yellow, Plant height: medium to tall. On these bases the following variety was included in the trial: 'Golden Yellow' (syn. *Helichrysum bracteatum monstrosum* 'Golden Yellow', AustraHort Pty Ltd). The original source materials from which the variety was selected were also included.

Comparative Trial Location: Kulnura, NSW (Latitude 33°14′ South, Elevation 320m) spring – summer 2001. Conditions: plants propagated from cutting then field grown in raised beds and supported by flower mesh. Pre-planting soil dressing of 2000kg/Ha dolomite and 18m3/Ha fowl manure. Soluble fertiliser applied though drip irrigation at 10-day intervals, water daily. Trial design: 20 plants of each variety arranged in a completely randomised design. Measurements: from at least 10 plants from each variety selected randomly.

Prior Applications and Sales

Country	Year	Status	Name Applied
New Zealand	2000	Applied	'Golden Wish'

First sold in Australia in Sep 1999.

Description: **Iain Dawson,** Aranda, ACT.

'Lemon Mist'

Application No: 2000/255 Accepted: 28 Aug 2000.
Applicant: **Luff Partnership,** Kulnura, NSW.

Characteristics (Table 9, Figure 24) Plant: type bushy, growth habit (bushy types only) erect, height medium, density medium. Stem: hairiness weak. Leaf: length short to medium, width narrow to medium, ratio width/length 1:8, position of broadest part above middle, shape of apex acute, variegation absent, main colour of upper side medium green, hairiness of upper side very weak, hairiness of lower side very weak, undulation of margin weak. Flower shoot: branching present. Flower bud: lateral view of apex pointed, main colour greyed-yellow (RHS 162C). Flower head: predominant position in relation to foliage level, diameter medium, lateral view of lower part concave, lateral view of upper part concave, number of bracts medium. Involucre: number of colours 1, main colour yellow. Bract: length long, width medium, ratio width/length 1:4, main colour of lower third of bract from inner third of involucre yellow (RHS 4C), main colour of middle third of bract from inner third of involucre yellow (RHS 4C), main colour of upper third of bract from inner third of involucre yellow (RHS 4C), main colour of lower third of bract from middle third of involucre yellow (RHS 4C), main colour of middle third of bract from middle third of involucre yellow (RHS 4C), main colour of upper third of bract from middle third of involucre yellow (RHS 4C), main colour of lower third of bract from outer third of involucre yellow (RHS 4C), main colour of middle third of bract from outer third of involucre yellow (RHS 4C), main colour of upper third of bract from outer third of involucre yellow (RHS 4C). Pappus: colour yellow green. (All RHS colour chart numbers refer to 2001 edition.)

Origin and Breeding Controlled pollination: seed parent breeders code W1/11/6 x pollen parent 'Cockatoo'. Hybridisation took place in Kulnura, NSW in 1997. Seed parent plant selected after 4 cycles of selection from a breeding program that included the following varieties: 'Dargan Hill White', 'Princess of Wales', 'Dargan Hill Apricot', 'Cockatoo' and an unnamed selection of *Bracteantha bracteata*, breeders code 17/8/9. The seed parent was characterised by off-white flower heads with few bracts. The pollen parent was characterised by pale yellow flat flower heads and medium length and width leaves. Selection criteria: pale yellow, cupped flower heads. Propagation: the original seedling selection has been

propagated vegetatively by cutting through 7 generations and found to be uniform and stable. Breeder: R Luff, Kulnura, NSW.

Choice of Comparators Grouping characteristics used in identifying the most similar varieties of common knowledge were – Flower: colour pale yellow, Plant height: medium to tall. On these bases the following variety was included in the trial: 'Cockatoo'. The original source materials from which the variety was selected were also included.

Comparative Trial Location: Kulnura, NSW (Latitude 33°14′ South, Elevation 320m) spring – summer 2001. Conditions: plants propagated from cutting then field grown in raised beds and supported by flower mesh. Pre-planting soil dressing of 2000kg/Ha dolomite and 18m3/Ha fowl manure. Soluble fertiliser applied though drip irrigation at 10-day intervals, water daily. Trial design: 20 plants of each variety arranged in a completely randomised design. Measurements: from at least 10 plants from each variety selected randomly.

Prior Applications and Sales

No prior applications. First sold in Australia in Oct 1999.

Description: **Iain Dawson,** Aranda, ACT.

'Orange Flame'

Application No: 2000/256 Accepted: 28 Aug 2000.
Applicant: **Luff Partnership,** Kulnura, NSW.

Characteristics (Table 9, Figure 24) Plant: type bushy, growth habit (bushy types only) erect, height tall, density medium. Stem: hairiness weak. Leaf: length short to medium, width medium, ratio length/width 6:1, position of broadest part above middle, shape of apex acute, leaf variegation absent, main colour of upper side medium green, hairiness of upper side very weak, hairiness of lower side very weak, undulation of margin very weak. Flower shoot: branching present. Flower bud: lateral view of apex rounded, main colour greyed-orange (RHS 169B). Flower head: predominant position in relation to foliage above, diameter medium, lateral view of lower part convex, lateral view of upper part concave, number of bracts many. Involucre: number of colours 1, main colour yellow. Bract: length medium, width medium, ratio width/length 1:2, main colour of lower third of bract from inner third of involucre yellow (RHS 9A), main colour of middle third of bract from inner third of involucre yellow (RHS 9A), main colour of upper third of bract from inner third of involucre yellow (RHS 9A), main colour of lower third of bract from middle third of involucre yellow (RHS 9A), main colour of middle third of bract from middle third of involucre yellow (RHS 9A), main colour of upper third of bract from middle third of involucre yellow (RHS 9A), main colour of lower third of bract from outer third of involucre greyed-orange (RHS N167B), main colour of middle third of bract from outer third of involucre greyed-orange (RHS N167B), main colour of upper third of bract from outer third of involucre greyed-orange (RHS N167B). Pappus: colour yellow green. (All RHS colour chart numbers refer to 2001 edition.)

Origin and Breeding Controlled pollination: seed parent breeders code O7/5/7 x pollen parent breeders code G4/11/6. Hybridisation took place in Kulnura, NSW in 1998. Parent plants selected after 5 cycles of selection from a breeding program that included the following varieties: 'Dargan Hill White', 'Princess of Wales', 'Dargan Hill Apricot', 'Cockatoo' and an unnamed selection of *Bracteantha bracteata*, breeders code 17/8/9. The seed parent was characterised by medium, cupped, orange flower heads and tall plant height. The pollen parent was characterised by medium diameter, yellow flower heads with small sized bracts. Selection criteria: tall plant height and yellow/orange flowers. Propagation: the original seedling selection has been propagated vegetatively by cutting through 6 generations and found to be uniform and stable. Breeder: R Luff, Kulnura, NSW.

Choice of Comparators Grouping characteristics used in identifying the most similar varieties of common knowledge were – Flower: colour yellow/orange, Plant height: medium to tall. 'Orange' (syn. *Helichrysum bracteatum monstrosum* 'Orange', AustraHort Pty Ltd) was rejected because of its red flower colour and very tall plant height. The closest comparators in the original source material from which the variety was selected were also included.

Comparative Trial Location: Kulnura, NSW (Latitude 33°14′ South, Elevation 320m) spring – summer 2001. Conditions: plants propagated from cutting then field grown in raised beds and supported by flower mesh. Pre-planting soil dressing of 2000kg/Ha dolomite and 18m3/Ha fowl manure. Soluble fertiliser applied though drip irrigation at 10-day intervals, water daily. Trial design: 20 plants of each variety arranged in a completely randomised design. Measurements: from at least 10 plants from each variety selected randomly.

Prior Applications and Sales

Country	Year	Status	Name Applied
New Zealand	2000	Applied	'Orange Flame'

First sold in Australia in Sep 1999.

Description: **Iain Dawson,** Aranda, ACT.

'Rising Sun'

Application No: 2000/252 Accepted: 28 Aug 2000.
Applicant: **Luff Partnership,** Kulnura, NSW

Characteristics (Table 9, Figure 24) Plant: type bushy, growth habit (bushy types only) erect, height tall, density medium. Stem: hairiness weak. Leaf: length short to medium, width medium, ratio width/length 1:5, position of broadest part at middle, shape of apex acute, variegation absent, main colour of upper side medium green, hairiness of upper side very weak, hairiness of lower side very weak, undulation of margin medium. Flower shoot: branching present. Flower bud: lateral view of apex pointed, main colour greyed-orange (RHS 169B). Flower head: predominant position in relation to foliage above, diameter medium, lateral view of lower part concave, lateral view of upper part concave, number of bracts medium. Involucre: number of colours 1, main colour yellow. Bract: length medium, width medium, ratio width/length 1:2, main colour

of lower third of bract from inner third of involucre yellow (RHS 9A), main colour of middle third of bract from inner third of involucre yellow (RHS 9A), main colour of upper third of bract from inner third of involucre yellow (RHS 9A), main colour of lower third of bract from middle third of involucre yellow (RHS 9A), main colour of middle third of bract from middle third of involucre yellow (RHS 9A), main colour of upper third of bract from middle third of involucre yellow (RHS 9A), main colour of lower third of bract from outer third of involucre greyed orange (RHS168B), main colour of middle third of bract from outer third of involucre greyed-orange (RHS168B), main colour of upper third of bract from outer third of involucre greyed-orange (RHS 168B). Pappus: colour yellow-green. (All RHS colour chart numbers refer to 2001 edition.)

Origin and Breeding Controlled pollination: seed parent breeders code G4/11/6 x pollen parent breeders code O8/5/7. Hybridisation took place in Kulnura, NSW in 1998. Parent plants selected after 5 cycles of selection from a breeding program that included the following varieties: 'Dargan Hill White', 'Princess of Wales', 'Dargan Hill Apricot', 'Cockatoo' and an unnamed selection of *Bracteantha bracteata*, breeders code 17/8/9. The seed parent was characterised by flower heads with short yellow bracts. The pollen parent was characterised by tall plant height with orange bracts. Selection criteria: tall plants with yellow/orange flowers. Propagation: the original seedling selection has been propagated vegetatively by cutting through 6 generations and found to be uniform and stable. Breeder: R Luff, Kulnura, NSW.

Choice of Comparators Grouping characteristics used in identifying the most similar varieties of common knowledge were – Flower: colour yellow/orange, Plant height: medium to tall. On these bases the following variety was included in the trial: 'Golden Yellow' (syn. *Helichrysum bracteatum monstrosum* 'Golden Yellow', AustraHort Pty Ltd). The original source materials from which the variety was selected were also included.

Comparative Trial Location: Kulnura, NSW (Latitude 33°14′ South, Elevation 320m) spring – summer 2001. Conditions: plants propagated from cutting then field grown in raised beds and supported by flower mesh. Pre-planting soil dressing of 2000kg/Ha dolomite and 18m3/Ha fowl manure. Soluble fertiliser applied though drip irrigation at 10-day intervals, water daily. Trial design: 20 plants of each variety arranged in a completely randomised design. Measurements: from at least 10 plants from each variety selected randomly.

Prior Applications and Sales

No prior applications. First sold in Australia in Oct 1999.

Description: **Iain Dawson,** Aranda, ACT.

'Yellow Gem'

Application No: 2000/253 Accepted: 28 Aug 2000.
Applicant: **Luff Partnership,** Kulnura, NSW.

Characteristics (Table 9, Figure 24) Plant: type bushy, growth habit (bushy types only) erect, height tall, density medium. Stem: hairiness weak. Leaf: length long, width broad, ratio width/length 1:6, position of broadest part above middle, shape of apex acute, variegation absent, main colour of upper side medium green, hairiness of upper side very weak, hairiness of lower side very weak, undulation of margin weak to medium. Flower shoot: branching present. Flower bud: lateral view of apex pointed, main colour greyed-orange (RHS 163A). Flower head: predominant position in relation to foliage level, diameter large, lateral view of lower part concave, lateral view of upper part concave, number of bracts many. Involucre: number of colours 1, main colour yellow. Bract: length long, width medium ratio width/ length 1:3, main colour of lower third of bract from inner third of involucre yellow (RHS 3A), main colour of middle third of bract from inner third of involucre yellow (RHS 3A), main colour of upper third of bract from inner third of involucre yellow (RHS 3A), main colour of lower third of bract from middle third of involucre yellow (RHS 3A), main colour of middle third of bract from middle third of involucre yellow (RHS 3A), main colour of upper third of bract from middle third of involucre yellow (RHS 3A), main colour of lower third of bract from outer third of involucre yellow (RHS 3A), main colour of middle third of bract from outer third of involucre yellow (RHS 3A), main colour of upper third of bract from outer third of involucre yellow (RHS 3A). Pappus: colour yellow green. (All RHS colour chart numbers refer to 2001 edition.)

Origin and Breeding Controlled pollination: seed parent breeders code Y5/11/6 x pollen parent Y12/1/8. Hybridisation took place in Kulnura, NSW in 1997. Parent plants selected after 4 cycles of selection from a breeding program that included the following varieties: 'Dargan Hill White', 'Princess of Wales', 'Dargan Hill Apricot', 'Cockatoo' and an unnamed selection of *Bracteantha bracteata*, breeders code 17/8/9. The seed parent was characterised by large flower heads, tall plant height and few bracts. The pollen parent was characterised by large, flat flower heads with cupped tips and medium sized bracts. Selection criteria: large flowers and tall plant height. Propagation: the original seedling selection has been propagated vegetatively by cutting through 7 generations and found to be uniform and stable. Breeder: R Luff, Kulnura, NSW.

Choice of Comparators Grouping characteristics used in identifying the most similar varieties of common knowledge were – Flower: colour yellow, Plant height: medium to tall. On these bases the following variety was included in the trial: 'Golden Yellow' (syn. *Helichrysum bracteatum monstrosum* 'Golden Yellow', AustraHort Pty Ltd). The original source materials from which the variety was selected were also included.

Comparative Trial Location: Kulnura, NSW (Latitude 33(14(South, Elevation 320m) spring – summer 2001. Conditions: plants propagated from cutting then field grown in raised beds and supported by flower mesh. Pre-planting soil dressing of 2000kg/Ha dolomite and 18m3/Ha fowl manure. Soluble fertiliser applied though drip irrigation at 10-day intervals, water daily. Trial design: 20 plants of each variety arranged in a completely randomised design. Measurements: from at least 10 plants from each variety selected randomly.

Prior Applications and Sales

No prior applications. First sold in Australia in Oct 1999.

Description: **Iain Dawson,** Aranda, ACT.

Table 9 *Bracteantha* varieties

	'Orange Flame'	'Lemon Mist'	'Fire Ball'	'Yellow Gem'	'Rising Sun'	'Golden Wish'	*'Princess of Wales'	*'Cockatoo'	*'Golden Yellow'	*'No 17/8/9'
PLANT HEIGHT	tall	medium	medium	tall	tall	tall	medium	medium	very tall	medium
PLANT DENSITY	medium	medium	medium	medium	medium	medium	medium	dense	sparse	sparse to medium
STEM HAIRINESS	weak	weak	weak	weak	weak	weak	weak	weak	very weak	weak
LEAF LENGTH	short to medium	short to medium	medium	long	short to medium	medium	medium	medium	medium	medium
LEAF WIDTH	medium	narrow to medium	medium	broad	medium	bushy	medium	medium	medium	medium
LEAF:WIDTH/LENGTH RATIO	1:6	1:8	1:7	1:6	1:5	1:4	1:6	1:5	1:5	1:6
LEAF: POSITION OF BROADEST PART	above middle	above middle	at middle	above middle	at middle	at middle	above middle	above middle	at middle	at middle
LEAF: MAIN COLOUR OF UPPER SIDE	medium green	medium green	medium green	medium green	medium green	medium green	medium green	medium green	dark green	medium green
LEAF: UNDULATION OF MARGIN	very weak	weak	medium	weak to medium	medium	weak	very weak	weak	strong	very weak
FLOWER BUD: LATERAL VIEW OF APEX	rounded	pointed	pointed	pointed	pointed	rounded	pointed	pointed	rounded	rounded
FLOWER BUD: MAIN COLOUR (RHS, 2001)	169B	162C	178B	163A	169B	N172C	165B	158A	9A	163A
FLOWER HEAD: PREDOMINANT POSITION IN RELATION TO FOLIAGE	above	level	level	level	above	above	above	level	above	above
FLOWER HEAD: DIAMETER	medium	medium	small to medium	large	medium	medium	large	medium	small to medium	medium
FLOWER HEAD: LATERAL VIEW OF LOWER PART	convex	concave	flat	concave	concave	convex	concave	flat	convex	concave
FLOWER HEAD: LATERAL VIEW OF UPPER PART	concave	concave	concave	concave	concave	concave	concave	flat	concave	concave
FLOWER HEAD: NUMBER OF BRACTS	many	medium to many	many	many	medium	many	medium	medium	many	many
INVOLUCRE: NUMBER OF COLOURS	1	1	2	1	1	1	1	1	1	1
BRACT LENGTH	medium	long	medium	long	medium	medium to long	long	medium to long	short	medium to long

Table 9 continued

BRACT WIDTH	medium	medium	narrow to medium	medium	medium	medium	medium	medium	narrow	medium
BRACT WIDTH/LENGTH RATIO	1:2	1:4	1:3	1:3	1:2	1:3	1:3	1:3	1:3	1:3
BRACT: MAIN COLOUR OF INNER THIRD OF INVOLUCRE (RHS, 2001)										
Lower third of bract	9A	4C	12A	3A	9A	9A	3A	4D	9A	9A
Middle third of bract	9A	4C	17A	3A	9A	9A	3A	4B	9A	9A
Upper third of bract	9A	4C	12A	3A	9A	9A	3A	4B	9A	9A
BRACT: MAIN COLOUR OF MIDDLE THIRD OF INVOLUCRE (RHS, 2001)										
Lower third of bract	9A	4C	12A	3A	9A	9A	3A	4D	9A	9A
Middle third of bract	9A	4C	17A	3A	9A	9A	3A	4B	9A	9A
Upper third of bract	9A	4C	17A	3A	9A	9A	3A	4B	9A	9A
BRACT: MAIN COLOUR OF OUTER THIRD OF INVOLUCRE (RHS, 2001)										
Lower third of bract	N167B	4C	–	3A	168B	9A	3A	158D	9A	163D
Middle third of bract	N167B	4C	187D	3A	168B	9A	3A	158D	9A	163D
Upper third of bract	N167B	4C	178A	3A	168B	9A	3A	158A	9A	163B
PAPPUS: COLOUR	yellow green	yellow green	yellow green	yellow green	yellow green	yellow green	yellow green	yellow green	yellow green	yellow green

Brassica napus var. *oleifera*
Canola

'44C73'

Application No: 2001/149 Accepted: 11 Jun 2001.
Applicant: **Pioneer Hi-Bred International, Inc.,** Des Moines, Iowa, USA.
Agent: **Pioneer Hi-Bred Australia Pty Ltd,** Toowoomba, QLD.

Characteristics (Table 10, Figure 41) Plant: height medium (average 111.75cm). Leaf: green colour medium, lobes present, number of lobes many, dentation of margin strong, length short (average 21.79cm), width narrow (average 9.99cm). Time of flowering: medium (97 days after sowing). Flower: colour of petals yellow, petal length long (average 13.83mm), petal width medium (average 7.62mm), petals length/width ratio 1.81. Siliqua: length long (average 76.2mm), length of beak medium (average 13.48mm), length of peduncle medium (average 24.67mm). Time of maturity: early. Seed: erucic acid absent. Herbicide resistance: tolerant to imidazolinone. Blackleg resistance: moderately resistant.

Origin and Breeding Controlled pollination: seed parent '45A71'/'Quantum'//'Oscar'(Þ) x pollen parent 'Rainbow'(Þ), followed by a modified pedigree breeding method. The parental varieties '45A71' and 'Quantum' are susceptible to blackleg disease; 'Oscar'(Þ) and 'Rainbow'(Þ) are non-tolerant to imidazolinone herbicides. Selection criteria: yield, canola quality oil and protein, blackleg resistance (*Leptosphearia maculans*), and tolerance to imidazolinone (Onduty®). Propagation: seed. Breeder: Dr Jay Patel, Pioneer Hi-Bred International, Inc., Georgetown, Ontario, Canada.

Choice of Comparators The grouping characteristics used in identifying the most similar varieties of common knowledge were – Time of maturity: early, Herbicide resistance: tolerant to imidazolinone, Plant height: medium. On these bases, '44C71' and 'Surpass402CL' were considered for the comparative trial, as these are similar varieties of common knowledge with resistant to the same herbicide (Onduty®). '44C71' is a widely available commercial variety with similar maturity. 'Surpass402CL', was chosen because of its similarity in maturity and height. The parental varieties '45A71' and 'Quantum' were not considered for the trial as they have very minimal resistance to blackleg. 'Oscar'(Þ) and 'Rainbow'(Þ) are not resistant to Onduty®.

Comparative Trial Location: Wagga Wagga, NSW, Jun 2001 to Dec 2001. Conditions: field trial conducted on heavy grey cracking clay soil supplemented with nitrogen and phosphorus fertilisers. Trial design: 1m wide x 3m long field plots, 4 replicates of each variety arranged in a randomised block design. Measurements: fifteen samples selected at random for each replicate of each variety.

Prior Applications and Sales Nil.

Description: **Milton Jaeger,** Pioneer Hi-Bred Australia Pty Ltd., Wagga Wagga, NSW.

Table 10 *Brassica* varieties

	'44C73'	*'44C71'	*'Surpass 402CL'
PLANT: HEIGHT (cm)			
mean	111.75	102.20	104.90
std deviation	9.06	6.55	7.93
LSD/sig	6.61	P≤0.01	P≤0.01
LEAF: GREEN COLOUR (light, medium, dark)			
	medium	medium	dark
LEAF: LOBE NUMBER (few, medium, many)			
	many	medium	few
LEAF: DENTATION OF MARGIN (1 = very weak, 5 = medium, 9 = very strong)			
	7	6	4
LEAF: LENGTH (cm)			
mean	21.79	21.75	17.08
std deviation	4.58	4.94	3.17
LSD/sig	2.07	ns	P≤0.01
LEAF: WIDTH (cm)			
mean	9.99	9.56	8.16
std deviation	2.45	1.49	1.70
LSD/sig	0.93	ns	P≤0.01
TIME OF FLOWERING (Days after sowing: 27-6-01)			
	97	98	95
PETAL: WIDTH (mm)			
mean	7.62	8.11	6.97
std deviation	1.14	0.80	0.97
LSD/sig	0.47	P≤0.01	P≤0.01
SILIQUA: LENGTH (mm)			
mean	76.20	70.68	66.94
std deviation	5.67	5.19	5.07
LSD/sig	2.56	P≤0.01	P≤0.01
SILIQUA: LENGTH OF BEAK (mm)			
mean	13.48	12.46	12.03
std deviation	2.14	1.30	1.77
LSD/sig	0.85	P≤0.01	P≤0.01

'46C74'

Application No: 2001/150 Accepted: 11 Jun 2001.
Applicant: **Pioneer Hi-Bred International, Inc.,** Des Moines, Iowa, USA.
Agent: **Pioneer Hi-Bred Australia Pty Ltd,** Toowoomba, QLD.

Characteristics (Table 11, Figure 42) Plant: height medium (average 109.40cm). Leaf: green colour light, lobes present, number of lobes many, dentation of margin medium, length short (average 24.63cm), width medium (average 11.20cm). Time of flowering: late (119 days after sowing). Flower: colour of petals yellow, petal length long (average 14.89mm), petal width medium (average 8.50mm), petals length/width ratio 1.75. Siliqua: length long (average 84.39mm), length of beak medium (average 15.69mm), length of peduncle medium (average 24.22mm). Time of maturity: late. Seed: erucic acid absent. Herbicide resistance: tolerant to imidazolinone. Blackleg resistance: moderately resistant.

Origin and Breeding Controlled pollination: seed parent '46A72'/'Quantum'//'Dunkeld'(ϕ x pollen parent 'Dunkeld'(ϕ, followed by a modified pedigree breeding method. The parental varieties '46A72' and 'Quantum' are susceptible to blackleg disease; 'Dunkeld'(ϕ is non-tolerant to imidazolinone herbicides. Selection criteria: yield, canola quality oil and protein, blackleg resistance (*Leptosphearia maculans*), and tolerance to imidazolinone (Onduty®). Propagation: seed. Breeder: Dr Jay Patel, Pioneer Hi-Bred International, Inc., Georgetown, Ontario, Canada.

Choice of Comparators The grouping characteristics used in identifying the most similar varieties of common knowledge were – Herbicide resistance: tolerant to imidazolinone, Plant height: medium. On these bases, 'Surpass603CL' and 'Surpass402CL' were considered for the comparative trial, as these are similar varieties of common knowledge with resistant to the same herbicide (Onduty®) and similar plant height. The parental varieties '46A72' and 'Quantum' were not considered for the trial as they have very minimal resistance to blackleg and 'Dunkeld'(ϕ is not resistant to Onduty®.

Comparative Trial Location: Wagga Wagga, NSW, Jun 2001 to Dec 2001. Conditions: field trial conducted on heavy grey cracking clay soil supplemented with nitrogen and phosphorus fertilisers. Trial design: 1m wide x 3m long field plots, 4 replicates of each variety arranged in a randomised block design. Measurements: fifteen samples selected at random for each replicate of each variety.

Prior Applications and Sales Nil.

Description: **Milton Jaeger,** Pioneer Hi-Bred Australia Pty Ltd., Wagga Wagga, NSW.

Table 11 *Brassica* varieties

	'46C74'	*'Surpass 603CL'	*'Surpass 402CL'
LEAF: GREEN COLOUR (light, medium, dark)			
	light	dark	dark
LEAF: LOBE NUMBER (few, medium, many)			
	many	medium	few
LEAF: DENTATION OF MARGIN (1=very weak, 5 = medium, 9=very strong)			
	5	4	4
LEAF: LENGTH (cm)			
mean	24.63	20.28	17.08
std deviation	4.65	3.50	3.17
LSD/sig	1.48	P≤0.01	P≤0.01
LEAF: WIDTH (cm)			
mean	11.20	8.79	8.16
std deviation	2.47	1.96	1.70
LSD/sig	1.00	P≤0.01	P≤0.01

Table 11 continued

TIME OF FLOWERING (Days after sowing: 27-6-01)			
	119	98	95
PETAL LENGTH (mm)			
mean	14.89	13.45	14.48
std deviation	1.39	1.48	2.01
LSD/sig	0.80	P≤0.01	ns
PETAL: WIDTH (mm)			
mean	8.50	7.25	6.97
std deviation	0.92	0.58	0.97
LSD/sig	0.41	P≤0.01	P≤0.01
SILIQUA: LENGTH (mm)			
mean	84.39	70.89	66.94
std deviation	6.03	3.49	5.07
LSD/sig	2.40	P≤0.01	P≤0.01
SILIQUA: LENGTH OF BEAK (mm)			
mean	15.69	13.83	12.03
std deviation	1.77	1.35	1.77
LSD/sig	0.79	P≤0.01	P≤0.01

'45C75'

Application No: 2001/151 Accepted: 11 Jun 2001.
Applicant: **Pioneer Hi-Bred International, Inc.,** Des Moines, Iowa, USA.
Agent: **Pioneer Hi-Bred Australia Pty Ltd,** Toowoomba, QLD.

Characteristics (Table 12, Figure 43) Plant: height medium (average 114.70cm). Leaf: green colour medium, lobes present, number of lobes many, dentation of margin medium, length short (average 24.67cm), width medium (average 10.86cm). Time of flowering: medium-late (112 days after sowing). Flower: colour of petals yellow, petal length long (average 13.71mm), petal width medium (average 7.13mm), petals length/width ratio 1.92. Siliqua: length long (average 71.96mm), length of beak medium (average 11.91mm), length of peduncle medium (average 26.06mm). Time of maturity: medium-late. Seed: erucic acid absent. Herbicide resistance: tolerant to imidazolinone. Blackleg resistance: moderately resistant.

Origin and Breeding Controlled pollination: seed parent '45A71'/'Quantum'//'Dunkeld'(Þ) x pollen parent 'Oscar'(Þ), followed by a modified pedigree breeding method. The parental varieties '45A71' and 'Quantum' are susceptible to blackleg disease; 'Dunkeld'(Þ) and 'Oscar'(Þ) are non-tolerant to imidazolinone herbicides. Selection criteria: yield, canola quality oil and protein, blackleg resistance (*Leptosphearia maculans*), and tolerance to imidazolinone (Onduty®). Propagation: seed. Breeder: Dr Jay Patel, Pioneer Hi-Bred International, Inc., Georgetown, Ontario, Canada.

Choice of Comparators The grouping characteristics used in identifying the most similar varieties of common knowledge were – Herbicide resistance: tolerant to imidazolinone, Plant height: medium. On these bases, 'Surpass603CL' and 'Surpass402CL' were considered for the comparative trial, as these are similar varieties of common knowledge with resistant to the same herbicide (Onduty®) and similar plant height. The parental varieties '45A71' and 'Quantum' were not considered for the trial as they have very minimal resistance to blackleg. 'Dunkeld'(Þ) and 'Oscar'(Þ) are not resistant to Onduty®.

Comparative Trial Location: Wagga Wagga, NSW, Jun 2001 to Dec 2001. Conditions: field trial conducted on heavy grey cracking clay soil supplemented with nitrogen and phosphorus fertilisers. Trial design: 1m wide x 3m long field plots, 4 replicates of each variety arranged in a randomised block design. Measurements: fifteen samples selected at random for each replicate of each variety.

Prior Applications and Sales Nil.

Description: **Milton Jaeger,** Pioneer Hi-Bred Australia Pty Ltd., Wagga Wagga, NSW.

Table 12 *Brassica* varieties

	'45C75'	***'Surpass 603CL'**	***'Surpass 402CL'**
PLANT: HEIGHT (cm)			
mean	114.70	115.10	104.90
std deviation	8.54	9.19	7.93
LSD/sig	7.15	ns	P≤0.01
LEAF: GREEN COLOUR (light, medium, dark)			
	medium	dark	dark
LEAF: LOBE NUMBER (few, medium, many)			
	many	medium	few
LEAF: DENTATION OF MARGIN (1=very weak, 5 = medium, 9=very strong)			
	6	4	4
LEAF: LENGTH (cm)			
mean	24.67	20.28	17.08
std deviation	4.75	3.50	3.17
LSD/sig	1.86	P≤0.01	P≤0.01
LEAF: WIDTH (cm)			
mean	10.86	8.79	8.16
std deviation	2.35	1.96	1.70
LSD/sig	0.97	P≤0.01	P≤0.01
TIME OF FLOWERING (Days after sowing: 27-6-01)			
	112	98	95
PETAL LENGTH (mm)			
mean	13.71	13.45	14.48
std deviation	1.42	1.48	2.01
LSD/sig	0.80	ns	ns
PETAL: WIDTH (mm)			
mean	7.13	7.25	6.97
std deviation	0.80	0.58	0.97
LSD/sig	0.39	ns	ns
SILIQUA: LENGTH (mm)			
mean	71.96	70.89	66.94
std deviation	5.53	3.49	5.07
LSD/sig	2.30	ns	P≤0.01

SILIQUA: LENGTH OF BEAK (mm)			
mean	11.91	13.83	12.03
std deviation	1.23	1.35	1.77
LSD/sig	0.71	P≤0.01	ns

'AG-Castle'

Application No: 2001/300 Accepted: 6 Nov 2001.
Applicant: **Ag-Seed Research Pty Ltd,** Horsham, VIC.

Characteristics (Table 13, Figure 39) Plant: habit erect, height tall (136cm). Seedling: cotyledon width/length ratio wide (mean 1.91). Leaf: green colour medium (RHS 137B-C, 1986), extent of hair in first true leaf few, lobes present, 5th leaf mostly not lobed (35.8% lobed), dentation of margin strong. Time of flowering: medium (97 days after sowing). Flower: colour of petals yellow, petal length/width ratio wide (mean 1.99), anther dotting present (83.3%). Siliqua: length medium-long (52.5mm), length of pedicel medium (23.1mm), length of beak medium (10.1mm). Time of maturity: medium-early. Seed: erucic acid absent, colour black, canola quality. Herbicide tolerance: absent. Blackleg resistance: resistant.

Origin and Breeding Controlled pollination: 'AG-Castle' was developed by controlled cross pollination in 1995, and using a modified pedigree breeding method. The seed parent 'Rainbow'(ϕ) is characterised by medium maturity, stable yields across different growing seasons/areas and medium to low oil content. The pollen parent 'Shiralee*11' (released in 1994 as 'Range') is a late maturing canola variety suited to high (500mm+) rainfall districts of southern Australia with relatively low oil content and reasonable blackleg disease resistance. A series of single plant selections (sps) were taken from field nurseries at Horsham, VIC in 1996 and 1997 selected on maturity, disease resistance, oil content, yield, protein content and plant type. Disease and small plot yield testing at Horsham and Mininera, VIC were conducted in 1998 and 1999. In 2000 the variety was entered into the Interstate Stage 2 Canola Trials and then to Stage 4 in 2001, as 'AGC10', and was trialed in a range of locations covering relevant canola growing regions of Australia for 2 years. Selection criteria: mid season maturity, higher oil content, resistance to blackleg, grain yield. Propagation: open pollinated seed. Breeder: developed by an Ag-Seed Research team lead by Dr. Gururaj P. Kadkol, Horsham, VIC.

Choice of Comparators The grouping characteristics used in identifying the most similar varieties of common knowledge were – Time of maturity: medium Herbicide resistance: absent (conventional type), Leaf: lobes present, Seed erucic acid: absent. On the basis of these grouping characteristics following varieties were selected as comparators – 'Charlton'(ϕ), 'Insignia'(ϕ) and 'Ripper'(ϕ) were used as comparators. 'Charlton'(ϕ) has been a leading medium maturity conventional canola variety in Australia since 1998. 'Insignia'(ϕ) and 'Ripper'(ϕ) are both new conventional canola varieties suited to medium maturity zones.

Comparative Trial Location: Ag-Seed Research trial site at Horsham, VIC during 2001. Conditions: data on mature plant characters were collected in replicated trial conducted in open field. Seedling character data were collected in glasshouse trials. Trial design: 3 replications of six row x 10m plots laid out as randomised blocks. Measurements: data recorded on 20 random plants from each of the three replicates giving a total of 60 observations per variety.

Prior Applications and Sales Nil.

Description: **Kate Light,** Assistant Breeder, Ag-Seed Research, Horsham, VIC.

Table 13 *Brassica* varieties

	'AG-Castle'	*'Charlton'ϕ	*'Insignia'ϕ	*'Ripper'ϕ
COTYLEDON WIDTH/LENGTH				
mean	1.916	1.855	2.050	1.727
std deviation	0.132	0.148	0.187	0.157
LSD/sig	0.067	ns	P≤0.01	P≤0.01
PLANT HEIGHT (cm)				
mean	136.08	134.77	123.33	132.97
std deviation	6.17	8.73	6.33	6.25
LSD/sig	3.61	ns	P≤0.01	ns
EXTENT OF HAIRS ON FIRST TRUE LEAF				
absent	14	13	41	14
few	40	40	17	46
numerous	6	7	2	0
PERCENTAGE OF LEAF LOBING				
present	35.8	73.3	70	86.6
LOBE NUMBER PER LEAF WITH LOBES				
mean	2.96	3.21	3.36	3.27
DAYS TO 50% FLOWERING				
	97	100	99	100
PETAL LENGTH/WIDTH				
mean	1.995	1.900	1.832	1.996
std deviation	0.168	0.147	0.129	0.120
LSD/sig	0.076	P≤0.01	P≤0.01	ns
PERCENTAGE OF ANTHER DOTTING				
present	83.3	76.6	95	98.3
SILIQUA LENGTH (mm)				
mean	52.5	55.58	58.52	54.06
std deviation	4.48	5.56	5.52	5.72
LSD/sig	2.413	P≤0.01	P≤0.01	ns
PEDICEL LENGTH (mm)				
mean	23.09	27.17	29.31	28.09
std deviation	4.13	4.35	4.88	4.92
LSD/sig	2.027	P≤0.01	P≤0.01	P≤0.01
BEAK LENGTH (mm)				
mean	10.10	15.49	12.90	15.03
std deviation	1.76	2.19	1.85	2.45
LSD/sig	0.947	P≤0.01	P≤0.01	P≤0.01
SILIQUA WIDTH (mm)				
mean	4.062	4.466	4.449	4.193
std deviation	0.450	0.500	0.569	0.483
LSD/sig	0.227	P≤0.01	P≤0.01	ns

'ATR-Beacon'

Application No: 2001/136 Accepted: 28 May 2001.
Applicant: **Agriculture Victoria Services Pty Ltd,** Attwood, VIC and **Grains Research and Development Corporation,** Barton, ACT.
Agent: **Ag-Seed Research Pty Ltd,** Horsham, VIC.

Characteristics (Table 14, Figure 38) Plant: habit erect, height medium-tall (118cm). Seedling: cotyledon width/length ratio wide (mean 1.99). Leaf: green colour medium (RHS 137C, 1986), extent of hair in first true leaf few, lobes present, 5th leaf mostly lobed (80% lobed), dentation of margin strong. Time of flowering: medium (97 days after sowing). Flower: colour of petals yellow, petal length/width ratio wide (mean 1.79), anther dotting present (92.5%). Siliqua: length medium-long (52.5mm), length of pedicel medium (23.0mm), length of beak medium (10.5mm). Time of maturity: medium -early. Seed: erucic acid absent, colour black, canola quality. Herbicide tolerance: tolerant to Triazine. Blackleg resistance: resistant.

Origin and Breeding Single plant selection: 'ATR-Beacon' was developed from a process of single plant selections (sps) initiated in 1993 from a line named TI1 (which was later released as 'TI1 Pinnacle'ϕ). 'TI1 Pinnacle'ϕ is characterised by triazine tolerance, medium seedling vigour, poor blackleg resistance, medium maturity and lower oil content. Between 1993 and 1995 three stages of sps were selected from segregating material based on plant height, maturity, yield potential, oil content and disease resistance in nurseries at Lake Bolac and Horsham, VIC. In 1999 the variety was entered into the Interstate Stage 2 Canola Trials and then to Stage 4 in 2000, as TN4, and was trialed in a range of locations covering relevant canola growing regions of Australia for 2 years. Selection criteria: higher oil content, blackleg resistance, higher yield. Propagation: open-pollinated seed. Breeders: Dr. PA Salisbury, Mr. W. Burton, VIDA, Agriculture Victoria, Horsham, VIC.

Choice of Comparators The grouping characteristics used in identifying the most similar varieties of common knowledge were – Time of maturity: medium-early, Herbicide resistance: tolerant to Triazine, Leaf: lobes present, Seed erucic acid: absent. On the basis of these grouping characteristics following varieties were selected as comparators – 'TI1 Pinnacle'ϕ, 'ATR-Hyden' and 'ATR Grace'. 'TI1 Pinnacle'ϕ has been a leading medium maturing triazine tolerant canola variety in Australia since 1997 and is also the seed parent for 'ATR-Beacon'. 'ATR Hyden' is a leading medium-early maturity triazine tolerant canola variety released in Australia in 2001. 'ATR Grace' is included as a recently released medium maturity triazine tolerant canola variety.

Comparative Trial Location: Ag-Seed Research trial site at Horsham, VIC during 2001. Conditions: data on mature plant characters were collected in replicated trial conducted in open field. Seedling character data were collected in glasshouse trials. Trial design: 3 replications of six row x 10m plots laid out as randomised blocks. Measurements: data recorded on 20 random plants from each of the three replicates giving a total of 60 observations per variety.

Prior Applications and Sales Nil.

Description: **Kate Light,** Assistant Breeder, Ag-Seed Research, Horsham, VIC.

Table 14 *Brassica* varieties

	'ATR-Beacon'	*'TI1 Pinnacle'ϕ	*'ATR-Hyden'	*'ATR-Grace'
COTYLEDON WIDTH/LENGTH				
mean	1.998	1.969	1.856	1.923
std deviation	0.873	0.096	0.105	0.138
LSD/sig	0.046	ns	P≤0.01	P≤0.01
PLANT HEIGHT (cm)				
mean	118.35	120.88	125.20	120.20
std deviation	8.23	6.40	6.70	5.50
LSD/sig	3.66	ns	P≤0.01	ns
EXTENT OF HAIRS ON FIRST TRUE LEAF				
absent	13	19	10	20
few	38	36	47	36
numerous	9	5	3	4
PERCENTAGE OF LEAF LOBING				
present	80	87	87	85
LOBE NUMBER PER LEAF WITH LOBES				
mean	2.9	3.0	2.9	3.1
DAYS TO 50% FLOWERING				
	97	101	99	103
PETAL LENGTH/WIDTH				
mean	1.79	1.94	1.87	1.89
std deviation	0.15	0.13	0.16	0.12
LSD/sig	0.07	P≤0.01	P≤0.01	P≤0.01
PERCENTAGE OF ANTHER DOTTING				
present	92.5	99	93	100
SILIQUA LENGTH (mm)				
mean	52.58	49.33	49.63	51.14
std deviation	5.13	4.92	3.92	5.43
LSD/sig	2.18	P≤0.01	P≤0.01	ns
SILIQUA WIDTH (mm)				
mean	4.33	3.78	4.35	4.12
std deviation	0.43	0.51	0.43	0.50
LSD/sig	0.20	P≤0.01	ns	P≤0.01

'ATR-Eyre'

Application No: 2001/309 Accepted: 26 Nov 2001.
Applicant: **Agriculture Victoria Services Pty Ltd,** Attwood, VIC and **Grains Research and Development Corporation,** Barton, ACT.
Agent: **Ag-Seed Research Pty Ltd,** Horsham, VIC.

Characteristics (Table 15, Figure 40) Plant: habit erect, height medium-short (110cm). Seedling: cotyledon width/length ratio wide (mean 2.0). Leaf: green colour medium (RHS 137B-C, 1986), extent of hair in first true leaf numerous, lobes present, 5th leaf mostly lobed (85% lobed), dentation of margin strong. Time of flowering: medium (94 days after sowing). Flower: colour of petals

yellow, petal length/width ratio wide (mean 1.94), anther dotting present (75%). Siliqua: length medium-long (58.6mm), length of pedicel medium (21.3mm), length of beak medium (12.8mm). Time of maturity: early. Seed: erucic acid absent, colour black, canola quality. Herbicide tolerance: tolerant to Triazine. Blackleg resistance: moderately resistant.

Origin and Breeding Controlled pollination: 'ATR-Eyre' was developed by controlled cross pollination in 1997, and using a modified pedigree breeding method. The seed parent, TL1 was a cross between 2 Agriculture Victoria breeding lines. The pollen parent, RK7*S (RK7 was released as 'Mystic'ϕ in 1998) is characterised by the absence of triazine tolerance (it is a conventional line), compact plant type and early maturity. Single plant selections (sps) were taken from blackleg nurseries, Lake Bolac and Wonwondah, VIC, in 1999 and were promoted based on maturity, yield, oil content and blackleg resistance. In 2000 the variety was entered into the Interstate Stage 2 Canola Trials and then to Stage 4 in 2000, as TO3, and was trialed in a range of locations covering relevant canola growing regions of Australia for 2 years. Selection criteria: higher oil content, blackleg resistance, higher yield. Propagation: open pollinated seed. Breeders: Mr. W. Burton, Ms M English, VIDA, Agriculture Victoria, Horsham, VIC.

Choice of Comparators The grouping characteristics used in identifying the most similar varieties of common knowledge were – Time of maturity: medium-early, Herbicide resistance: tolerant to Triazine. Leaf: lobes present, Seed erucic acid: absent. On the basis of these grouping characteristics following varieties were selected as comparators – 'Karoo'ϕ, 'ATR-Hyden' and 'Surpass-501TT'. 'Karoo'ϕ has been the leading early maturing triazine tolerant canola variety in Australia since it's release in 1996. 'ATR-Hyden' is a leading medium-early maturity triazine tolerant canola variety released in Australia in 2001. 'Surpass501TT' is a third medium-early maturity triazine tolerant canola variety.

Comparative Trial Location: Ag-Seed Research trial site at Horsham, VIC during 2001. Conditions: data on mature plant characters were collected in replicated trial conducted in open field. Seedling character data were collected in glasshouse trials. Trial design: 3 replications of six row x 10m plots laid out as randomised blocks. Measurements: data recorded on 20 random plants from each of the three replicates giving a total of 60 observations per variety.

Prior Applications and Sales Nil.

Description: **Kate Light,** Assistant Breeder, Ag-Seed Research, Horsham, VIC.

Table 15 *Brassica* varieties

	'ATR-Eyre'	*'Karoo'ϕ	*'ATR-Hyden'	*'Surpass-501TT'
COTYLEDON WIDTH/LENGTH				
mean	2.04	2.06	1.86	2.18
std deviation	0.13	0.18	0.11	0.13
LSD/sig	0.75	ns	P≤0.01	P≤0.01
PLANT HEIGHT (cm)				
mean	110.2	95.3	125.2	127.0
std deviation	6.7	7.8	6.7	7.2
LSD/sig	3.5	P≤0.01	P≤0.01	P≤0.01
EXTENT OF HAIRS ON FIRST TRUE LEAF				
absent	3	38	10	0
few	11	15	47	9
numerous	46	7	3	51
PERCENTAGE OF LEAF LOBING				
present	85	83	87	90
LOBE NUMBER PER LEAF WITH LOBES				
mean	3.1	3.1	2.9	3.0
DAYS TO 50% FLOWERING				
	94	97	99	95
PERCENTAGE OF ANTHER DOTTING				
present	75	85	93	98
SILIQUA LENGTH (mm)				
mean	58.60	47.15	49.64	50.46
std deviation	6.74	6.40	3.95	4.87
LSD/sig	3.14	P≤0.01	P≤0.01	P≤0.01
BEAK LENGTH (mm)				
mean	12.83	11.34	11.64	13.24
std deviation	2.02	1.94	1.41	1.97
LSD/sig	0.95	P≤0.01	P≤0.01	ns
SILIQUA WIDTH (mm)				
mean	3.98	4.49	4.34	4.25
std deviation	0.43	0.68	0.43	0.45
LSD/sig	0.27	P≤0.01	P≤0.01	P≤0.01

'Lantern'

Application No: 2001/297 Accepted: 6 Nov 2001.
Applicant: **Department of Agriculture for and on behalf of the State of New South Wales,** Orange, NSW and **Grains Research and Development Corporation,** Barton, ACT.
Agent: **SGB Australia Ltd,** Melbourne, VIC.

Characteristics (Table 16, Figure 44) Plant: habit erect, height medium. Leaf: green colour medium, extent of hair in first true leaf strong, lobes present, number of lobes few-medium, dentation of margin medium. Time of flowering: medium (95 days after sowing). Flower: colour of petals yellow, petal length short, width narrow, anther dotting present (23%). Siliqua: length short, length of peduncle short, length of beak short. Time of maturity: medium. Seed: erucic acid absent. Herbicide tolerance: absent. Blackleg resistance: resistant.

Origin and Breeding Single plant selection: during 1998 a single plant selection, designated BLN1389-9, was taken from a NSW Agriculture proprietary breeding line BLN1389 in a blackleg evaluation nursery at Agricultural Research Institute, Wagga Wagga. BLN1389 has relatively less blackleg resistance compared to the candidate variety. Selection criteria: BLN1389-9 was selected for blackleg resistance and high oil and protein content. The selection was renamed BLN1981 for trials from 1999 – 2001 where it was evaluated for yield and adaptation. BLN1981 was

finally released as 'Lantern'. Propagation: by seed. Breeder: Neil Wratten, Agriculture Research Institute, Wagga Wagga, NSW.

Choice of Comparators The grouping characteristics used in identifying the most similar varieties of common knowledge was – Time of maturity: medium. On the basis of this grouping character the following comparator varieties were included in the trial: 'Charlton'ϕ, 'Insignia'ϕ, 'Ripper'ϕ and 'Surpass600'ϕ. The seed of the parent line of 'Lantern' is a non-commercial breeding line and therefore, was excluded.

Comparative Trial Locations: Donald, North West VIC, sown on 18 Jun 2001 and Horsham, VIC, sown on 12 Jul 2001. Conditions: conducted in a dryland field trial under normal agronomic practices at Donald and plants propagated in a glasshouse from seed at Horsham using potting mix (pine bark base) as a growing medium in seedling trays, nutrition maintained with slow release fertiliser. Trial design: Donald – 6 row x 8 metre plots sown in randomised blocks with three replicates, Horsham – completely randomised, two replicate trial sown in seedling trays. Measurements: cotyledons and leaves – thirty plants were sampled at random from each replicate at Horsham. Petal data – 20 random samples from each of the three replicates were sampled at Donald. Siliqua and plant height – two replicates were sampled with 30 random samples taken from each replicate at Donald. One sample per plant.

Prior Applications and Sales Nil.

Description: **Paul Rudolph and Gururaj Kadkol,** Nugrain Pty Ltd, Horsham, VIC.

Table 16 *Brassica* varieties

	'Lantern'	***'Charlton'ϕ**	***'Insignia'ϕ**	***'Ripper'ϕ**	***'Surpass600'ϕ**
COTYLEDON: WIDTH (mm)					
mean	23.66	26.78	29.48	23.43	26.46
std deviation	2.01	1.86	2.44	2.04	1.72
LSD/sig	1.10	P≤0.01	P≤0.01	ns	P≤0.01
COTYLEDON: LENGTH (mm)					
mean	13.88	15.20	15.33	13.79	15.44
std deviation	0.93	1.36	1.07	0.94	1.05
LSD/sig	0.58	P≤0.01	P≤0.01	ns	P≤0.01
COTYLEDON: RATIO OF WIDTH / LENGTH					
mean	1.71	1.78	1.92	1.70	1.73
std deviation	0.14	0.13	0.12	0.12	0.11
LSD/sig	0.07	ns	P≤0.01	ns	ns
PLANT: HEIGHT (cm)					
mean	113.9	113.0	113.3	122.2	123.5
std deviation	7.9	7.3	7.2	9.5	6.8
LSD/sig	3.9	ns	ns	P≤0.01	P≤0.01
LEAF: HAIRS ON THE FIRST TRUE LEAF (% Present)					
	85	48	13	78	100
LEAF: LOBES (% present)					
	37	45	82	67	100
LEAF: NO OF LOBES					
	3.4	3.0	3.8	3.3	3.4
TIME OF FLOWERING (Days after sowing at Donald, Victoria on 18th June 2001)					
	95	98	98	98	97
FLOWER: LENGTH OF PETALS (mm)					
mean	15.59	16.37	16.06	15.91	16.88
std deviation	0.92	0.92	0.74	0.74	0.70
LSD/sig	0.36	P≤0.01	P≤0.01	ns	P≤0.01
FLOWER: WIDTH OF PETALS (mm)					
mean	6.90	8.79	9.07	8.33	8.13
std deviation	0.77	0.66	0.76	0.57	0.35
LSD/sig	0.28	P≤0.01	P≤0.01	P≤0.01	P≤0.01
FLOWER: RATIO OF PETAL LENGTH / WIDTH					
mean	2.28	1.87	1.79	1.92	2.07

std deviation	0.25	0.10	0.12	0.11	0.10
LSD/sig	0.07	P≤0.01	P≤0.01	P≤0.01	P≤0.01
FLOWER: ANTHER DOTTING (% present)					
	23	68	98	93	93
SILIQUA: LENGTH (mm)					
mean	54.48	57.37	62.09	55.74	58.53
std deviation	6.21	6.54	5.21	6.89	5.39
LSD/sig	2.65	P≤0.01	P≤0.01	ns	P≤0.01
SILIQUA: LENGTH OF BEAK (mm)					
mean	10.60	12.46	11.15	13.20	10.46
std deviation	1.92	1.70	1.78	1.82	1.99
LSD/sig	0.83	P≤0.01	ns	P≤0.01	ns
SILIQUA: LENGTH OF PEDUNCLE (mm)					
mean	19.50	23.59	22.61	21.98	22.77
std deviation	2.73	3.05	3.52	2.59	3.38
LSD/sig	1.28	P≤0.01	P≤0.01	P≤0.01	P≤0.01
SILIQUA: TOTAL LENGTH (mm)					
mean	84.58	93.43	95.85	90.92	91.76
std deviation	8.76	8.99	7.70	8.93	8.12
LSD/sig	3.68	P≤0.01	P≤0.01	P≤0.01	P≤0.01

Calibrachoa hybrid
Calibrachoa

'Sunbelkist' syn **Terracotta Chimes**

Application No: 2001/184 Accepted: 8 Nov 2001.
Applicant: **Suntory Limited,** Osaka, Japan.
Agent: **Yates Botanicals Pty Limited,** Somersby, NSW.

Characteristics (Table 17, Figure 16) Plant: habit decumbent, type bushy (average height 15cm, average diameter 53cm), number of branches many, floriferousness high, roots at nodes absent. Stem: internode length short, anthocyanin colouration absent, pubescence weak, colour yellow-green (ca RHS 144A), distribution of flowers along the axis. Leaf: size small (average length 19mm, average width 5.2mm), shape elliptic, shape of cross section straight, margin entire, margin undulation absent, shape of apex rounded-acute, colour of upper side green (RHS 137A), colour of lower side green (RHS 137C), anthocyanin colouration absent, petiole absent (sessile), pubescence weak. Inflorescence: type solitary. Epicalyx: length medium, width narrow, shape elliptic, pubescence weak, shape of apex acuminate. Flower: type single, shape funnel-form, attitude semi-erect, diameter small (average 28mm), corolla tube length short (average 29mm), main colours mixture of yellow (RHS 9B-C) ground colour and red-purple (RHS 66A) secondary colour variably interspersed between veins and along lobe margins, reverse colour yellow (RHS 9D) densely veined with red-purple (RHS 59A-66A) over yellow (RHS 9D) corolla tube base (reverse of throat), throat colour yellow (RHS 9B-C) with variable red-purple (RHS 66A) veining, dark band around throat absent, vein colour red-purple (RHS 59A), pedicel colour yellow-green (RHS 144A). (Note: all RHS colour chart numbers refer to 1995 edition.)

Origin and Breeding Spontaneous mutation: 'Sunbelchipi'(ϕ) syn Cherry Pink(ϕ). The parent is characterised by cherry pink flower colour. Selection took place in Osaka, Japan in 1997 when first flowers were observed. Selection criteria: flower colour. Propagation: mature stock plants were generated from this selection through tissue culture and were found to be uniform and stable. 'Sunbelkist' will be commercially propagated by vegetative cuttings from elite stock plants from disease indexed tissue cultures. Marketed in Australia under the Million Bells® brand name. Breeder: Yasuyuki Murakami, Shiga, Japan.

Choice of Comparators The grouping characteristic used in identifying the most similar varieties of common knowledge was – Flower: ground colour yellow. Based on this grouping characteristic 'Sunbelki' syn Golden Chimes was selected as the most similar variety suitable as a comparator. 'Sunbelchipi'(ϕ) syn Cherry Pink(ϕ), the parent variety was excluded due to differing in flower colour as stated above. No other similar varieties were identified.

Comparative Trial Location: Macquarie Fields, NSW, summer 2000-2001. Conditions: trial conducted in open beds initially and transferred to a polyhouse for rain protection during flowering, plants propagated from cutting, rooted cuttings planted into 125mm standard pots filled with soilless potting mix, nutrition maintained with slow release and liquid fertilisers, pest and disease treatments applied as required. Trial design: fifteen pots of each variety arranged in a completely randomised design. Measurements: from ten plants at random. One sample per plant.

Prior Applications and Sales

Country	Year	Current Status	Name Applied
Japan	1997	Applied	'Sunbelkist'
EU	1999	Applied	'Sunbelkist'
USA	1998	Granted	'Sunbelkist'
Poland	1999	Withdrawn	'Sunbelkist'
South Africa	1999	Applied	'Sunbelkist'
Canada	2000	Applied	'Sunbelkist'
Israel	2000	Applied	'Sunbelkist'
Norway	2000	Applied	'Sunbelkist'
Slovakia	2000	Applied	'Sunbelkist'
NZ	2001	Applied	'Sunbelkist'

First sold in Europe in Feb 1999. First sold in Australia in Aug 2000.

Description: **Ian Paananen,** Crop & Nursery Services, Central Coast, NSW.

Table 17 *Calibrachoa* varieties

	'Sunbelkist'syn **Terracotta Chimes**	***'Sunbelki'** syn **Golden Chimes**
PLANT HEIGHT (cm) – maximum		
mean	15.1	18.1
std deviation	2.1	1.4
LSD/sig	1.8	P≤0.01
FLOWER COLOUR (RHS, 1995)		
main petal	variable mix of 9B-C and 66A	9C,sparsely veined 165A
reverse (including prominence of tube base)	9D, densely veined 59A-66A 9D at tube base (weak)	9C-D, veined 165A over 9C-D at tube base (weak)
throat	9B-C and with variable 66A	11A with variable 165A
veins	59A	165A

Capsicum annuum subsp *annuum* var. *pomiferum* **Capsicum**

'Kapuchin'

Application No: 2000/346 Accepted: 20 Mar 2001.
Applicant: **Yugen Kaisha Nihon Nouken**, Ibaraki, Japan.
Agent: **F B Rice & Co**, Balmain, NSW.

Characteristics (Table 18, Figure 35) Seedling: anthocyanin colouration at hypocotyl present. Plant: attitude erect, length of stem short, shortened internode absent, anthocyanin colouration at level of nodes very weak. Leaf: length of blade medium, width medium, green colour light (RHS 137B-C), blistering weak. Flower: attitude of peduncle non-erect. Fruit: colour before maturity greenish white, intensity of colour before maturity light, attitude drooping, length short (mean 43.7mm), diameter medium (mean 89.3mm), ratio length/diameter medium (mean 0.5), predominant shape of longitudinal section flattened, predominant shape of cross section (at level of placenta) circular, texture of surface strongly wrinkled, colour at maturity red (RHS 46A), intensity of colour at maturity medium, glossiness strong, stalk cavity present, depth of stalk cavity medium, shape of apex depressed, depth of interloculary grooves deep, predominant number of locules three and four, thickness of flesh medium, capsaicin in placenta absent. Placenta: size medium. Stalk: length short, thickness medium. Calyx: aspect enveloping. Time of beginning of flowering (first flower on second flowering node on 50% of plants): early. Time of ripening (colour change of fruits on 50% of plants): early. (Note: all RHS colour chart numbers refer to the 1995 edition.)

Origin and Breeding Recurrent phenotypic selection: In 1991 an unnamed variety of pimento was cultivated in open field. However, there was great variation among the plants and consequently the products varied greatly. Individual plants were selected that conformed to an ideotype that eventually is described as the cultivar 'Kapuchin'. Line and individual plant selections were repeated for the next two years (1992 and 1993). As a result, three lines were selected. Nevertheless, the uniformity of these plants was still unacceptable. Due to the field cultivation, the plants were exposed to wind, rain, insects and diseases consequently selection and production was difficult. Thus production in a rainproof greenhouse cultivation was planned and implemented. Under this cultivation system, the line and plant selections were continued for another three years (1994-1995). As a result a line with the traits of the described new cultivar was obtained. Selection criteria: fruit characteristics. Propagation: seed. Breeder: Yoshitaka WOCHI, Ibaraki, Japan.

Choice of Comparators The grouping characteristics used in identifying the most similar varieties of common knowledge were – Plant: shortened internode absent, Fruit: predominant shape of longitudinal section flattened, predominant shape of cross section circular, colour of maturity red, capsaicin in placenta absent. Based on these grouping characteristics a similar "*pomiferum*" type of cultivar was chosen. This cultivar adapted well to the Australian conditions and is sold under the name of 'Il Bello Rosso'. Japanese varieties, 'Penwander' was not considered because of its less sweetness and 'Ryokkou-Wase' was not included because it has no cleavages on the fruits.

Comparative Trial Location: The University of Sydney Plant Breeding Institute, Cobbitty, NSW, Aug – Feb 2001-02. Conditions: plants propagated from seed, transplanted into raised beds covered with black plastic with drip irrigation. Trial design: 10 plants of each variety per replicate arranged in a randomised complete-block design with four entries in four blocks.

Prior applications and Sales

Country	Year	Current Status	Name Applied
Japan	1996	Applied	'Kapuchin'
The Netherlands	2001	Applied	'Kapuchin'
New Zealand	2001	Applied	'Kapuchin'

First sold in Japan on 25 Dec 1996.

Description: **Prof N.F. Derera, AM and Fran Ebb,** ASAS Pty, Ltd, Winston Hills, NSW.

Table 18 *Capsicum* varieties

	'Kapuchin'	*'Il Bello Rosso'
PLANT: ANTHOCYANIN COLOURATION AT LEVEL OF NODES	very weak	absent
LEAF: LENGTH OF BLADE	medium	medium-long
LEAF: WIDTH	medium	broad-medium
LEAF: GREEN COLOUR (RHS, 1995)	light RHS 137B-C	dark RHS 137A
LEAF: BLISTERING	weak	absent
FRUIT: COLOUR BEFORE MATURITY	greenish white	green
FRUIT: INTENSITY OF COLOUR BEFORE MATURITY	light	medium
FRUIT: ATTITUDE	drooping	horizontal
FRUIT DIAMETER	medium	small
FRUIT: TEXTURE OF SURFACE	strongly wrinkled	slightly wrinkled
FRUIT: DEPTH OF STALK CAVITY	medium	shallow
FRUIT: DEPTH OF INTERLOCULARY GROOVES	deep	very shallow
FRUIT: PREDOMINANT NUMBER OF LOCULES	three and four	two and three
FRUIT: THICKNESS OF FLESH	medium	thin
PLACENTA: SIZE	medium	small
TIME OF BEGINNING OF FLOWER (first flower on second flowering node on 50% of plants)	early	late
TIME OF RIPENING (colour change of fruits on 50% of plants)	early	late

Chamelaucium megalopetalum x *Chamelaucium uncinatum*
Waxflower

'Bridal Pearl'

Application No: 2001/028 Accepted: 16 Mar 2001.
Applicant: **State of Western Australia through its Department of Agriculture,** South Perth, WA.

Characteristics (Table 19, Figure 30) Plant: height medium, habit upright, vigour strong. Stem: branch angle small- medium. Leaf: length short, shape of apex acute. Flowering time: very early. Flower: arrangement narrow distal, shape cup-shaped, diameter medium. Bud: colour without cap white (RHS 155A). Petal: colour at first opening white (RHS 155B), 2 weeks after opening white with pink blush (RHS 155B- 62C), 6 weeks after opening pink (RHS 66C). Flower nectary: colour at first opening yellow-green (RHS 151D), 2 weeks after opening yellow-green (RHS 151D), 6 weeks after opening yellow-green (RHS 151D). Staminodia: outline narrow triangular, collar colour white. Style: colour at maturity white. Calyx tube: longitudinal furrowing absent-very weak, outline conical, mid point colour at mid maturity green. (Note: all RHS colour chart numbers refer to 1986 edition.)

Origin and breeding Controlled pollination: seed parent *C. megalopetalum* 'MB03' x *C. uncinatum* 'C5001' at South Perth in WA. The seed parent is characterised by short plant height. The pollen parent is characterised by early flowering time. Hybridisation undertaken on 30 Jul 1996, fruit harvested on 16 Sep 1996 and the resultant embryos were put into tissue culture, germinated, sub-cultured 4 times, deflasked in May-June 1997 and planted out at Medina Research Station in Oct 1997. 'Bridal Pearl' (breeder's code: WX10) was selected from one of the embryos' tissue cultured plantlets after flowering in 1998. All plantlets were found to be uniform and stable. The plantlets were further vegetatively propagated from cuttings in Nov 1998 and planted out on growers' properties and at Medina Research Station. Having flowered all plants were found to be uniform and stable in Jun 1999 and 2000. Selection criteria: very early flowering, large pure white flower with yellow green nectary over extended period, strong plant vigour. Propagation: embryo rescue, tissue culture, cutting. Breeder: Department of Agriculture, Western Australia.

Choice of Comparators The grouping characteristic used in identifying the most similar varieties of common knowledge was – Petal: colour at first opening white. On the basis of this grouping characteristic 'Denmark Pearl'(Ф) and the pollen parent 'C5001' were considered as the most similar varieties. 'Denmark Pearl'(Ф) has similar parentage to the candidate variety. 'Blondie'(Ф) was initially considered but later excluded because of its cream petal colour. The seed parent *C. megalopetalum* 'MB03' was not considered for its short plant height.

Comparative Trial Location: Department of Agriculture Research Station, Medina, WA. Conditions: plants propagated by cuttings and planted in open field of sandy soil with drip irrigation and fertigation. Trial design: 15 plants of each variety, replicated randomised block design. Measurements: made on 20 typical organs from all plants.

Prior Application and Sales Nil.

Description: **Philip Watkins**, Sunglow Flowers Pty Ltd, Perth, WA.

Table 19 *Chamelaucium* varieties

	'Bridal Pearl'	*'Denmark Pearl'Φ	*'C5001'
LEAF LENGTH (mm)			
mean	8.40	15.95	24.10
std deviation	0.58	0.63	0.72
LSD/sig	0.47	P≤0.01	P≤0.01
LEAF TIP SHAPE	acute	acute	hooked
FIRST FLOWERING (date)	28 May	16 Jul	11 Jun
	very early	early-medium	early
FLOWER DENSITY	medium	medium-dense	medium
FLOWER SHAPE	cup-shaped	cup-shaped	star-shaped
FLOWER DIAMETER (mm)			
mean	15.75	15.78	19.50
std deviation	0.72	0.50	0.83
LSD/sig	0.51	ns	P≤0.01
BUD COLOUR WITHOUT CAP (RHS, 1986)	155A	155A	155B
	white	white	white
PETAL COLOUR AT FIRST OPENING (RHS, 1986)	155B	155B	155D
	white	white	white
PETAL COLOUR AT TWO WEEKS AFTER OPENING (RHS, 1986)	155B- 62C	155B	155C
	white-pink	white	white
PETAL COLOUR AT SIX WEEKS AFTER OPENING (RHS, 1986)	66C	155B	155C
	pink	white	white
NECTARY COLOUR AT FIRST OPENING (RHS, 1986)	151D	160A	145C
	yellow-green	greyed-yellow	light green
NECTARY COLOUR AT TWO WEEKS AFTER OPENING (RHS, 1986)	151D	153C	145C
	yellow-green	yellow-green	light green
NECTARY COLOUR AT SIX WEEKS AFTER OPENING (RHS, 1986)	151D	153C	145C
	yellow-green	yellow-green	light green
CALYX TUBE FURROWING	absent-very weak	absent-very weak	absent
CALYX TUBE OUTLINE	conical	flared	flared
CALYX TUBE MID POINT COLOUR	green	yellow-green	yellow

'Pastel Gem'

Application No: 2001/029 Accepted: 16 Mar 2001.
Applicant: **State of Western Australia through its Department of Agriculture,** South Perth, WA.

Characteristics (Table 20, Figure 32) Plant: height medium, habit bushy, vigour medium. Stem: branch angle medium. Leaf: length short, shape of apex acute. Flowering time: very early. Flower: arrangement narrow distal, density medium, shape cup-shaped, diameter medium. Bud: colour without cap pink (RHS 62B). Petal: colour at first opening pink (RHS 62D), 2 weeks after opening pink fading to cream (RHS 65D-158D), 6 weeks after opening cream (RHS 158D). Flower nectary: colour at first opening greyed-orange (RHS 165C), 2 weeks after opening greyed-orange (RHS 165B), 6 weeks after opening greyed-orange (RHS 166B). Staminodia: outline narrow triangular, collar colour white. Style: colour mature light pink. Calyx tube: longitudinal furrowing weak, outline flared, mid point colour at mid maturity brown. (Note: all RHS colour chart numbers refer to 1986 edition.)

Origin and breeding Controlled pollination: Controlled pollination: seed parent *C. megalopetalum* 'MB03' x *C. uncinatum* '692' at South Perth in WA. The seed parent is characterised by short plant height. The pollen parent is characterised by deep purple flower colour. Hybridisation undertaken on 30 Jul 1996, fruit harvested on 16 Sep 1996 and the resultant embryos were put into tissue culture, germinated, sub-cultured 4 times, deflasked in May-Jun 1997 and planted out at Medina Research Station in Oct 1997. 'Pastel Gem' (breeder's code: WX13) was selected from one of the embryos' tissue cultured plantlets after flowering in 1998. All plantlets were found to be uniform and stable. The plantlets were further vegetatively propagated from cuttings in Nov 1998 and planted out on growers' sites and Medina Research Station in Apr 1999. All plants were found to be uniform and stable. Selection criteria: very early flowering time, floral display of pink flowers fading to cream, strong plant vigour. Propagation: embryo rescue, tissue culture, cutting. Breeder: Department of Agriculture, Western Australia.

Choice of Comparators The grouping characteristics used in identifying the most similar varieties of common knowledge were: Plant: habit bushy, Flower: arrangement narrow distal, Petal: colour at first opening pink, Flowering time: very early-early. On the basis of these grouping characteristics, 'Madonna'Φ, 'Albany Pearl'Φ and the pollen parent '692' were considered as the most similar varieties. Both 'Madonna'Φ and 'Albany Pearl'Φ have similar parentage to the candidate variety. 'Painted Lady'Φ was not included because of its easily distinguishable cream to white petal colour. The seed parent *C. megalopetalum* 'MB03' was not considered for its short plant height.

Comparative Trial Location: Department of Agriculture Research Station, Medina, WA. Conditions: plants propagated by cuttings and planted in open field of sandy soil with drip irrigation and fertigation. Trial design: 15 plants of each variety, replicated randomised block design. Measurements: made on 20 typical organs from all plants.

Prior Application and Sales Nil.

Description: **Philip Watkins**, Sunglow Flowers Pty Ltd, Perth, WA.

Table 20 *Chamelaucium* varieties

	'Pastel Gem'	*'Albany Pearl'ϕ	*'Madonna'ϕ	*'692'
LEAF LENGTH (mm)				
mean	8.73	14.15	10.68	25.58
std deviation	0.70	1.00	0.83	1.48
LSD/sig	0.89	P≤0.01	P≤0.01	P≤0.01
LEAF TIP SHAPE	acute	acute	acute	hooked
FIRST FLOWERING (date)	7 May very early	2 Jul early	7 Jul early	16 Jul medium
FLOWER DENSITY	medium	medium	sparse-medium	very sparse
FLOWER ARRANGEMENT	narrow distal	narrow distal	narrow distal	clustered near stem
FLOWER SHAPE	cup-shaped	cup-shaped	cup-shaped	star-shaped
FLOWER DIAMETER (mm)				
mean	15.48	13.95	15.00	16.75
std deviation	0.66	0.61	0.51	0.57
LSD/sig	0.50	P≤0.01	ns	P≤0.01
BUD COLOUR WITHOUT CAP (RHS, 1986)	62B pink	155A white	158C cream	80A purple
PETAL COLOUR AT FIRST OPENING (RHS, 1986)	62D pink	155B white	155D white	81C purple
PETAL COLOUR AT TWO WEEKS AFTER OPENING (RHS, 1986)	65D-158D pink-cream	155A white	155D-62C white-pink	80B purple
PETAL COLOUR AT SIX WEEKS AFTER OPENING (RHS, 1986)	158D cream	155A white	62C-78C pink-purple	71B purple
NECTARY COLOUR AT FIRST OPENING (RHS, 1986)	165C greyed-orange	150A yellow-green	153C yellow-green	194A greyed-green
NECTARY COLOUR AT TWO WEEKS AFTER OPENING (RHS, 1986)	165B greyed-orange	153C yellow-green	153C-173B yellow-green to greyed-orange	186B greyed-purple
NECTARY COLOUR AT SIX WEEKS AFTER OPENING (RHS, 1986)	166B greyed-orange	153C yellow-green	173B greyed-orange	187B greyed-purple
STAMINODIA COLLAR COLOUR	white	yellow white	pink	pink
CALYX TUBE FURROWING	weak	medium	absent-very weak	medium-strong
CALYX TUBE OUTLINE	flared	conical	conical	flared
CALYX TUBE MID POINT COLOUR	brown	green	green-brown	dark brown

'Crystal Pearl'

Application No: 2001/022 Accepted: 5 Mar 2001.
Applicant: **State of Western Australia through its Department of Agriculture,** South Perth, WA.

Characteristics (Table 21, Figure 31) Plant: height medium, habit bushy, vigour strong. Stem: branch angle medium-large. Leaf: length short, shape of apex acute. Flowering time: early. Flower: arrangement narrow distal, density medium, shape cup-shaped, diameter large. Bud: colour without cap white (RHS 155A). Petal: colour at first opening white (RHS 155B), 2 weeks after opening white (RHS 155B), 6 weeks after opening white (RHS 155B). Flower nectary: colour first opened yellow-green (RHS 153D), 2 weeks after opening yellow-green (RHS 153D), 6 weeks after opening (RHS 153D). Staminodia: outline narrow triangular, collar colour white. Style: colour at maturity white. Calyx tube: longitudinal furrowing weak to medium, outline conical. (Note: all RHS colour chart numbers refer to 1986 edition.)

Origin and breeding Single hybrid plant selection: from open pollination of *C. megalopetalum* and *C. uncinatum* 'Alba' identified in Aug-Sep 1993 on a disused flower farm at Wanneroo in WA. *C. megalopetalum* is characterised by short plant height and *C. uncinatum* 'Alba' is characterised by mid season flowering time. Plants were vegetatively propagated from cuttings taken from a single hybrid plant at South Perth on 17 Dec 1993. Cuttings from these plants were taken on 27 Jul 1995 and once more on 27 Oct 1995. Plants were also propagated from cuttings of subsequent generations at Albany on 29 Oct 1996, 16 May 1997, 19

May 1997 and again on 21 Apr 1998. Final selection of the variety was made after a total of six generations of propagation. Plants of the variety were planted on several growers' properties and at Medina Research Station in Oct 1997 and Apr 1999. All plants were found to be uniform and stable. Selection criteria: early flowering, large pure white flower with yellow green nectary over extended period, strong plant vigour. Propagation: cutting. Breeder: Department of Agriculture, Western Australia.

Choice of Comparators The grouping characteristic used in identifying the most similar varieties of common knowledge was – Petal: colour at mid maturity white. On the basis of this grouping characteristic 'Albany Pearl'(Φ) and one of the parents, *C. uncinatum* 'Alba' were considered as the most similar varieties. 'Albany Pearl'(Φ) has similar parentage to the candidate variety. 'Denmark Pearl'(Φ), which is also similar, was not included in the comparative trial as its flowering time is several weeks later and has a shorter plant height and is easily distinguishable from the candidate. 'Blondie'(Φ) was initially considered but later excluded because it has very early flowering time. The seed parent *C. megalopetalum* was not considered for its short plant height.

Comparative Trial Location: Department of Agriculture Research Station, Medina, WA. Conditions: plants propagated by cuttings and planted in open field of sandy soil with drip irrigation and fertigation. Trial design: 15 plants of each variety, replicated randomised block design. Measurements: made on 20 typical organs from all plants.

Prior Application and Sales Nil.

Description: **Philip Watkins**, Sunglow Flowers Pty Ltd, Perth, WA.

Table 21 *Chamelaucium* varieties

	'Crystal Pearl'	***'Albany Pearl'(Φ)**	***'Alba'**
BRANCH ANGLE (degree)			
mean	47.60	37.60	34.60
std deviation	1.00	0.99	0.93
LSD/sig	0.73	P≤0.01	P≤0.01
LEAF LENGTH (mm)			
mean	11.45	14.10	29.90
std deviation	1.05	0.72	3.16
LSD/sig	1.45	P≤0.01	P≤0.01
LEAF TIP SHAPE	acute	acute	hooked
FIRST FLOWERING (date)	23 Jun	2 Jul	30 Jul
	early	early	medium
FLOWER SHAPE	cup-shaped	cup-shaped	star-shaped
FLOWER LOCATION	narrow distal	narrow distal	broad distal
FLOWER DIAMETER (mm)			
mean	19.45	14.10	21.15
std deviation	1.05	0.72	0.75
LSD/sig	0.63	P≤0.01	P≤0.01
BUD COLOUR WITHOUT CAP (RHS, 1986)	155A white	155A white	155B white
PETAL COLOUR AT FIRST OPENING (RHS, 1986)	155B white	155B white	155D white
PETAL COLOUR AT TWO WEEKS AFTER OPENING (RHS, 1986)	155B white	155A white	155D white
PETAL COLOUR AT SIX WEEKS AFTER OPENING (RHS, 1986)	155B white	155A white	155D white
NECTARY COLOUR AT FIRST OPENING (RHS, 1986)	153D yellow-green	150A yellow-green	153D yellow-green
NECTARY COLOUR AT TWO WEEKS AFTER OPENING (RHS, 1986)	153D yellow-green	153C yellow-green	153D yellow-green
NECTARY COLOUR AT SIX WEEKS AFTER OPENING (RHS, 1986)	153D yellow-green	153C yellow-green	173B greyed-orange
STAMINODIA COLLAR COLOUR	white	yellow-white	white
CAYX TUBE FURROWING	weak-medium	medium	weak-medium
CALYX TUBE OUTLINE	conical	conical	flared

Chamelaucium uncinatum x *Chamelaucium megalopetalum*
Waxflower

'Purple Gem'

Application No: 2000/050 Accepted: 16 Mar 2001.
Applicant: **State of Western Australia through its Department of Agriculture,** South Perth, WA.

Characteristics (Table 22, Figure 33) Plant: height medium, habit upright, vigour medium. Stem: branch angle medium-large. Leaf: length short, shape of apex acute. Flowering time: early-medium. Flower: arrangement narrow distal, density medium, shape cup-shaped, diameter large. Bud: colour without cap pink (RHS 62C). Petal: colour at first opening pink (RHS 62D), 2 weeks after opening red-purple (RHS 68B), 6 weeks after opening purple (RHS 72C). Flower nectary: colour at first opening greyed-yellow (RHS 160A), 2 weeks after opening greyed-yellow (RHS 161A), 6 weeks after opening greyed-purple

(Continued to page 49)

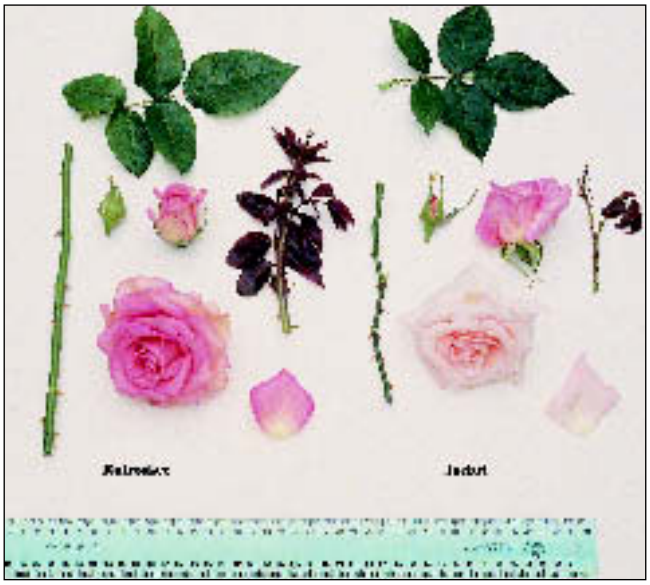

Fig 1 **Rose – 'Ruiroskee' syn Sweet Unique (left) and comparator 'Jacbri' syn Bridal Pink (right), showing differences in flower colour, and young shoot anthocyanin colouration.**

Fig 2 **Rose – 'Intertrogol' syn Sun City (left) and comparators 'Korflapei' syn Frisco (centre), and 'Interlis' syn Lydia (right), showing differences in flower colour and size, and flower number per stem.**

Fig 3 **Impatiens – flowers and leaves of 'BFP-796' syn Apricot Celebration (top left) with comparators 'Kitim' syn Timor (top right) and 'Kixant' syn Xanthia (bottom).**

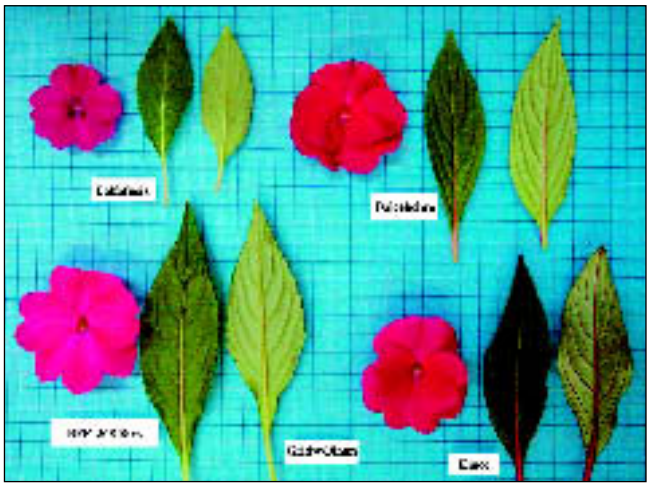

Fig 4 **Impatiens – flowers and leaves of 'Balfafusia' (top left) and 'Balcebchro' (top right) with comparators 'BFP-368 Rose' syn Rose Celebration (bottom left) and 'Kinoc' syn Noctua (bottom right).**

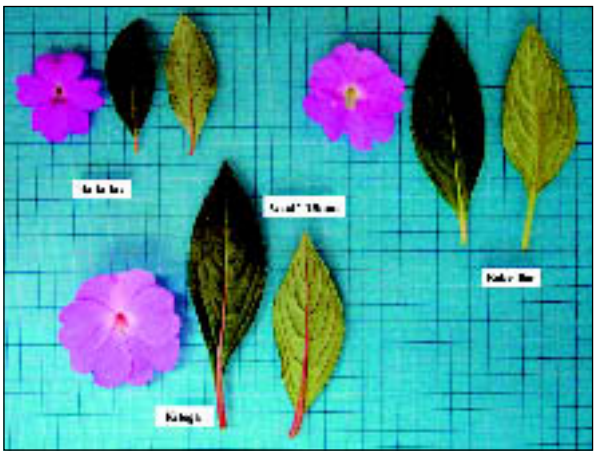

Fig 5 **Impatiens – flowers and leaves of 'Balfaflav' (top left) and 'Balcelilae' syn Celebration Light Lavender III (top right) with comparator 'Kitoga' syn Toga (bottom).**

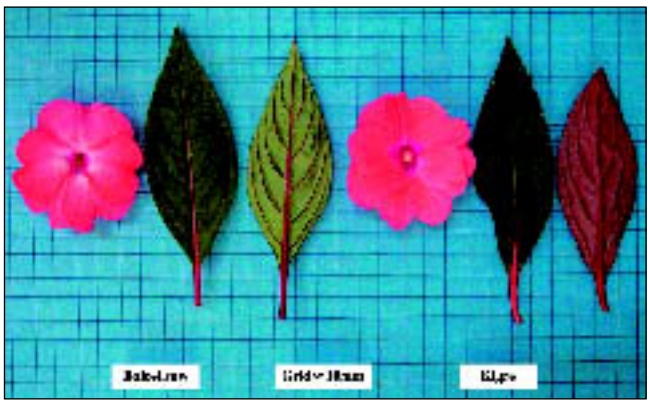

Fig 6 **Impatiens – flowers and leaves of 'Balcelisow' syn Celebration Salmon II (left) with comparator 'Kigre' syn Grenada (right).**

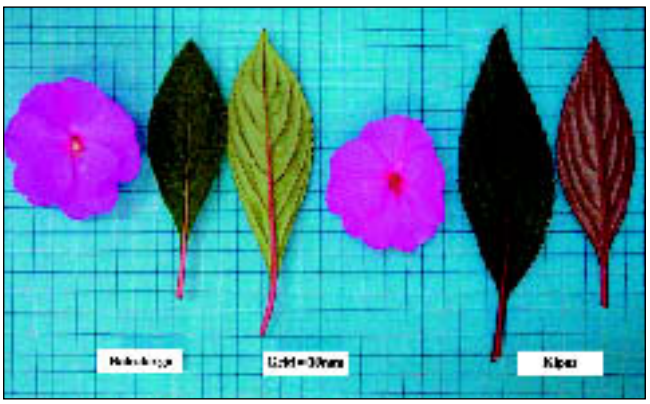

Fig 7 **Impatiens – flowers and leaves of 'Balcelavgo' syn Celebration Lavender Glow (left) with comparator 'Kipas' syn Pascua (right).**

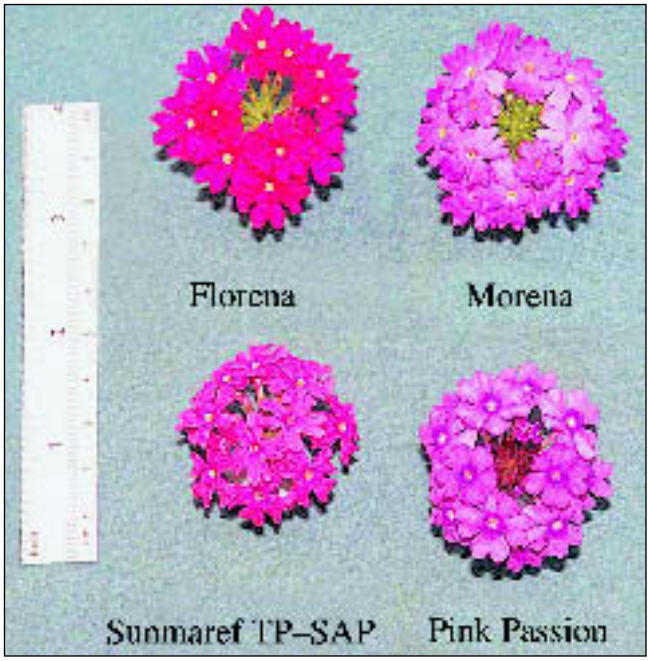

Fig 8 **Verbena – inflorescence of 'Florena' and 'Morena' (top row from left) with comparators 'Sunmaref TP-SAP', and 'Pink Passion' (bottom row from left).**

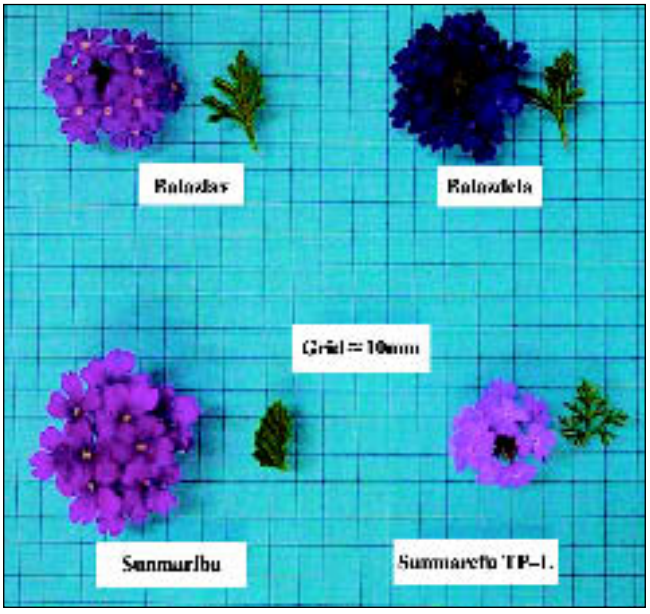

Fig 9 **Verbena – inflorescence and leaves of 'Balazlav' (top left) and 'Balazdela' (top right) with comparators 'Sunmariba' syn Violet Surprise (bottom left) and 'Sunmarefu TP-L' syn Lilac Reflections (bottom right).**

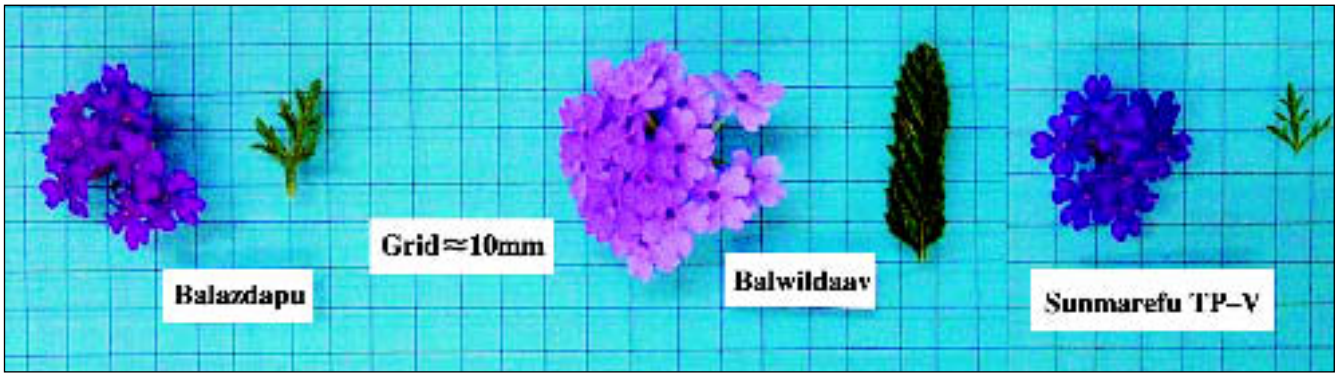

Fig 10 **Verbena – inflorescence and leaves of 'Balazdapu' (left), 'Balwildaav' (centre) with comparator 'Sunmarefu TP-V' syn Purple Passion (right).**

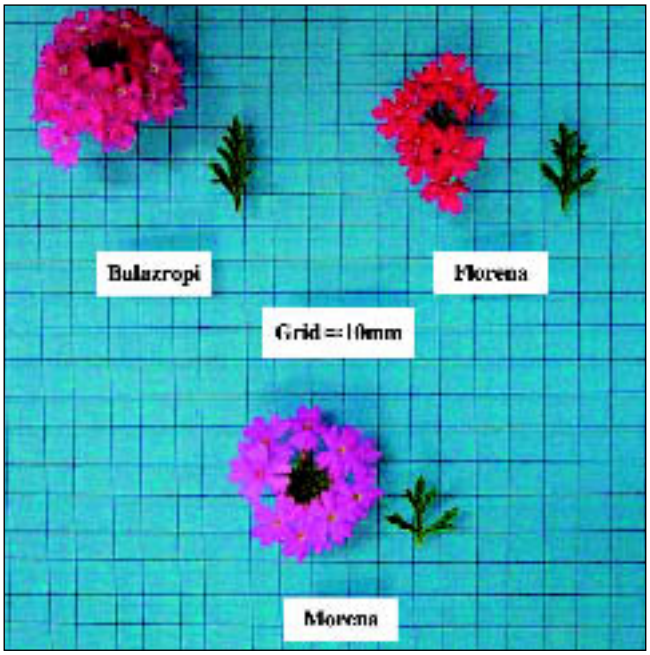

Fig 11 Verbena – inflorescence and leaves of 'Balazropi' (top left) with comparators 'Florena' (top right) and 'Morena' (bottom).

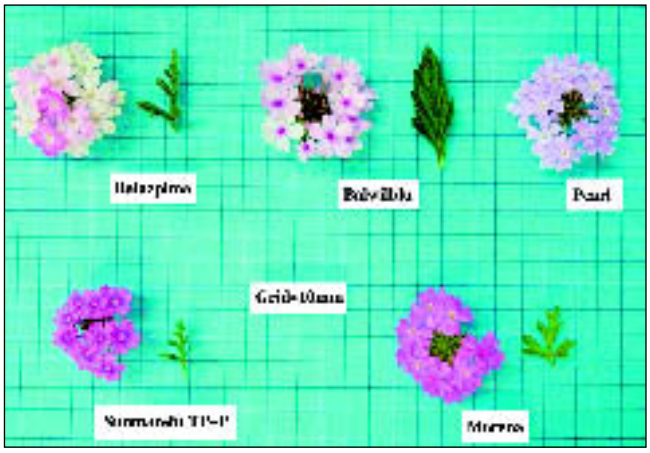

Fig 12 Verbena – inflorescence and leaves of 'Balazpima' (top left), 'Balwilblu' (centre) with comparators 'Pearl' (top right), 'Sunmarefu TP-P' syn Pink Passion (bottom left) and 'Morena' (bottom right).

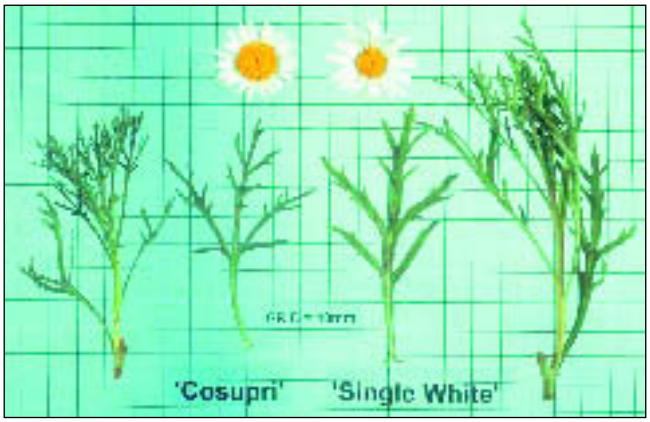

Fig 13 Argyranthemum – 'Cosupri' (left) and the comparator 'Single White' (right) showing difference in ray petal arrangement and of leaf form and size.

Fig 14 Mandevilla – flowers of 'Rita Marie Green' syn Parfait Passion Pink (left) with comparator 'Alice du Pont' (right) showing the presence and absence of petaloids.

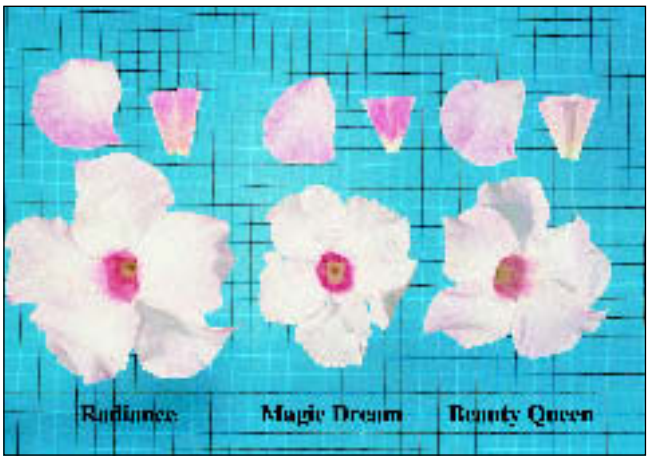

Fig 15 Mandevilla –'Radiance' (left), 'Magic Dream' (centre) and 'Beauty Queen' (right) showing variation in flower size and colour of floral tube.

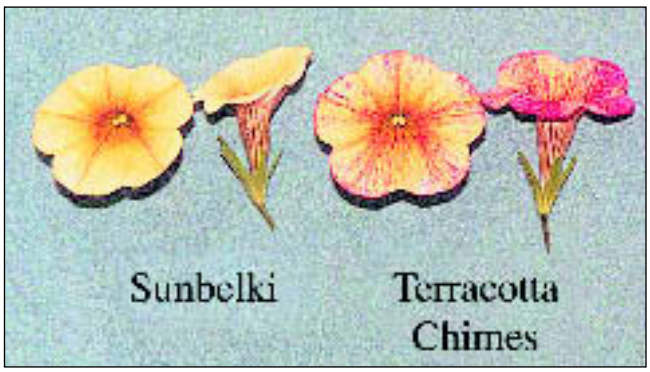

Fig 16 Calibrachoa – flowers of 'Sunbelkist' syn Terracotta Chimes (right) with comparator 'Sunbelki' syn Golden Chimes (left).

Fig 18 Rhododendron – flowers of 'Tilly Aston' (left) with comparators 'Australian Sunset', 'Apricot Gold' and 'Lem's Cameo' (from left to right).

Fig 20 Aglaonema – leaves of 'Star of India' (left), 'Glory of India' (centre) and comparator 'Silver Queen' (right) showing differences in leaf width and pattern of leaf colouration.

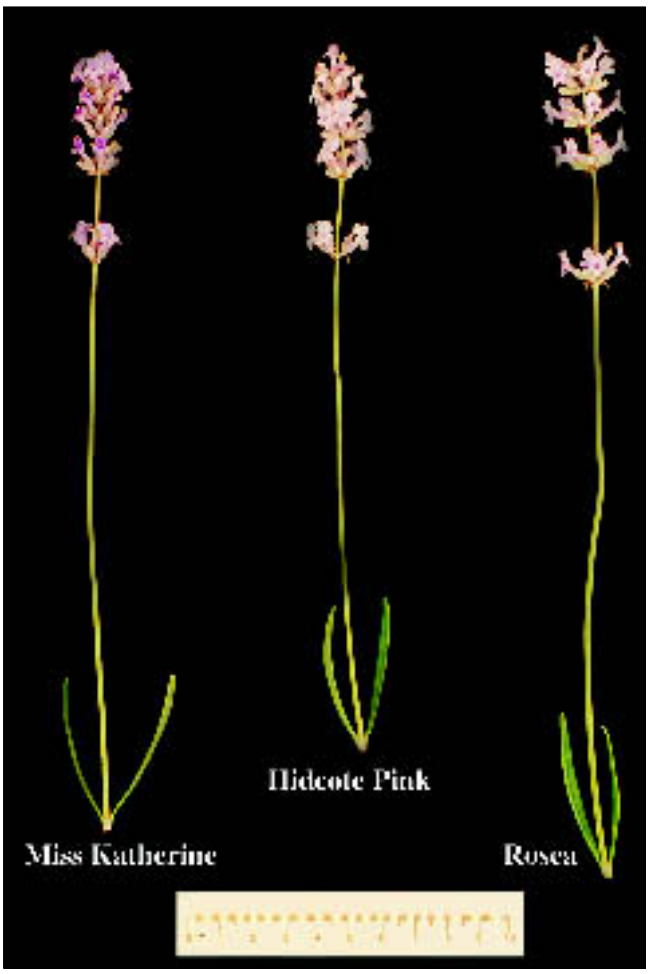

Fig 17 English Lavender – 'Miss Katherine' (left) with comparators 'Hidcote Pink' (centre) and 'Rosea' (right).

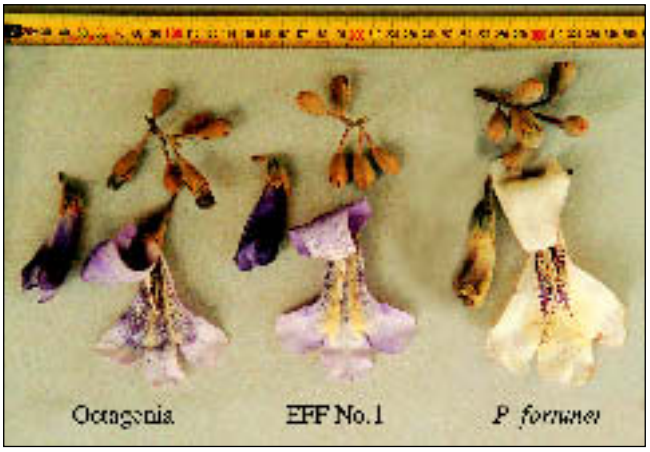

Fig 19 Paulownia – flowers of 'EFF No. 1' (centre) showing distinct broader yellow stripes inside corolla compared to narrower yellow stripes in 'Octagenia' (left). The intensity of purple spotting is weak in 'EFF No. 1' compared to 'Octagenia' (strong). *P. fortunei* (right) showing distinct differences in corolla colour (cream). Note: corolla has been split to reveal inner stripes and spotting.

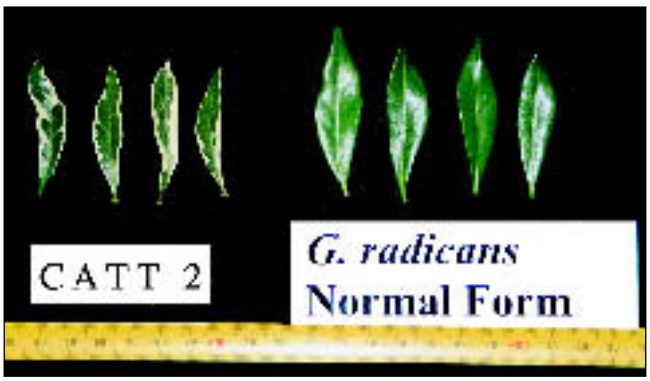

Fig 21 **Gardenia – leaves of 'CATT 2' (left) with comparator *G. radicans* (right).**

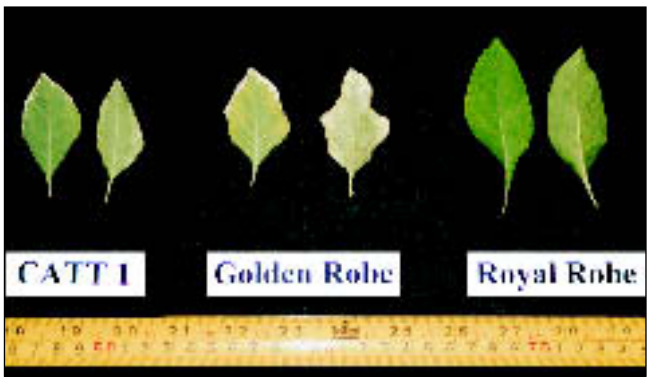

Fig 22 **Blue Potato Bush – leaves of 'CATT 1' (left) with comparators 'Golden Robe' (centre) and 'Royal Robe' (right).**

Fig 23 **Gazania – flowers and leaves of 'Sugamo' (centre), 'Sugaja' (right) and comparator 'Double Yellow' (left) showing differences in leaf pubescence and ray floret colour.**

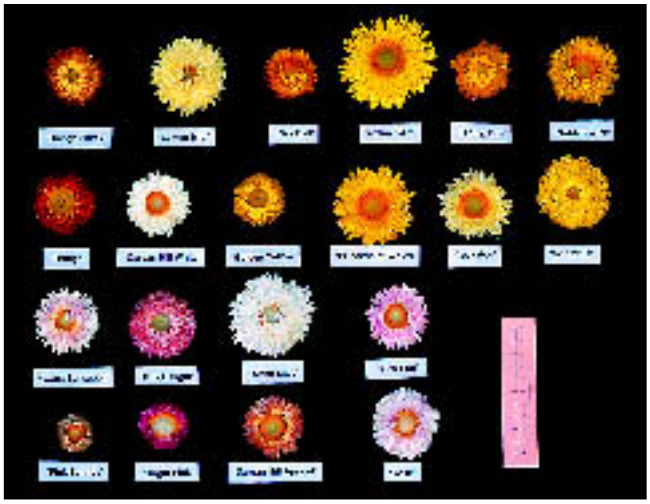

Fig 24 **Everlasting Daisy – flower heads of (from left to right) 'Orange Flame', 'Lemon Mist', 'Fire Ball' , 'Yellow Gem', 'Rising Sun', 'Golden Wish', 'Orange', 'Dargan Hill White', 'Golden Yellow', 'Princess of Wales', 'Cockatoo', 'No. 17/8/9', 'Sweet Sensation', 'Pink Delight', 'White Lace', 'Pink Star', 'Pink Sunrise', 'Bright Pink', 'Dargan Hill Apricot' and 'Rose' showing differences in flower head diameter and bract colour.**

Fig 25 **Everlasting Daisy – flower heads of 'NNB9821A' (left) with comparators 'Florabella Pink' (centre) and 'Menindee Magic' (right) showing differences in flower head diameter and bract colour.**

Fig 26 Everlasting Daisy – flower heads of 'NN99131A' (left) with comparators 'Colourburst Pink' (centre) and 'Pink Sunrise' (right) showing differences in flower head diameter and bract colour.

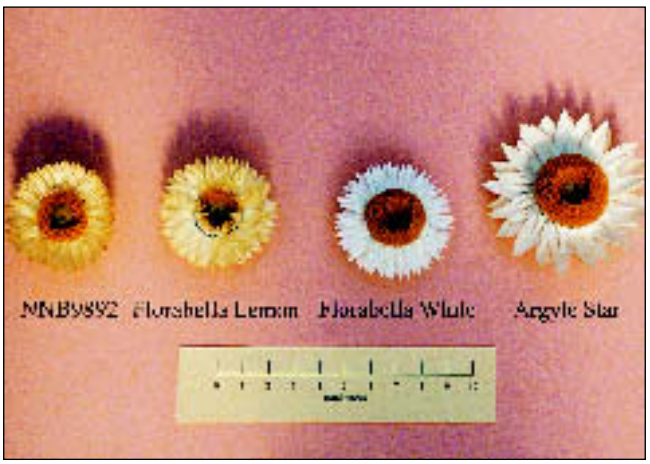

Fig 27 Everlasting Daisy – flower heads of 'NNB9892' (left) with comparators (from left to right) 'Florabella Lemon', 'Florabella White' and 'Argyle Star' showing differences in flower head diameter and bract colour.

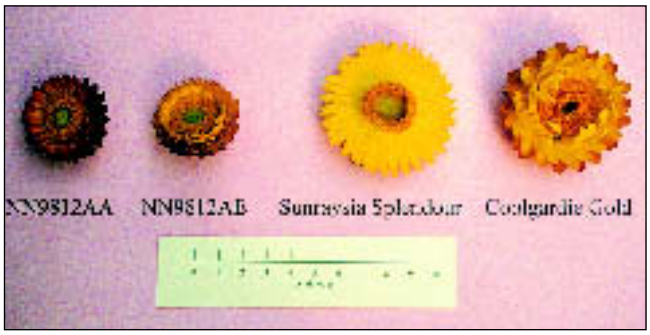

Fig 28 Everlasting Daisy – flower heads of (from left to right) 'NN9812AA', 'NN9812AE' and comparators 'Sunraysia Splendour' and 'Coolgardie Gold' showing differences in flower head diameter and bract colour.

Fig 29 Ptilotus – plants of 'Cobtus' (left) showing more open and taller habit compared to 'Kuranga' (right).

Fig 30 Waxflower – flowers of 'Bridal Pearl' (left) with comparators 'Denmark Pearl' (centre) and 'C5001' (right).

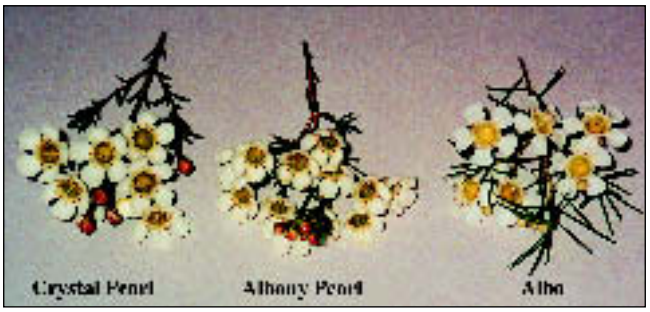

Fig 31 Waxflower – flowers of 'Crystal Pearl' (left) with comparators 'Albany Pearl' (centre) and 'Alba' (right).

Fig 32 Waxflower – flowers of 'Pastel Gem' (left) with comparators 'Albany Pearl' (2nd from left), 'Madonna' (2nd from right) and '692' (right).

Fig 33 Waxflower – flowers of 'Purple Gem' (left) with comparators 'Painted Lady' (centre) and 'UWA Purple' (right).

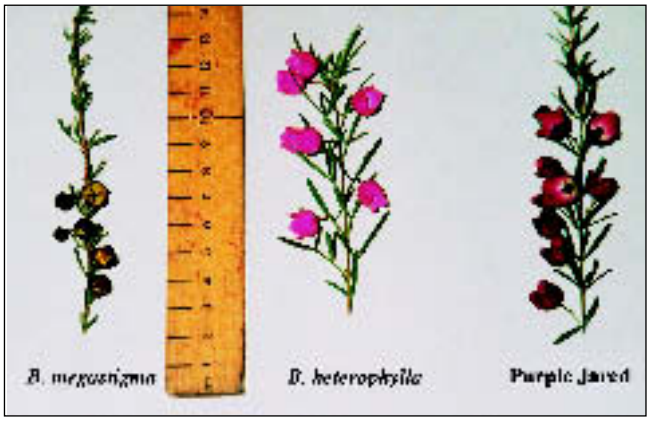

Fig 34 Boronia – flowers of 'Purple Jared' (right) with comparators *B. heterophylla* (centre) and *B. megastigma* (left).

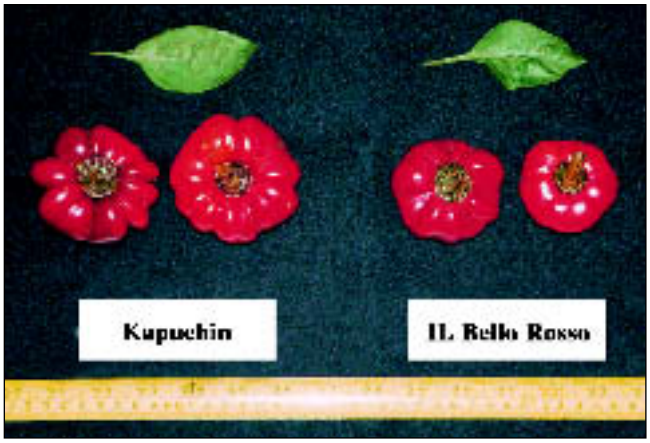

Fig 35 Capsicum – leaves and fruits of 'Kapuchin' (left) with the comparator 'Il Bello Rosso' (right).

Fig 36 Apricot- fruits and stone of 'Rivergem' (centre) showing distinctive blush and elongate stone shape compared to 'Story' (left) and 'Trevatt' (right).

Fig 37 Ginger – 'Buderim Gold' (left) with comparators 'Queensland' (centre) and 'Canton' (right) showing differences in leaf width, stem diameter and rhizome size.

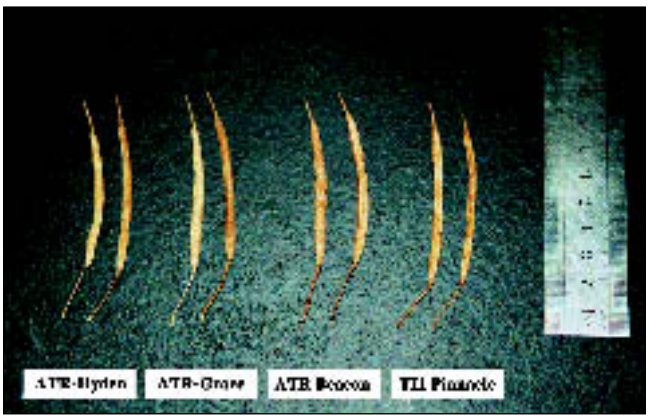

Fig 38 Canola – pods of 'ATR-Beacon' (2nd from right) with comparators 'TI1 Pinnacle' (far right), 'ATR-Hyden' (far left) and 'ATR-Grace' (2nd from left).

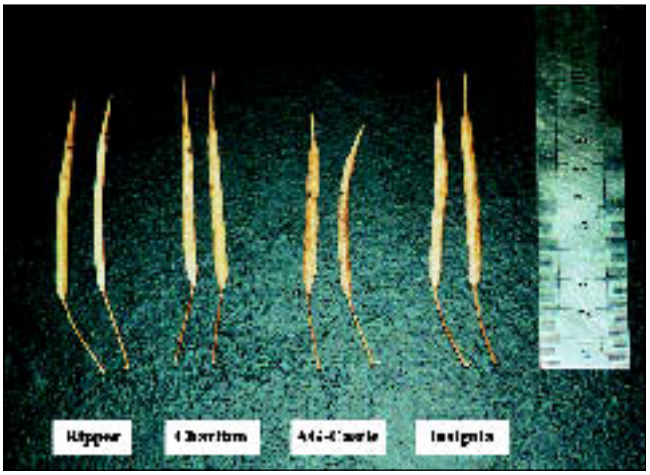

Fig 39 Canola – pods of 'AG-Castle' (2nd from right) with comparators 'Charlton' (2nd from left), 'Insignia' (far right) and 'Ripper' (far left).

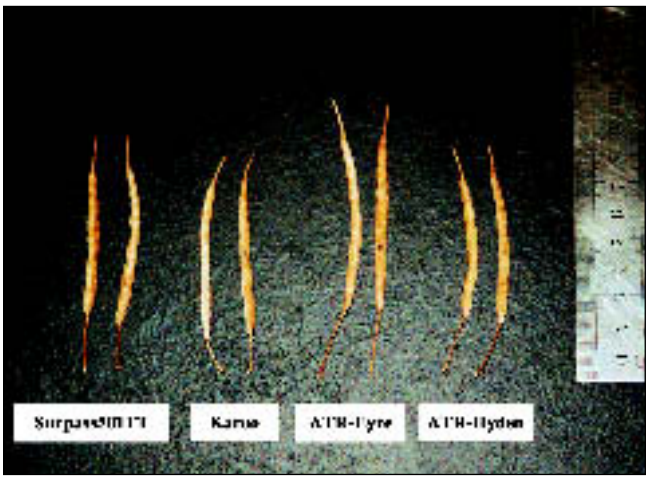

Fig 40 Canola – pods of 'ATR-Eyre' (2nd from right) with comparators 'Karoo' (2nd from left), 'ATR-Hyden' (far right) and 'Surpass501TT' (far left).

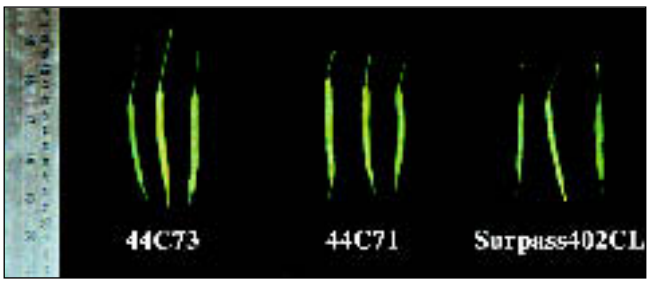

Fig 41 Canola – pods of '44C73' (left) with comparators '44C71' (centre) and 'Surpass402CL' (right) showing differences in siliqua length and beak length.

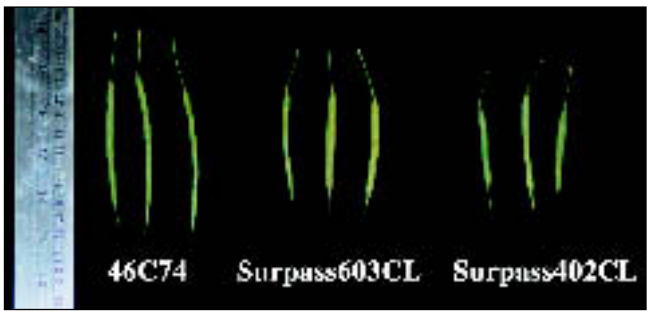

Fig 42 Canola – pods of '46C74' (left) with comparators 'Surpass603CL' (centre) and 'Surpass402CL' (right) showing differences in siliqua length and beak length.

Fig 43 Canola – pods of '45C75' (left) with comparators 'Surpass603CL' (centre) and 'Surpass402CL' (right) showing differences in siliqua length and beak length.

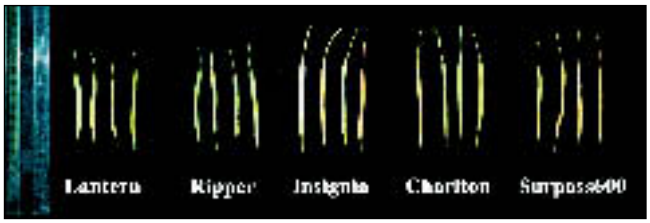

Fig 44 Canola – pods of 'Lantern' (left) with comparators 'Ripper', 'Insignia', 'Charlton' and 'Surpass600' (from left to right) showing differences in siliqua length, peduncle length and beak length.

Fig 45 Barley – 'CK 85'(left) with comparators 'Koru' (centre) and 'Gilbert' (right) showing differences in plant height.

Fig 46 Wheat – 'Drysdale' (left) with comparators 'Sunstate' (centre) and 'Hartog' (right) showing differences in plant height.

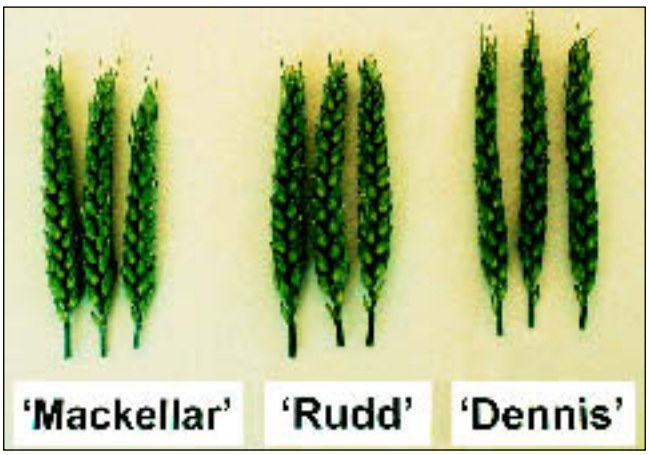

Fig 47 Wheat – 'Mackellar' (left), 'Rudd' (centre) with comparator 'Dennis' (right) showing differences in ear length.

Fig 48 Chickpea – pods and seeds of 'Jimbour' (left) with comparators 'Barwon' (centre) and 'Amethyst' (right).

Fig 49 Arrowleaf Clover – typical flowering spikes of (from left) 'Cefalu', 'Zulu II' and 'Zulu' collected on 25/11/01, showing relative times to flowering.

Fig 50 Red Clover – comparison of flowering time between 'Sensation' (left) and closest flowering parent 'Renova' (right).

(Continued from page 48)
(RHS 186A). Staminodia: outline narrow triangular, collar colour white. Style: colour at maturity white. Calyx tube: longitudinal furrowing weak, outline flared, mid point colour at mid maturity brown. (Note: all RHS colour chart numbers refer to 1986 edition.)

Origin and Breeding Controlled pollination: seed parent *C. uncinatum* 'UWA Purple' x *C. megalopetalum* 'MCL' at Shenton Park in WA. The seed parent is characterised by medium size leaf and the pollen parent is characterised by white petal colour. Hybridisation undertaken on 19 Sep 1996, fruit harvested on 7 Nov 1996 and the resultant embryos were put into tissue culture, germinated, sub-cultured 4 times, deflasked in May-Jun 1997 and planted out at Medina Research Station in Oct 97. 'Purple Gem' (breeder's code: WX14) was selected from one of the embryos' tissue cultured plantlets after flowering in 1998. All plantlets were found to be uniform and stable. The plantlets were further vegetatively propagated from cuttings in Nov 1998. All plants were found to be uniform and stable. Selection criteria: flowering time, floral display of large pink and purple flowers, strong plant vigour. Propagation: embryo rescue, tissue culture, cutting. Breeder: Department of Agriculture, Western Australia.

Choice of Comparators The grouping characteristics used in identifying the most similar varieties of common knowledge were: Plant habit upright, Flower: arrangement narrow distal, Petal colour: purple. On the basis of these grouping characteristics, 'Painted Lady'(ϕ) and the seed parent 'UWA Purple' were considered as the most similar varieties. 'Painted Lady'(ϕ) has similar parentage to the candidate variety. 'Madonna'(ϕ) was initially considered but later excluded because its petal colour changes to pink over time while the candidate remains purple. The pollen parent *C. megalopetalum* 'MCL' was not considered for its white petal colour.

Comparative Trial Location: Department of Agriculture Research Station, Medina, WA. Conditions: plants propagated by cuttings and planted in open field of sandy soil with drip irrigation and fertigation. Trial design: 15 plants of each variety, replicated randomised block design. Measurements: made on 20 typical organs from all plants.

Prior Application and Sales Nil.

Description: **Philip Watkins**, Sunglow Flowers Pty Ltd, Perth, WA.

Table 22 *Chamelaucium* varieties

	'Purple Gem'	***'Painted Lady'(ϕ)**	***'UWA Purple'**
BRANCH ANGLE (degrees)			
mean	44.10	24.60	34.60
std deviation	2.22	1.98	1.67
LSD/sig	1.45	P≤0.01	P≤0.01
LEAF LENGTH (mm)			
mean	11.98	10.55	23.20
std deviation	0.47	0.51	0.77
LSD/sig	0.44	P≤0.01	P≤0.01
LEAF TIP SHAPE	acute	acute	hooked
FIRST FLOWERING (date)	2 Jul	18 Jun	11 Jun
	early-medium	early	early
FLOWER DENSITY	medium	medium-dense	medium
FLOWER SHAPE	cup-shaped	cup-shaped	star-shaped
FLOWER DIAMETER (mm)			
mean	20.60	14.30	17.60
std deviation	0.60	0.66	0.66
LSD/sig	0.47	P≤0.01	P≤0.01
BUD COLOUR WITHOUT CAP (RHS, 1986)	62C light pink	70B purple	78A purple
PETAL COLOUR AT FIRST OPENING (RHS, 1986)	62D light pink	70B-69A purple-light purple	77C-77B purple
PETAL COLOUR AT TWO WEEKS AFTER OPENING (RHS, 1986)	68B red-purple	74C-70D pink	78A purple
PETAL COLOUR AT SIX WEEKS AFTER OPENING (RHS, 1986)	72C purple	74C pink	74A dark pink
NECTARY COLOUR AT FIRST OPENING (RHS, 1986)	160A greyed-yellow	174B greyed-orange	195A greyed-green
NECTARY COLOUR AT TWO WEEKS AFTER OPENING (RHS, 1986)	161A greyed-yellow	181B greyed-red	186B greyed-purple
NECTARY COLOUR AT SIX WEEKS AFTER OPENING (RHS, 1986)	186A greyed-purple	181B greyed-red	187D greyed-purple
STAMINODIA COLLAR COLOUR	white	pink	pink
CALYX TUBE FURROWING	weak	absent-very weak	weak
CALYX TUBE MID POINT COLOUR	brown	brown	red-brown

Cicer arietinum
Chickpea

'Jimbour'

Application No: 2001/301 Accepted: 26 Mar 2002.
Applicant: **The State of Queensland through the Department of Primary Industries,** Brisbane, QLD
and **Department of Agriculture for and on behalf of the State of New South Wales,** Orange, NSW
and **Grains Research and Development Corporation,** Barton, ACT.

Characteristics (Table 23, Figure 48) Plant: type desi, attitude erect, height medium (52.9cm). Stem: anthocyanin present, internode length medium (24.3mm). Leaf: rachis length medium (54.4mm). Leaflet: length long (15.4mm), width wide (7.9mm), anthocyanin present on lower leaflets. Flower: colour purplish pink, peduncle medium (14.5mm), time of flowering medium. Pod: length long (24mm), width wide (10.7mm), intensity of green colour medium, predominant number of ovules one or two. Seed: colour tan, intensity of colour medium, weight medium (20.7g per 100 seeds), shape angular, ribbing medium. Time of maturity: medium. Disease reaction: moderately resistance to Phytophthora root rot.

Origin and Breeding Controlled pollination: seed parent 'Amethyst' x pollen parent 'Barwon'ϕ. The seed parent is characterised by lighter seed colour and smaller seed size. The pollen parent is characterised by longer rachis length and later flowering. Hybridisation took place in Tamworth, NSW in 1988. From this cross, a bulk F_3 population designated as 8813 was grown in a Phytophthora infected field at Hermitage Research Station in 1990. The seed was bulk harvested and large seed and appropriate colour were selected for planting in the same field in 1991. Single plants were selected and yield testing commenced in 1992. The line known as 8813-63H was selected in 1997. Selection criteria: high yield, good quality seed and resistance to Phytophthora root rot. Propagation: seed. Breeder: E J Knights, Tamworth, NSW.

Choice of Comparators Grouping characteristics used in identifying the most similar varieties of common knowledge were – Time of flowering, Plant height, Pod length and Seed size. On the basis of these grouping characteristics the parental varieties 'Barwon'ϕ and 'Amethyst' were selected as the most similar varieties. 'Norwin'ϕ, 'Desavic', 'Dooen', 'Heera' and 'Sona' were initially considered for the comparative trial. However, 'Sona' and 'Heera' were later excluded because they flowered earlier than 'Jimbour'. 'Dooen' was excluded because of late flowering. 'Desavic', was excluded because its plant height was short. 'Norwin'ϕ was excluded because pod and seed size were small.

Comparative Trial Location: Hermitage Research Station Warwick, QLD, Jun-Dec 1999. Conditions: plants raised in black clay soil in the field. No irrigation or fertiliser was applied. Trial design: 300 plants arranged in randomised complete blocks with three replicates. Plot size: single 5m row with 70cm between rows. Measurements: on 30 random plants.

Prior Applications and Sales
No prior applications. First Australian sale Apr 2001.

Description: **John Rose,** Warwick, QLD.

Table 23 *Cicer* varieties

	'Jimbour'	*'Barwon'ϕ	*'Amethyst'
PLANT ATTITUDE			
	erect	semi-erect	erect
PLANT HEIGHT (cm)			
mean	52.93	55.46	49.50
std deviation	10.76	2.67	4.68
LSD/sig	2.95	ns	P≤0.01
INTERNODE LENGTH (mm)			
mean	24.27	26.07	22.37
std deviation	2.20	3.28	2.76
LSD/sig	0.94	P≤0.01	P≤0.01
LEAFLET LENGTH (mm)			
mean	15.43	14.47	12.57
std deviation	1.52	1.53	1.55
LSD/sig	0.78	P≤0.01	P≤0.01
LEAFLET WIDTH (mm)			
mean	7.87	7.47	6.93
std deviation	0.97	0.73	0.98
LSD/sig	0.63	ns	P≤0.01
RACHIS LENGTH (mm)			
mean	54.4	60.93	51.13
std deviation	4.85	6.56	5.14
LSD/sig	1.40	P≤0.01	P≤0.01
PEDUNCLE LENGTH (mm) – stem to elbow			
mean	14.53	14.97	13.6
std deviation	1.76	2.77	1.98
LSD/sig	0.84	ns	P≤0.01
POD LENGTH (mm) – longest part including point			
mean	24.0	23.43	22.13
std deviation	1.49	1.89	1.55
LSD/sig	0.77	ns	P≤0.01
POD WIDTH (mm) – widest part			
mean	10.70	10.33	10.07
std deviation	0.53	0.71	0.69
LSD/sig	0.46	ns	P≤0.01
DAYS TO FLOWER FROM SOWING			
mean	106.44	110.87	103.92
std deviation	2.19	2.19	2.71
LSD/sig	1.05	P≤0.01	P≤0.01
SEED WEIGHT – g/100seeds			
mean	20.7	21.44	17.56
std deviation	1.84	2.90	1.56
LSD/sig	1.71	ns	P≤0.01
SEED INTENSITY OF COLOUR			
	medium	medium	light
RESISTANCE TO PHYTOPHTHORA ROOT ROT			
	moderately resistant	susceptible	moderately resistant

Gardenia radicans
Gardenia

'CATT 2'

Application No: 2001/201 Accepted: 17 Sep 2001.
Applicant: **D and M Catt Nurseries,** Annangrove, NSW.

Characteristics (Table 24, Figure 21) Plant: habit upright, density compact, degree of branching many, height low, width medium. Stem: internode length short, colour yellow-green (RHS 144A). Leaf: length medium, width narrow-medium, shape elliptic, symmetry mostly asymmetric (with an almost sinuate margin), base attenuate, apex acute, variegation present along margin (ranges from fine to spreading to mid-rib, usually one third to half way from margin to mid-rib), colour of variegation yellow (RHS 4D), main colour yellow-green (ca RHS 147A). Flower: colour white. (Note: all RHS colour chart numbers refer to 1995 edition.)

Origin and Breeding Spontaneous mutation: from *Gardenia radicans*. The parental form is characterised by non-variegated leaves. A variegated mutant was selected from a stock plant in Annangrove, NSW. Selection took place in 1999 and uniformity and stability were confirmed through more than 10 generations propagated vegetatively by cuttings. Selection criteria: foliage variegation, colour and vigour. Propagation: by vegetative cuttings. 'CATT 2' will be commercially propagated by vegetative cuttings from original stock plants. Breeder: Greg Catt, Annangrove, NSW.

Choice of Comparators The grouping characteristic used in identifying the most similar varieties of common knowledge was – Leaf: variegation present. Based on this grouping characteristic no other variegated form of *G. radicans* of common knowledge have been identified. Therefore, the parental form of *G. radicans* was chosen as the sole comparator for the purpose of providing evidence of breeding. The parental form has some similarities with the candidate in plant habit.

Comparative Trial Location: Kincumber, NSW, spring – summer 2001. Conditions: plants were raised in a standard potting mixture in 140mm pots in open beds. Trial design: 12 plants of each variety arranged in a completely randomised design. Measurements: taken from 10 specimens at random, one sample per plant.

Prior Applications and Sales
No prior applications. First sold in Australia in Jan 2001.

Description: **Ian Paananen,** Crop & Nursery Services, Central Coast, NSW.

Table 24 *Gardenia* varieties

	'CATT 2'	***G. radicans***
PLANT HEIGHT (cm) – tallest point on plant		
mean	12.6	20.5
std deviation	1.0	2.0
LSD/sig	1.82	P≤0.01
PLANT WIDTH (cm) – maximum width		
mean	26.5	36.3
std deviation	5.3	4.3
LSD/sig	5.49	P≤0.01
PLANT VIGOUR		
	medium	strong
INTERNODE LENGTH (mm) – longest stem, proximal to measured leaf		
mean	17.4	28.3
std deviation	4.0	8.2
LSD/sig	7.41	P≤0.01
LEAF LENGTH (mm) – newest mature leaf on longest stem, largest on node		
mean	34.5	52.8
std deviation	4.3	8.2
LSD/sig	7.49	P≤0.01
LEAF WIDTH (mm) – widest point on leaf, as for length		
mean	8.3	15.4
std deviation	1.2	2.3
LSD/sig	2.10	P≤0.01
LEAF SYMMETRY		
	mostly asymmetric	symmetric
LEAF MARGIN		
	entire to sinuate	entire
LEAF VARIEGATION		
	present	absent
LEAF COLOUR (RHS 1995)		
margin	4D	darker than 147A
main colour	ca. 147A	darker than 147A
FLOWERING TIME		
	late	medium

Gazania hybrid
Gazania

'Sugaja'

Application No: 2000/261 Accepted: 14 Feb 2001.
Applicant: **NuFlora International Pty Ltd**, Macquarie Fields, NSW.

Characteristics (Table 25, Figure 23) Plant: growth habit spreading, size compact, life cycle perennial. Leaves: pubescence on upper surface present, type of pubescence on upper surface medium tomentose, pubescence on lower surface present, type of pubescence on lower surface strong tomentose, colour of upper surface with tomentose greyed-green, without tomentose green (RHS 139A). Inflorescence: form capitulum, diameter large (mean 75.31mm), type "double" (disk florets corolla tubes extended like the ray floret limbs). Ray floret: colour of top middle zone greyed-orange (RHS 168A), colour of bottom middle zone greyed-orange (RHS 169A), colour of marginal zone greyed-orange (ca. 168A), basal spot present, size of basal spot large, colour of basal spot greyed-orange (RHS 177A). (Note: RHS colour chart numbers refer to 1995 edition.)

Origin and Breeding Controlled pollination: seed parent 'Sunset Hannah' x pollen parent breeding line A960022. The seed parent is distinguished by yellow flower colour. The pollen parent is distinguished by "single" flowers (disk florets clearly different from the ray florets). Hybridisation took place at Plant Breeding Institute, Cobbitty, NSW in 1996. In 1997 'Sugaja' was selected from field-grown trials and tested in pot trials. Selection criteria: "double" flower, flower colour and plant compactness. Propagation: 'Sugaja' is maintained in tissue culture and has been propagated with no off types observed. Breeder: Dr. Thomas Cunneen, The University of Sydney, Plant Breeding Institute, Cobbitty, NSW.

Choice of Comparators Grouping characteristic used in identifying the most similar varieties of common knowledge was – Inflorescence: type "double" (disk florets corolla tubes extended like the ray floret limbs). On this basis 'Double Yellow' and 'Sugamo' were selected as comparators. 'Double Orange' was initially considered but later rejected due to its smaller inflorescence diameter. The parents were not considered for reasons stated above.

Comparator Trial Location: Plant Breeding Institute, Cobbitty, NSW, Aug – Dec 2000. Conditions: trial conducted in raised garden beds in open. All plants were started from plugs, transplanted to 10cm pots on Aug 15 and planted in raised beds on Oct 3. Beds were drip irrigated as required, no treatments were needed for pests or diseases. Nutrition was maintained with slow release fertiliser. Trial design: 20 plants of 'Sugaja' and 'Sugamo' and 10 plants of the 'Double Yellow' were arranged in a completely randomised design. Measurements: taken from 10 random 'Sugaja' and 'Sugamo' plants and from each of 'Double Yellow'.

Prior Applications and Sales

Country	Year	Status	Name Applied
European Union	2000	Applied	'Sugaja'
New Zealand	2001	Applied	'Sugaja'

First sold in Australia in Aug 1999.

Description: **John Oates,** VF Solutions, Tuross Head, NSW and **Graham Brown,** Cobbitty, NSW.

'Sugamo'

Application No: 2000/262 Accepted: 14 Feb 2001.
Applicant: **NuFlora International Pty Ltd**, Macquarie Fields, NSW.

Characteristics (Table 25, Figure 23) Plant: growth habit spreading, size compact, life cycle perennial. Leaves: pubescence on upper surface absent (glabrous), glossiness of upper surface strong, pubescence on lower surface present, type of pubescence on lower surface strong tomentose, colour of upper surface green (RHS 139A). Inflorescence: form capitulum, diameter large (mean 72.89mm), type "double" (disk florets corolla tubes extended like the ray floret limbs). Ray floret: colour of upper top zone red-purple (RHS 58A), colour of bottom middle zone red-purple (RHS 59A), colour of marginal zone yellow (RHS 4A), basal spot present, size of basal spot medium, colour of basal spot brown (ca RHS 200A). (Note: RHS colour chart numbers refer to 1995 edition.)

Origin and Breeding Controlled pollination: seed parent 'Sunabout'(ϕ) x pollen parent breeding line GI-001. The seed parent is distinguished by yellow flower colour. The pollen parent is distinguished by "single" flowers (disk florets clearly different from the ray florets). Hybridisation took place at Plant Breeding Institute, Cobbitty, NSW in 1996. In 1997 'Sugamo' was selected from field-grown trials and tested in pot trials. Selection criteria: "double" flower, flower colour and plant compactness. Propagation: 'Sugamo' is maintained in tissue culture and has been propagated with no off types observed. Breeder: Dr. Thomas Cunneen, The University of Sydney, Plant Breeding Institute, Cobbitty, NSW.

Choice of Comparators Grouping characteristic used in identifying the most similar varieties of common knowledge was – Inflorescence: type "double" (disk florets corolla tubes extended like the ray floret limbs). On this basis 'Double Yellow' and 'Sugaja' were selected as comparators. 'Double Orange' was initially considered but later rejected due to its smaller inflorescence diameter. The parents were not considered for reasons stated above.

Comparator Trial Location: Plant Breeding Institute, Cobbitty, NSW, Aug – Dec 2000. Conditions: trial conducted in raised garden beds in open. All plants were started from plugs, transplanted to 10cm pots on Aug 15 and planted in raised beds on Oct 3. Beds were drip irrigated as required, no treatments were needed for pests or diseases. Nutrition was maintained with slow release fertiliser. Trial design: 20 plants of 'Sugaja' and 'Sugamo' and 10 plants of the 'Double Yellow' were arranged in a completely randomised design. Measurements: taken from 10 random 'Sugaja' and 'Sugamo' plants and from each of 'Double Yellow'.

Prior Applications and Sales

Country	Year	Status	Name Applied
European Union	2000	Applied	'Sugamo'
New Zealand	2001	Applied	'Sugamo'

First sold in Australia in Aug 1999.

Description: **John Oates,** VF Solutions, Tuross Head, NSW and **Graham Brown,** Cobbitty, NSW.

Table 25 *Gazania* varieties

	'Sugamo'	'Sugaja'	*'Double Yellow'
LEAF: UPPER SURFACE			
pubescence	absent	present	present
type of pubescence	n/a	medium tomentose	lightly tomentose
LEAF COLOUR: UPPER SURFACE (without pubescence) (RHS, 1995)	139A	139A	139A
INFLORESCENCE DIAMTER (mm) LSD (P≤0.01) = 2.77			
mean	73.89[a]	75.31[a]	52.92[b]
std deviation	3.17	2.20	2.93

SCAPE LENGTH (mm) LSD (P≤0.01) = 3.17			
mean	133.67[a]	134.10[a]	114.04[b]
std deviation	3.31	4.53	2.95
RAY FLORET WIDTH (mm) LSD (P≤0.01) = 2.01			
mean	16.12[a]	17.06[a]	11.62[b]
std deviation	2.37	1.99	1.20
RAY FLORET COLOUR (RHS, 1995)			
top middle zone	58A	168A	4A
bottom middle zone	59A	169A	4A
marginal zone	4A	ca 168A	4A
RAY FLORET: BASAL SPOT			
size	medium	large	small
colour	ca 200A	177A	202A

mean values followed by the same letter are not significantly different at P≤0.01.

Hordeum vulgare
Barley

'CK85'

Application No: 2001/076 Accepted: 27 Mar 2001.
Applicant: **The State of Queensland through its Department of Primary Industries**, Brisbane, QLD and **The Grains Research and Development Corporation,** Barton, ACT.

Characteristics (Table 26, Figure 45) Plant: growth habit semi-erect, height medium. Lower leaves: hairiness of leaf sheath absent. Flag Leaf: anthocyanin colouration of auricles present, intensity of anthocyanin colouration of auricles very strong, glaucosity of sheath strong. Time of ear emergence: medium. Ear: attitude semi-erect, length medium, number of rows two, density medium, shape parallel, glaucosity weak. Awns: length compared to ear long, anthocyanin colouration of tips present, intensity of anthocyanin colouration of tips strong-medium, spiculation of margins present. Rachis: length of first segment short, curvature of first segment medium. Sterile spikelet: attitude divergent. Median spikelet: length of glume and its awn relative to grain equal. Grain: rachilla hair type long, husk present, spiculation of inner lateral nerves of dorsal side of lemma strong, hairiness of ventral furrow present, disposition of lodicules clasping. Kernel: colour of aleurone layer whitish. Seasonal type: spring.

Origin and Breeding Controlled pollination: seed parent 'Cameo' x pollen parent 'Koru'. The seed parent is characterised by medium intensity of anthocyanin colouration of the auricles, medium time to ear emergence, medium intensity of anthocyanin colouration of the tips of the awns, short length of awns compared to the ears, weak curvature of the first segment of the rachis and an absence of hair in the ventral furrow. The pollen parent is characterised by medium anthocyanin colouration of the auricles, medium-late time to ear emergence, strong-medium intensity of anthocyanin colouration of the awns, long awns compared to the ear length, medium curvature of the first rachis segment and presence of hair in the ventral furrow. Hybridisation took place in Warwick, QLD in 1989. From this cross, F_2 derived line number 85 was tested in field trials between 1993 and 2001 and selected on the basis of agronomic, plant pathology and grain quality data. Selection criteria: high grain yield potential and suitable agronomic characteristics for cultivation in QLD and northern NSW. Propagation: small seed increase plots were checked for uniformity in 1998 and 1999. Bulked seed from these plots was sown into a mother seed increase plot at Jondaryan, QLD in 2000. The mother seed plot was extensively rogued to ensure seed purity. The mother seed was harvested using a thoroughly cleaned plot harvester and used to sow commercial scale seed production fields in 2001. Breeder: Dr Raymond Paul Johnston, Queensland Department of Primary Industries, Agency for Food and Fibre Science, Farming Systems Institute, Hermitage Research Station, Warwick, QLD.

Choice of Comparators The grouping characteristics used in identifying the most similar varieties of common knowledge were – Lower leaves: hairiness of leaf sheaths absent, Awns: anthocyanin colouration of tips present, Ear: number of rows two, Grain: rachilla hair type long, Grain: hairiness of ventral furrow present, Seasonal type: spring. On the basis of these grouping characteristics, the following comparator varieties were included in the trial: 'Koru' (pollen parent) and 'Gilbert'. Initially, 'Tallon' 'Gairdner'[D] and 'Cameo' (seed parent) were also considered but later rejected because they differ from the candidate variety in the grouping characteristics mentioned above.

Comparative Trial Location: Sown at Hermitage Research Station, via Warwick, QLD (28º 12′ 45″ South 152º 06′ 15″ East). Conditions: sown into a deep cracking black clay soil on Jun 22, 2001. Sowing Rate 60,000 plants/ha with supplemental irrigation. Trial design: a 3-replicate latinised row column design. Measurements: 30 random plants sampled per trial entry per characteristic (10 observations per replicate).

Prior Applications and Sales
No prior applications. First sold in Australia in Jul 2001.

Description: **David M. E. Poulsen**, Queensland Department of Primary Industries – Farming Systems Institute, Warwick, QLD.

Table 26 *Hordeum* varieties

	'CK85'	***'Koru'**	***'Gilbert'**
PLANT: GROWTH HABIT	semi-erect	semi-erect	intermediate
FLAG LEAF: INTENSITY OF ANTHOCYANIN COLOURATION OF AURICLES	very strong	medium	very weak
TIME OF EAR EMERGENCE	medium	medium-late	medium-late
AWNS: INTENSITY OF ANTHOCYANIN COLOURATION OF THE TIPS	strong-medium	strong-medium	strong

Table 26 continued

PLANT LENGTH (stem, ear and awns) (cm) – to tip of awns			
mean	79.1	83.4	85.07
std deviation	4.22	5.16	4.54
LSD/sig	3.09	P≤0.01	P≤0.01

Impatiens hawkeri
New Guinea Impatiens

'Balcebchro'

Application No: 2001/350 Accepted: 26 Mar 2002.
Applicant: **Ball FloraPlant-A Division of Ball Horticultural Company**, West Chicago, IL, USA.
Agent: **Oasis Horticulture Pty Ltd,** Winmalee, NSW.

Characteristics (Table 27, Figure 4) Plant: height medium to tall (mean 180mm), width broad (mean 396mm). Leaf: length medium (mean 143.8mm), width medium to broad (mean 45.7mm), blade shape ovate to elliptic, ground colour of upper side green, markings absent, colour of lower side between veins green. Flower: type single, diameter medium to large (mean 65.6mm), number of colours one, main colour of upper side of petals red-purple (ca N57A), eye zone absent. Flowering: commenced 14/12/01. (Note: all RHS colour chart numbers refer to 2001 edition.)

Origin and Breeding Controlled pollination: seed parent proprietary breeding line No. 693 x pollen parent proprietary breeding line No. 3177 in a planned breeding program in Arroyo Grande, California, USA. The seed parent is characterised by scarlet flower colour. The pollen parent is characterized by dark lavender flower colour. 'Balcebchro' was selected from the seedling population of this cross in Dec 1996 at Arroyo Grande, California, USA. Selection criteria: plant growth habit and flower type. Propagation: vegetative tip cuttings. 'Balcebchro' has been found to be uniform and stable through many generations since selection. Breeder: Dr. Scott Trees, Arroyo Grande, California, USA.

Choice of Comparators Grouping characteristics used in identifying the most similar varieties of common knowledge were – Leaf blade: shape ovate to elliptic, ground colour green, markings absent. Flower: number of colours one, main colour of upper side of petals red-purple, eye zone absent. On the basis of these grouping characteristics the following variety was included in the trial: 'BFP-368 Rose'(ϕ) syn Rose Celebration(ϕ) and 'Kinoc'(ϕ) syn 'Noctua'(ϕ). For the purpose of providing evidence of breeding, the parent material can be clearly distinguished from the candidate variety using the grouping characteristic – Flower: colour.

Comparative Trial Location: Winmalee, NSW, Sep – Dec 2001. Conditions: trial conducted in heated/ventilated polyhouse, rooted cuttings (propagated from stock plants grown at Winmalee) potted in Sep into 150mm standard pots in commercial potting mix, nutrients supplied by slow release and liquid feed fertiliser applications, plant protection treatments applied as necessary. Trial design: 10 pots of each variety arranged in a completely randomised design. Measurements: taken from 10 plants per variety selected at random (one sample per plant).

Prior Applications and Sales

Country	Year	Current Status	Name Applied
Canada	1998	Granted	'Balcebchro'
EU	1999	Granted	'Balcebchro'
USA	1999	Granted	'Balcebchro'

First sold in USA and Canada in Jan 1999. First sold in Australia in Jan 2001.

Description: **Tim Angus**, Tim Angus Horticulture, Wellington, NZ.

Table 27 *Impatiens* varieties

	'Balcebchro'	'Balfafusia'	*'BFP-368 Rose'ϕ syn Rose Celebrationϕ	*'Kinoc'ϕ syn 'Noctua'ϕ
PLANT HEIGHT (mm) LSD (P≤0.01) = 20				
mean	180[b]	211[a]	167[bc]	140[c]
std deviation	5.8	20.7	16.5	7.1
PLANT WIDTH (mm) LSD (P≤0.01) = 42.5				
mean	396[b]	456[a]	390.5[b]	259.5[c]
std deviation	23.3	32.7	33.7	27.7
LEAF LENGTH (mm) LSD (P≤0.01) = 12.2				
mean	143.8[b]	106.7[c]	168.6[a]	137.6[b]
std deviation	8.0	6.2	10.9	8.3
LEAF WIDTH (mm) LSD (P≤0.01) = 4.4				
mean	45.7[ab]	33.8[c]	47.1[a]	43.4[b]
std deviation	2.4	2.7	3.9	3.1
LEAF BLADE VEIN COLOUR ON LOWER SIDE	green	green	green	red
FLOWER DIAMETER (mm) LSD (P≤0.01) = 4.3				
mean	65.6[a]	48.5[c]	60.3[b]	68[a]
std deviation	3.2	1.8	2.5	4.0
FLOWER NUMBER OF COLOURS	1	1	2	1
FLOWER MAIN COLOUR OF UPPER SIDE OF PETALS (RHS, 2001)	red purple ca. N57A	red purple ca. N74A	red purple ca. N 57B	red purple darker than N57A
FLOWER EYE ZONE	absent	present	absent	present
FLOWER COLOUR OF EYE ZONE (RHS, 2001)	n/a	red purple ca. 60A	n/a	red purple ca. 60A
DATE OF FIRST FLOWERING	ca. 22/11/01	ca. 22/11/01	ca. 30/11/01	ca 20/11/01

Note: mean values followed by the same letter are not significantly different at P≤0.01

'Balcelavgo' syn **Celebration Lavender Glow**

Application No: 2000/070 Accepted: 29 Mar 2000.
Applicant: **Ball FloraPlant – A Division of Ball Horticultural Company**, West Chicago, IL, USA.
Agent: **Oasis Horticulture Pty Ltd,** Winmalee, NSW.

Characteristics (Table 28, Figure 7) Plant: height medium (mean 155.5mm), width medium to broad (mean 308mm). Leaf: length medium (mean 138mm), width medium to broad (mean 46.1mm), blade shape ovate to elliptic, ground colour of upper side green, markings absent, colour of lower side between veins green. Flower: type single, diameter medium to large (mean 66.6mm), number of colours one, main colour of upper side of petals purple-violet (between RHS 80A and 80B), eye zone present, mean length of eye zone 9.4mm, colour of eye zone red to red-purple (between RHS 55A and 58C). Flowering: commenced 14/12/01. (Note: all RHS colour chart numbers refer to 2001 edition.)

Origin and Breeding Controlled pollination: seed parent proprietary breeding line BFP-685 x pollen parent 'Kimoo'Φ syn MooreaΦ in a planned breeding program in Arroyo Grande, California, USA. The seed parent is characterised by medium flower diameter and white (RHS 155D) flower colour. The pollen parent is characterised by white (RHS 155D) flower colour. 'Balcelavgo' was selected from the seedling population of this cross in Dec 1996 at Arroyo Grande, California, USA. Selection criteria: plant growth habit and flower type. Propagation: vegetative tip cuttings. 'Balcelavgo' has been found to be uniform and stable through many generations since selection. Breeder: Dr. Scott Trees, Arroyo Grande, California, USA.

Choice of Comparators Grouping characteristics used in identifying the most similar varieties of common knowledge were – Leaf blade: shape ovate to elliptic, ground colour green, markings absent. Flower: number of colours one, main colour of upper side of petals purple-violet, colour of eye zone red to red-purple. On the basis of these grouping characteristics the following variety was included in the trial: 'Kipas'Φ syn PascuaΦ. Another variety, 'Aruba' syn Kiruba was initially considered but later rejected because the colour of lower side of leaf between veins is greyed-purple (RHS 187A). For the purpose of providing evidence of breeding, the parent material can be clearly distinguished from the candidate variety using the grouping characteristic- Flower: colour.

Comparative Trial Location: Winmalee, NSW, Sep – Dec 2001. Conditions: trial conducted in heated/ventilated polyhouse, rooted cuttings (propagated from stock plants grown at Winmalee) potted in Sep into 150mm standard pots in commercial potting mix, nutrients supplied by slow release and liquid feed fertiliser applications, plant protection treatments applied as necessary. Trial design: 10 pots of each variety arranged in a completely randomised design. Measurements: taken from 10 plants per variety selected at random (one sample per plant).

Prior Applications and Sales

Country	Year	Current Status	Name Applied
Canada	1998	Granted	'Balcelavgo'
EU	1998	Granted	'Balcelavgo'
USA	1999	Granted	'Balcelvago'

First sold in USA and Canada in Jul 1998. First sold in Australia in Aug 2000.

Description: **Tim Angus**, Tim Angus Horticulture, Wellington, NZ.

Table 28 *Impatiens* varieties

	'Balcelavgo' syn **Celebration Lavender Glow**	***'Kipas'Φ** syn **PascuaΦ**
PLANT WIDTH (mm)		
mean	308	262.5
std deviation	12.5	23
LSD/sig	24.7	P≤0.01
LEAF LENGTH (mm)		
mean	138	168.9
std deviation	9.0	6.3
LSD/sig	10.4	P≤0.01
LEAF WIDTH (mm)		
mean	46.1	51.9
std deviation	2.8	3.7
LSD/sig	4.4	P≤0.01
LEAF BLADE COLOUR OF LOWER SIDE BETWEEN VEINS		
	green	red
FLOWER MAIN COLOUR OF UPPER SIDE OF PETALS (RHS, 2001)		
	purple violet between 80A and 80B	purple violet N79A
FLOWER SIZE OF EYE ZONE (length in mm)		
mean	9.4	13.4
std deviation	0.5	0.9
LSD/sig	0.3	P≤0.01
FLOWER COLOUR OF EYE ZONE (RHS, 2001)		
	red to red purple between 55A and 58C	red purple 57B
DATE OF FIRST FLOWERING		
	14/12/2001	ca. 25/11/2001

'Balcelilae' syn **Celebration Light Lavender III**

Application No: 2000/071 Accepted: 29 Mar 2000.
Applicant: **Ball FloraPlant – A Division of Ball Horticultural Company**, West Chicago, IL, USA.
Agent: **Oasis Horticulture Pty Ltd,** Winmalee, NSW.

Characteristics (Table 29, Figure 5) Plant: height medium (mean 155mm), width broad (mean 363mm). Leaf: length medium (mean 130.7mm), width medium (mean 44.3mm), blade shape ovate to elliptic, ground colour of upper side green, markings absent, colour of lower side between veins green, vein colour of lower side green. Flower: type single, diameter medium to large (mean 68.8mm), number of colours one, main colour of upper side of petals red-purple (between RHS N74B and N74C), eye zone present, mean

length of eye zone 16.6mm, colour of eye zone white (ca. 155A). Flowering: commenced 24/11/01. (Note: all RHS colour chart numbers refer to 2001 edition.)

Origin and Breeding Open pollination followed by seedling selection: from seed parent 'Kimoo'(Þ syn Moorea(Þ in Arroyo Grande, California, USA in 1997. The seed parent is characterised by white (RHS 155D) flower colour. 'Balcelilae' was selected from the open pollinated seedling population. Selection criteria: plant growth habit and flower type. Propagation: vegetative tip cuttings. 'Balcelilae' has been found to be uniform and stable through many generations since selection. Breeder: Dr. Scott Trees, Arroyo Grande, California, USA.

Choice of Comparators Grouping characteristics used in identifying the most similar varieties of common knowledge were- Leaf blade: shape ovate to elliptic, ground colour green, markings absent. Flower: number of colours one, main colour of upper side of petals red-purple, colour of eye zone white. On the basis of these grouping characteristics the following variety was included in the trial: 'Kitoga'(Þ syn Toga(Þ. Another variety, 'Tonga' syn Kinga was initially considered but later rejected because the flower colour is RHS 75A with secondary colour RHS 74B-C. For the purpose of providing evidence of breeding, the seed parent material can be clearly distinguished from the candidate variety using the grouping characteristic – Flower: colour.

Comparative Trial Location: Winmalee, NSW, Sep – Dec 2001. Conditions: trial conducted in heated/ventilated polyhouse, rooted cuttings (propagated from stock plants grown at Winmalee) potted in Sep into 150mm standard pots in commercial potting mix, nutrients supplied by slow release and liquid feed fertiliser applications, plant protection treatments applied as necessary. Trial design: 10 pots of each variety arranged in a completely randomised design. Measurements: taken from 10 plants per variety selected at random (one sample per plant).

Prior Applications and Sales

Country	Year	Current Status	Name Applied
Canada	1998	Granted	'Balcelilae'
EU	1999	Granted	'Balcelilae'
USA	1999	Granted	'Balcelilae'

First sold in USA and Canada in Jan 1999. First sold in Australia in Aug 2000.

Description: **Tim Angus**, Tim Angus Horticulture, Wellington, NZ.

Table 29 *Impatiens* varieties

	'Balcelilae' syn **Celebration Light Lavender III**	**'Balfaflav'**	**'Kitoga'Φ** syn **Toga Φ**
PLANT HEIGHT (mm) LSD (P≤0.01) = 17.2			
mean	155[a]	114.5[b]	122[b]
std deviation	13.5	11.7	15.5
PLANT WIDTH (mm) LSD (P≤0.01) = 26.1			
mean	363[b]	443[a]	219[c]
std deviation	20.0	18.3	23.3
LEAF LENGTH (mm) LSD (P≤0.01) = 10.5			
mean	130.7[a]	82.1[c]	118.4[b]
std deviation	10.1	7.6	6.9
LEAF WIDTH (mm) LSD (P≤0.01) = 3.41			
mean	44.3[a]	27.3[b]	41.7[a]
std deviation	3.0	2.1	3.0
LEAF BLADE VEIN COLOUR LOWER SIDE			
	green	red	red
FLOWER DIAMETER (mm) LSD (P≤0.01) = 3.6			
mean	68.8[a]	54.9[b]	69.5[a]
std deviation	3.1	3.0	2.2
FLOWER MAIN COLOUR OF UPPER SIDE OF PETALS (RHS, 2001)			
	red purple between N74B and N74C	red purple N74A	purple ca. 75A
FLOWER SIZE OF EYE ZONE (length in mm) LSD (P≤0.01) = 1.2			
mean	16.6[a]	11.4[b]	13.9[c]
std deviation	0.8	0.5	1.4
FLOWER COLOUR OF EYE ZONE (RHS, 2001))			
	white ca. 155A	greyed white ca. 156D with red purple on two lower petals N66A	green white 157C with red purple in centre 65A
DATE OF FIRST FLOWERING			
	ca. 24/11/01	ca. 22/11/01	ca. 22/11/01

Note: mean values followed by the same letter are not significantly different at P≤0.01

'Balcelisow' syn Celebration Salmon II

Application No: 2000/072 Accepted: 29 Mar 2000.
Applicant: **Ball FloraPlant-A Division of Ball Horticultural Company**, West Chicago, IL, USA.
Agent: **Oasis Horticulture Pty Ltd,** Winmalee, NSW.

Characteristics (Table 30, Figure 6) Plant: height medium to short (mean 143mm), width medium to broad (mean 307.5mm). Leaf: length medium (mean 121mm), width medium (mean 38mm), blade shape ovate to elliptic, ground colour of upper side green, markings absent, colour of lower side between veins green. Flower: type single, diameter medium (mean 60.2mm), number of colours two, main colour of upper side of petals red (between RHS 43B and 43C), eye zone present, mean length of eye zone 10.9mm, colour of eye zone red to red-purple (RHS 53D at centre, 71D at edge). Flowering: commenced 14/12/01. (Note: all RHS colour chart numbers refer to 2001 edition.)

Origin and Breeding Controlled pollination: seed parent 'Celebration Light Salmon' x pollen parent 'Samoa' syn Kimoa in a planned breeding program in Arroyo Grande, California, USA. The seed parent is characterised by red (RHS 50C) flower colour and eye zone colour RHS 56C. The pollen parent is characterized by pinkish white flower

colour and red-purple eye zone colour (RHS 63A). 'Balcelisow' was selected from the seedling population of this cross in Aug 1997 at Arroyo Grande, California, USA. Selection criteria: plant growth habit and flower type. Propagation: Vegetative tip cuttings. 'Balcelisow' has been found to be uniform and stable through many generations since selection. Breeder: Dr. Scott Trees, Arroyo Grande, California, USA.

Choice of Comparators Grouping characteristics used in identifying the most similar varieties of common knowledge were – Leaf blade: shape ovate to elliptic, ground colour green, markings absent. Flower: main colour of upper side of petals red, colour of eye zone red to red-purple. On the basis of these grouping characteristics the following variety was included in the trial: 'Kigre'Φ syn Grenada Φ. Another variety, 'Tobago' syn Kibago was initially considered but later rejected because its main colour of upper side of petals is RHS 52C with eye zone colour 61B. For the purpose of providing evidence of breeding, the parent material can be clearly distinguished from the candidate variety using the grouping characteristic – Flower: colour.

Comparative Trial Location: Winmalee, NSW, Sep – Dec 2001. Conditions: trial conducted in heated/ventilated polyhouse, rooted cuttings (propagated from stock plants grown at Winmalee) potted in Sep into 150mm standard pots in commercial potting mix, nutrients supplied by slow release and liquid feed fertiliser applications, plant protection treatments applied as necessary. Trial design: 10 pots of each variety arranged in a completely randomised design. Measurements: taken from 10 plants per variety selected at random (one sample per plant).

Prior Applications and Sales

Country	Year	Current Status	Name Applied
Canada	1998	Granted	'Balcelisow'
EU	1999	Granted	'Balcelisow'
USA	1999	Granted	'Balcelisow'

First sold in USA and Canada in Jan 1999. First sold in Australia in Aug 2000.

Description: **Tim Angus**, Tim Angus Horticulture, Wellington, NZ.

Table 30 *Impatiens* varieties

	'Balcelisow' syn **Celebration Salmon II**	***'Kigre'Φ** syn **Grenada Φ**
PLANT HEIGHT (mm)		
mean	143	174.5
std deviation	13.2	5.5
LSD/sig	13.5	P≤0.01
PLANT WIDTH (mm)		
mean	307.5	264
std deviation	8.9	27.7
LSD/sig	27.4	P≤0.01
LEAF LENGTH (mm)		
mean	121	161.3
std deviation	7.7	7.9
LSD/sig	10.4	P≤0.01
LEAF WIDTH (mm)		
mean	38	49.4
std deviation	1.8	2.2
LSD/sig	2.7	P≤0.01
LEAF BLADE COLOUR OF LOWER SIDE BETWEEN VEINS	green	red
FLOWER DIAMETER (mm)		
mean	60.2	56.5
std deviation	2.9	2.6
LSD/sig	3.6	P≤0.01
FLOWER NUMBER OF COLOURS	2	1
FLOWER MAIN COLOUR OF UPPER SIDE OF PETALS (RHS, 2001)	red between 43B – 43C	red ca. 52C
FLOWER SIZE OF EYE ZONE (length in mm)		
mean	10.9	14.2
std deviation.	0.4	0.9
LSD/sig	0.9	P≤0.01
FLOWER COLOUR OF EYE ZONE (RHS, 2001)	red to red purple 53D at centre 71D at edge	red purple 61B
DATE OF FIRST FLOWERING	14/12/01	ca. 25/11/01

'BFP-796' syn Apricot Celebration

Application No: 2000/274 Accepted: 31 Aug 2000.
Applicant: **Ball FloraPlant-A Division of Ball Horticultural Company**, West Chicago, IL, USA.
Agent: **Oasis Horticulture Pty Ltd,** Winmalee, NSW.

Characteristics (Table 31, Figure 3) Plant: height tall (mean 197mm), width broad (mean 378mm). Leaf: length long (mean 169mm), width broad (mean 52.4mm), blade shape ovate to elliptic, ground colour of upper side green, markings absent, colour of lower side between veins green, vein colour of lower side green. Flower: type single, diameter large (mean 72mm), number of colours one, main colour of upper side of petals orange-red (between RHS 33A and 33B), eye zone present, mean length of eye zone 15.1mm, colour of eye zone red-purple (N74C grading to N74D at centre). Flowering: commenced 30/11/01. (Note: all RHS colour chart numbers refer to 2001 edition.)

Origin and Breeding Open pollination followed by seedling selection: from unnamed *Impatiens hawkeri* parents in Arroyo Grande, California, USA in Sep 1996. Selection criteria: plant growth habit and flower type. Propagation: vegetative tip cuttings. 'BFP-796' has been found to be uniform and stable through many generations since selection. Breeder: Dr. Scott Trees, Arroyo Grande, California, USA.

Choice of Comparators Grouping characteristics used in identifying the most similar varieties of common

knowledge were – Leaf blade: shape ovate to elliptic, ground colour green, markings absent. Flower: number of colours one, main colour of upper side of petals orange-red, colour of eye zone-red purple. On the basis of these grouping characteristics the following varieties were included in the trial: 'Kitim'(ϕ) syn Timor(ϕ) and 'Kixant'(ϕ) syn Xanthia(ϕ). Another variety, 'Celebration Salmon' was initially considered but later rejected because of its different (RHS 46C) flower colour.

Comparative Trial Location: Winmalee, NSW, Sep – Dec 2001. Conditions: trial conducted in heated/ventilated polyhouse, rooted cuttings (propagated from stock plants grown at Winmalee) potted in Sep into 150mm standard pots in commercial potting mix, nutrients supplied by slow release and liquid feed fertiliser applications, plant protection treatments applied as necessary. Trial design: 10 pots of each variety arranged in a completely randomised design. Measurements: taken from 10 plants per variety selected at random (one sample per plant).

Prior Applications and Sales

Country	Year	Current Status	Name Applied
Canada	1997	Granted	'BFP-796'
USA	1998	Granted	'BFP-796'

First sold in USA and Canada in Feb 1997. First sold in Australia in Aug 2000.

Description: **Tim Angus**, Tim Angus Horticulture, Wellington, NZ.

Table 31 *Impatiens* varieties

	'BFP-796' syn **Apricot Celebration**	**'Kitim'ϕ** syn **Timorϕ**	**'Kixant'ϕ** syn **Xanthiaϕ**
PLANT HEIGHT (mm)			
mean	197	168.5	127
std deviation	23.7	6.3	14
LSD/sig	20.6	P≤0.01	P≤0.01
PLANT WIDTH (mm)			
mean	378	256	293
std deviation	30.1	27.3	31.3
LSD/sig	37.4	P≤0.01	P≤0.01
LEAF LENGTH (mm)			
mean	169	142.3	145
std deviation	4.2	6.8	6.2
LSD/sig	7.4	P≤0.01	P≤0.01
LEAF WIDTH (mm)			
mean	52.4	41.1	38.5
std deviation	3.1	4.0	3.4
LSD/sig	4.5	P≤0.01	P≤0.01
LEAF BLADE VEIN COLOUR LOWER SIDE	green	green	red
FLOWER DIAMETER (mm)			
mean	72	61.1	69.5
std deviation	2.6	2.0	2.1
LSD/sig	2.8	P≤0.01	ns
FLOWER MAIN COLOUR OF UPPER SIDE OF PETALS (RHS, 2001)	orange red between 33A and 33B	orange red N30A	orange red ca. N30A
FLOWER EYE ZONE	present	absent	present
FLOWER SIZE OF EYE ZONE (length in mm)			
mean	15.1	n/a	10.8
std deviation	0.7		0.7
LSD/sig	0.9		P≤0.01
FLOWER COLOUR OF EYE ZONE (RHS, 2001)	red purple N74C grading to N74D at centre	n/a	red purple ca. N66A
DATE OF FIRST FLOWERING	ca. 30/11/01	ca. 27/11/01	ca. 22/11/01

Impatiens flaccida x *Impatiens hawkeri*
Impatiens

'Balfafusia'

Application No: 2002/010 Accepted: 26 Mar 2002.
Applicant: **Ball FloraPlant-A Division of Ball Horticultural Company**, West Chicago, IL, USA.
Agent: **Ball Australia Pty Ltd**, Keysborough, VIC.

Characteristics (Table 27, Figure 4) Plant: height tall (mean 211mm), width very broad (mean 456mm). Leaf: length medium to short (mean 106.71mm), width medium (mean 33.8mm), blade shape ovate to elliptic, ground colour upper side green, markings absent, colour of lower side between veins green, vein colour of lower side green. Flower: type single, diameter medium to small (mean 48.5mm), number of colours one, main colour of upper side of petals red-purple (RHS N74A), eye zone present, colour of eye zone red-purple (ca. RHS 60A). Flowering: commenced 22/11/01. (Note: all RHS colour chart numbers refer to 2001 edition.)

Origin and Breeding Controlled pollination: seed parent proprietary breeding selection of *Impatiens flaccida* x pollen parents *Impatiens hawkeri* pollen bulk collected from the Java series F_1 hybrids in a planned breeding program in Cartago, Costa Rica. The seed parent is characterised by a spreading plant habit. The pollen parent is characterised by a bushy plant habit. 'Balfafusia' was selected from the resultant seedling population in 1997. Selection criteria: plant growth habit and flower type. Propagation: vegetative tip cuttings. 'Balfafusia' has been found to be uniform and stable through many generations since selection. Breeder: Mario Guillen, Linda Vista, Cartago, Costa Rica.

Choice of Comparators Grouping characteristics used in identifying the most similar varieties of common knowledge were – Plant: width very wide. Leaf blade: shape ovate to elliptic, ground colour green, markings

absent. Flower: number of colours one, main colour of upper side of petals red purple, colour of eye zone red-purple. On the basis of these grouping characteristics the following variety was included in the trial: 'BFP-368 Rose'(Þ) syn Rose Celebration(Þ) and 'Kinoc'(Þ) syn 'Noctua'(Þ). For the purpose of providing evidence of breeding, the parent material can be clearly distinguished from the candidate variety using the grouping characteristic – Plant: habit and width.

Comparative Trial Location: Winmalee, NSW, Sep – Dec 2001. Conditions: trial conducted in heated/ventilated polyhouse, rooted cuttings (propagated from stock plants grown at Winmalee) potted in Sep into 150mm standard pots in commercial potting mix, nutrients supplied by slow release and liquid feed fertiliser applications, plant protection treatments applied as necessary. Trial design: 10 pots of each variety arranged in a completely randomised design. Measurements: taken from 10 plants per variety selected at random (one sample per plant).

Prior Applications and Sales

Country	Year	Current Status	Name Applied
Canada	2000	Applied	'Balfafusia'
EU	2000	Applied	'Balfafusia'
United States	1999	Applied	'Balfafusia'

First sold in United States and Canada in Apr 2000. First Australian sale nil.

Description: **Tim Angus**, Tim Angus Horticulture, Wellington, NZ.

'Balfaflav'

Application No: 2002/011 Accepted: 26 Mar 2002.
Applicant: **Ball FloraPlant – A Division of Ball Horticultural Company**, West Chicago, IL, USA.
Agent: **Ball Australia Pty Ltd**, Keysborough, VIC.

Characteristics (Table 29, Figure 5) Plant: height short (mean 114.5mm), width very broad (mean 443mm). Leaf: length short (mean 82.1mm), width medium to narrow (mean 27.3mm), blade shape ovate to elliptic, ground colour of upper side green, markings absent, colour of lower side between veins green, vein colour of lower side red. Flower: type single, diameter medium (mean 54.9mm), number of colours one, main colour of upper side of petals red-purple (RHS N74A), eye zone present, mean length of eye zone 11.4mm, colour of eye zone greyed-white (ca. RHS 156D) with red purple (RHS N66A) on two lower petals. Flowering: commenced 22/11/01. (Note: all RHS colour chart numbers refer to 2001 edition.)

Origin and Breeding Controlled pollination: seed parent proprietary breeding selection of *Impatiens flaccida* x pollen parents *Impatiens hawkeri* pollen bulk collected from the Java series F_1 hybrids in a planned breeding program in Cartago, Costa Rica. The seed parent is characterised by a spreading plant habit. The pollen parent is characterised by a bushy plant habit. 'Balfaflav' was selected from the resultant seedling population in 1997. Selection criteria: plant growth habit and flower type. Propagation: vegetative tip cuttings. 'Balfaflav' has been found to be uniform and stable through many generations since selection. Breeder: Mario Guillen, Linda Vista, Cartago, Costa Rica.

Choice of Comparators Grouping characteristics used in identifying the most similar varieties of common knowledge were – Plant: width very wide. Leaf blade: shape ovate to elliptic, ground colour green, markings absent. Flower: number of colours one, main colour of upper side of petals red-purple, colour of eye zone greyed-white with red-purple. On the basis of these grouping characteristics the following varieties were included in the trial: 'Kitoga'(Þ) syn Toga(Þ). Another variety, 'Grape Crush' (US Plant Patent 10,107) was initially considered but later was excluded because of its moderately compact and upright growth habit. For the purpose of providing evidence of breeding, the parent material can be clearly distinguished from the candidate variety using the grouping characteristics: Plant: habit, width.

Comparative Trial Location: Winmalee, NSW, Sep – Dec 2001. Conditions: trial conducted in heated/ventilated polyhouse, rooted cuttings (propagated from stock plants grown at Winmalee) potted in Sep into 150mm standard pots in commercial potting mix, nutrients supplied by slow release and liquid feed fertiliser applications, plant protection treatments applied as necessary. Trial design: 10 pots of each variety arranged in a completely randomised design. Measurements: taken from 10 plants per variety selected at random (one sample per plant).

Prior Applications and Sales

Country	Year	Current Status	Name Applied
Canada	2000	Applied	'Balfaflav'
EU	2000	Applied	'Balfaflav'

First sold in USA and Canada 1 Apr 2000. First Australian sale nil.

Description: **Tim Angus**, Tim Angus Horticulture, Wellington, NZ.

Lavandula angustifolia
English Lavender

'Miss Katherine'

Application No: 2000/163 Accepted: 29 Jun 2000.
Applicant: **Norfolk Lavender Ltd,** Norfolk, United Kingdom.
Agent: **Plants Management Australia Pty Ltd,** Wonga Park, VIC.

Characteristics (Table 32, Figure 17) Plant: growth habit medium bushy, size medium, intensity of green colour of foliage medium, attitude of flowering stems (at full flowering) erect, density medium. Leaf: incision of margin absent. Flowering stem: length (including spike) medium (mean 28.6cm), thickness (at middle third) thin, rigidity of basal part strong, lateral branches (above foliage) present, length of longest lateral branch (above foliage) mean 15.6cm. Spike: maximum width narrow, length mean 10.8cm, length from second whorl mean 4.8cm, distance between second and third whorls mean 1.1cm, shape cylindrical, number of flowers on apical whorl medium, width of fertile bracts narrow, presence of infertile bracts absent. Calyx: colour greyish, intensity of pubescence medium. Corolla: colour RHS 75B-C, colour of inner side markings RHS 87C. (Note: all RHS colour chart numbers refer to 1995 edition.)

Origin and Breeding Spontaneous mutation: first observed as a sport from *Lavandula angustifolia* No.6 at Norfolk Lavender Ltd, Heacham, Norfolk, United Kingdom in 1991. The pink flowering mutant was selected for and isolated on the 5/01/91 from the purple coloured parent. Over the following five generations it was vegetatively propagated and found to be uniform and stable until released in 1996. Selection criteria: plant growth habit and flower colour. Propagation: asexually via cuttings. Breeder: Henry Head, Norfolk, United Kingdom.

Choice of Comparators The grouping characteristics used to identify the most similar varieties of common knowledge were – Plant: growth habit bushy, Corolla: colour purple group. On these bases 'Hidcote Pink' and 'Rosea' were chosen as comparators. 'Loddon Pink', a variety of common knowledge, does not have as many flowering stems, the same foliage colour, or corolla colour, therefore it was excluded from the trial. The parental variety was excluded for reasons stated above.

Comparative Trial Location: Park Orchards, VIC, Autumn, winter and spring 2001. Conditions: trial conducted in the open, plants propagated from cuttings, rooted cuttings transferred to 50mm tubes and grown until planted into 140mm pots in Dec 2000. Pots filled with soilless, pine bark based mix and maintained with controlled release fertilisers. Appropriate pest and disease treatments were applied as required. Trial design: ten pots of each variety arranged in a completely randomised design. Measurements: from all trial plants. One sample per plant.

Prior Applications and Sales

Country	Year	Current Status	Name Applied
UK	1991	Granted	'Miss Katherine'
EU	1995	Granted	'Miss Katherine'

First sold in UK in Jul 1996.

Description: **Steven Eggleton**, Lilydale, VIC.

Table 32 *Lavandula* varieties

	'Miss Katherine'	*'Hidcote Pink'	*'Rosea'
PLANT: GROWTH HABIT			
	medium	medium	narrow
	bushy	bushy	bushy
PLANT: INTENSITY OF GREEN COLOUR OF FOLIAGE			
	medium	medium	light
FLOWERING STEM: NUMBER			
mean	59.1	35.2	17.4
std deviation	8.3	5.6	4.3
LSD/sig	6.6	P≤0.01	P≤0.01
FLOWERING STEM: LATERAL BRANCHES (ABOVE FOLIAGE)			
	present	present	absent
FLOWERING STEM: NUMBER OF LATERAL BRANCHES (ABOVE FOLIAGE)			
	many	few	n/a
SPIKE: DISTANCE BETWEEN 2ND AND 3RD WHORLS (cm)			
mean	1.1	1.4	1.7
std deviation	0.2	0.1	0.3
LSD/sig	0.3	ns	P≤0.01
COROLLA: COLOUR (RHS, 1995)			
	75B-C	69B-C	75C
COROLLA: INNER SIDE MARKINGS (RHS, 1995)			
	87C	absent	absent

Lolium multiflorum
Italian Ryegrass

'Tabu'

Application No: 1999/031 Accepted 3 Feb 1999.
Applicant: **Agriseeds Research Limited,** Christchurch, New Zealand.

Characteristics (Table 33) Ploidy: diploid. Plant: growth habit in early spring: medium (score 5.5). Stem: length of longest stem intermediate (average 1100mm). Leaf: colour medium green. Flag leaf: length long (average 212mm), width broad (average 10.47mm). Inflorescence: number of spikelets per spike many (average 34.7), spikelet length long (average 18.43mm), glume length long (average 8.91mm), awn length long (average 5.98mm). Time of heading: medium (average 63.6 days).

Origin and Breeding Mass selection: from 18-month old trial plots of 'Flanker'Φ in Canterbury, New Zealand. 'Tabu' is distinct from the parental variety in heading date (2 days earlier), glume length (longer), and spikelets/spike (less). Selection criteria: winter growth, persistence. Propagation: 'Tabu' is maintained by open pollination through four generations. It will be commercially propagated by seed. Breeder: Agriseeds Research Ltd, Christchurch, New Zealand.

Choice of Comparators The grouping characteristic used in identifying the most similar varieties of common knowledge was – Ploidy: diploid. On the basis of this grouping characteristic, short-rotation ryegrasses, 'Marbella', 'Mariner'Φ, 'Concord', 'Conker', 'Conquest', 'Cordura'Φ, 'Crusader', 'Corvette', 'Exalta', 'Flanker'Φ, 'Progrow' were considered as comparators, as they are the similar varieties of common knowledge. 'Flanker'Φ is also the parental variety. Westerwolds annual ryegrasses were considered distinct as they flower without cold treatment (vernalisation), this was checked in the glasshouse for varieties 'Noble'Φ, 'Tetila', 'Aristocrat', 'Ribeye', 'Eclipse'Φ, 'Dargo'Φ, 'Dargle', therefore, were excluded.

Comparative Trial Location: trial conducted at Lincoln, New Zealand during 1999-2000. Conditions: plants raised in the glasshouse, autumn transplanted. Trial design: randomised block of 100 plants per variety. Measurements: from 60 plants taken at random.

Prior Applications and Sales

Country	Year	Current Status	Name Applied
New Zealand	1999	Applied	'Tabu'

First sold in New Zealand in Mar 2000.

Description: **F E Wilson**, New Zealand Agriseeds Limited, Christchurch, New Zealand.

Table 33 *Lolium* varieties

	'Tabu'	*'Marbella'	*'Mariner'Φ	*'Concord'	*'Conker'	*'Conquest'	*'Cordura'Φ	*'Crusader'	*'Corvette'	*'Exalta	*'Flanker'Φ	*'Progrow'
LEAF COLOUR (1 = very light green, 5 = medium green, 9 = very dark green)												
mean	5.0	5.0	4.9	4.8	4.9	4.5	5.1	5.2	4.7	5.0	4.9	5.0
FLAG LEAF LENGTH(mm)												
mean	212	200	190	208	205	202	168	208	206	210	190	197
std deviation	50.51	44.34	46.14	40.61	39.75	44.81	42.78	42.64	50.43	53.16	45.22	46.72
LSD/sig	19.4	ns	P≤0.01	ns	ns	ns	P≤0.01	ns	ns	ns	P≤0.01	ns
FLAG LEAF WIDTH (mm)												
mean	10.47	7.67	8.73	9.51	9.89	9.74	9.53	8.50	10.03	8.84	9.85	9.26
std deviation	1.60	1.37	1.56	1.49	1.94	1.72	1.72	1.48	1.58	1.60	1.97	1.68
LSD/sig	0.73	P≤0.01	P≤0.01	P≤0.01	ns	ns	P≤0.01	P≤0.01	ns	P≤0.01	ns	P≤0.01
STEM LENGTH (mm)												
mean	1100	1009	1111	1113	1085	1122	1044	1056	1176	1080	1096	1072
std deviation	97.70	104.40	105.50	101.40	102.80	114.10	101.20	112.90	110.40	114.40	85.70	103.30
LSD/sig	54.8	ns	ns	ns	ns	ns	ns	ns	P≤0.01	ns	ns	ns
DAYS TO HEADING												
mean	63.6	62.3	69.5	68.2	68.8	67.2	64.8	62.0	68.0	62.2	65.9	63.9
std deviation	3.59	3.97	5.48	5.19	5.01	4.67	5.22	4.66	4.72	3.73	4.05	4.12
LSD/sig	1.88	ns	P≤0.01	P≤0.01	P≤0.01	P≤0.01	ns	ns	P≤0.01	ns	P≤0.01	ns
SPIKELET LENGTH(mm)												
mean	18.43	16.56	17.49	18.81	18.79	18.35	19.03	18.78	20.04	20.96	18.16	21.50
std deviation	2.92	2.45	2.11	2.32	2.61	2.38	2.31	2.51	2.76	3.01	2.25	2.82
LSD/sig	1.08	P<0.01	ns	ns	ns	ns	ns	ns	P≤0.01	P≤0.01	ns	P≤0.01
SPIKELETS NUMBER/SPIKE												
mean	34.7	33.4	35.0	35.3	34,0	36.2	33.6	32.2	35.6	32.9	37.4	33.7
std deviation	4.13	3.96	4.65	4.22	5.35	5.29	5.18	4.94	4.50	4.62	4.27	4.83
LSD/sig	1.84	ns	ns	ns	ns	ns	ns	P≤0.01	ns	P≤0.01	P≤0.01	ns
GLUME LENGTH (mm)												
mean	8.91	7.93	8.51	9.09	8.47	9.00	9.90	8.51	9.10	8.85	8.02	9.81
std deviation	1.85	1.43	1.47	1.64	1.64	1.93	1.59	1.41	1.63	1.74	1.49	1.99
LSD/sig	0.71	P≤0.01	ns	ns	ns	ns	P≤0.01	ns	ns	ns	P≤0.01	P≤0.01
AWN LENGTH (mm)												
mean	5.98	5.07	5.78	5.57	5.22	5.65	5.10	5.57	6.10	5.07	6.10	5.50
std deviation	2.19	1.68	1.85	1.77	1.78	1.91	1.85	1.92	2.11	1.93	1.64	1.98
LSD/sig	0.83	P≤0.01	ns	ns	ns	ns	P≤0.01	ns	ns	P≤0.01	ns	ns

Mandevilla x*amabilis*
Mandevilla

'Radiance'

Application No 2001/226, Accepted: 17 Sep 2001.
Applicant: **Rybay Pty Ltd trading as Sunset Nursery,** Silverdale, NSW.

Characteristics (Table 34 and Figure 15) Plant: growth habit vine, twining ability strong, persistence of leaves evergreen. Leaf: shape ovate-oblong, mean length 192.8mm, mean width 97.1mm, mean length to width ratio 1.99:1, colour of adaxial surface of mature leaves dark green (RHS 139A), colour of abaxial surface green (RHS 137C), arrangement on stem opposite, margin entire, hairiness low. Flower: type single, arrangement axillary raceme, mean diameter 130.8mm, number of petals 5. Petal: primary colour (just opened new petals) red-purple (RHS 62B), secondary colour (mature) red-purple (RHS 69A). Floral tube: colour red-purple (RHS 62A) (Notes: RHS colour chart number refers to 1995 edition.)

Origin and Breeding Open pollination followed by seedling selection: from 'Alice du Pont' grown at Sunset Nursery in Silverdale, NSW. The seedling was selected due to its larger flower size and pale colour compared to the parent 'Alice du Pont'. It was vegetatively propagated through several generations and was found to be stable and distinct from the parent. Selection criteria: flower size, flower colour, throat colour and vigour. Propagation: vegetatively propagated using cuttings. Breeder: Joe D' Aquino, Silverdale NSW.

Choice of Comparators The grouping characteristic used in identifying the most similar varieties of common knowledge was – Petal: main colour red-purple. On the basis of this grouping characteristic 'Beauty Queen'ϕ and 'Magic Dream'ϕ were selected as the comparators. 'White Fantasy' was initially considered but later rejected due to differences in flower colour, and size and leaf colour and size. The seed parent 'Alice du Pont' was not included because of its pink (RHS 73B) petal colour. No other similar varieties of common knowledge have been identified.

Comparative Trials Location: Sunset Nursery, Eltons Road, Silverdale NSW 2001-2002. Conditions: trial conducted poly house, plants propagated from cuttings and grown in 200mm pots with soilless media (peat, ash and bark based), nutrition maintained with controlled release fertilisers, pest and disease control as required. Trial design: 15 pots of each variety arranged in a completely randomised design. Measurements: from 10 plants at random.

Prior Applications and Sales Nil.

Description **Peter Abell**, Cobbitty, NSW.

Table 34 *Mandevilla* varieties

	'Radiance'	*'Magic Dream'ϕ	*'Beauty Queen'ϕ
LEAF: LENGTH (mm)			
mean	192.8	166.6	165.6
std deviation	17.87	9.17	14.84
LSD/sig	17.80	P≤0.01	P≤0.01
LEAF: WIDTH (mm)			
mean	97.10	108.5	104.3
std deviation	4.56	4.33	6.25
LSD/sig	6.34	P≤0.01	P≤0.01
LEAF: LENGTH: WIDTH RATIO			
mean	1.99	1.54	1.59
std deviation	0.17	0.09	0.14
LSD/sig	0.17	P≤0.01	P≤0.01
FLOWER: DIAMETER (mm)			
mean	130.83	106.25	104.33
std deviation	3.51	5.15	5.91
LSD/sig	5.51	P≤0.01	P≤0.01
FLOWER: MAIN COLOUR OF NEW PETALS (RHS, 1995)	62B	65A	62C
FLOWER: ADAXIAL PETAL COLOUR (MATURE) (RHS, 1995)	69A	69C	69D
FLOWER: PETAL/TUBE COLOUR (RHS, 1995)	62B	64D	62D

'Rita Marie Green' syn **Parfait Passion Pink**

Application No: 2002/005 Accepted: 4 Mar 2002.
Applicant: **Monrovia Nursery Company**, Azusa, CA, USA.
Agent: **Redlands Nursery Pty Ltd,** Redland Bay, QLD.

Characteristics (Table 35 and Figure 14) Plant: growth habit vine, twining ability strong, persistence of leaves evergreen. Leaf: shape elliptic, colour of adaxial surface of new leaves green (RHS 137A), colour of adaxial surface of mature leaves dark green (RHS 138A), colour of abaxial surface yellow-green (RHS 146B), arrangement on stem opposite, margin entire, hairiness medium. Flower: type double, arrangement axillary raceme, width mean 10.75cm, number of petals 5. Petal: length mean 4.5cm, width mean 4.5cm, main colour (new petals) pink (RHS 55B), abaxial petal main colour pink (RHS 62A-D), abaxial petal secondary colour red-purple (RHS 57A-C), abaxial petal tertiary colour white (RHS 155D). Petaloid: present, number 5, main colour red-purple (RHS 57A-C), secondary colour white striations (RHS 155A-B), tertiary colour yellow (RHS 2A). Style: present, unexposed, length mean 9.5cm. Stamens: absent (modified into petaloid). (Notes: RHS colour chart number refers to 1995 edition.)

Origin and Breeding Spontaneous mutation: from 'Alice du Pont' in California, USA. The sport was found to be double flower form when compared with parental variety 'Alice du Pont' which is single form. It was vegetatively

propagated through several generations and was found to be stable and distinct from the parent. Selection criteria: flower form double. Propagation: vegetatively propagated through cuttings. Breeders: James Mitchell Green, Cecil Michael Green and Rita Marie Green, Haines City, California, USA.

Choice of Comparators The grouping characteristic used in identifying the comparator was – Petal: main colour pink. On the basis of this grouping characteristic 'Alice du Pont' was chosen as the comparator. The comparator is the parental variety and has some similarities with the candidate. The candidate mainly differs from the parental variety by having double flowers. No other similar varieties of common knowledge have been identified.

Comparative Trials Location: Redland Bay, QLD, 2001 to 2002. Conditions: trial conducted in full sun, plants propagated from cuttings and potted into 140mm pots with soilless media (peat and bark based), nutrition maintained with controlled release fertilisers, pest and disease control as required. Trial design: 15 pots of each variety arranged in a completely randomised design. Measurements: from 10 plants at random.

Prior Applications and Sales

Country	Year	Status	Name Applied
USA	1998	Granted	'Rita Marie Green'

No prior sale.

Description: **Deo Singh**, Ornatec Pty Ltd, QLD.

Table 35 *Mandevilla* varieties

	'Rita Marie Green'	*'Alice du Pont'
FLOWER: TYPE	double	single
FLOWER: LENGTH (mm)		
mean	87.5	101
std deviation	4.30	4.87
LSD/sig	5.22	P≤0.01
FLOWER: WIDTH (mm)		
mean	104	124.5
std deviation	8.09	7.61
LSD/sig	8.92	P≤0.01
FLOWER: LENGTH OF PETALS (mm)		
mean	47.8	53.9
std deviation	3.19	4.20
LSD/sig	4.23	P≤0.01
FLOWER: WIDTH OF PETALS (mm)		
mean	45.7	49.9
std deviation	3.09	4.45
LSD/sig	4.35	ns
PETALOID: PRESENT/ABSENT	present	absent
PETALOID: NUMBER	5	nil
PETALOID: MAIN COLOUR (RHS, 1995)	57A-C	none
PETALOID SECONDARY COLOUR (RHS, 1995)	striations of 155A-B	none
PETALOID THIRD COLOUR (RHS, 1995)	2A	none
STAMENS: PRESENCE/ABSENT	absent (modified into petaloids)	present

Paulownia fortunei Paulownia

'EFF No. 1'

Application No: 1999/070 Accepted: 26 Mar 1999.
Applicant: **EFF Pty Ltd,** West Perth, WA.

Characteristics (Table 36, Figure 19) Plant: growth rate fast, persistence of leaves deciduous. Bark (juvenile phase): surface lenticellate, texture hirsute. Bark (adult phase): texture smooth, vertical cracks present. Tree: shape in natural state terete. Leaf (juvenile phase): size large, shape round, frequency sparse, arrangement opposite, surface attitude raised between veins, texture hirsute, colour of upper side yellow-green (RHS 147A), colour of lower side yellow-green (RHS 148A), lobes present, number of lobes three, size of lobes very small. Leaf (adult phase): size medium, texture hirsute, lobes present, number of lobes three, size of lobes medium. Petiole: length long, texture hirsute. Inflorescence: number few, type axillary cyme. Cymes: number seven to ten, arrangement opposite, texture hirsute. Peduncle: length short, texture hirsute. Flower: number per cyme two to five. Corolla: size large, lips present, number of lips two, lobes present, number of lobes two on the upper lip and three on the lower lip, shape elongated, undulation of margin medium, attitude of tube forward curving, shape of tube slightly flattened trumpet, colour violet-blue (RHS 90C) at bud stage fading to RHS 91B after opening, internal markings present, number of internal markings two, stripes present, number of stripes two, width of stripes wide, location of stripes running the length of the corolla ending at the joins of the lower lobes, colour of stripes yellow (RHS 3D), spots present, intensity of spots weak, location of spots between the yellow stripes and also on the inside of the upper lip of corolla, colour of spots dark purple. Calyx: texture fleshy, surface densely hirsute, lobes present, number of lobes five, length compared to tube shorter. Capsules: structure bi-valve, length 60 to 70 mm, width 20 to 25 mm, shape ovate, beak present, length of beak short. Seeds: number of seeds numerous, size very small, wings present. (Note: all RHS colour chart numbers refer to 1995 edition.)

Origin and Breeding Open pollination followed by seedling selection: a single seedling selection from approximately 10,000 open pollinated seedlings of *Paulownia fortunei* germinated in 1997. The seedling was distinguished by its rapid growth rate compared to the parental form. Selection criteria: it was selected for its faster

growth rate, larger trunk diameter and taller plant height. Propagation: by cloning, since initial selection the clones of the variety have been stable for increased growth rates and morphological characteristics. The variety will be commercially propagated by cloning from the stock plants. Breeder: Environmental Forest farms, West Perth, WA.

Choice of Comparators 'Octagenia' is the only other variety of common knowledge in existence at the time of the lodgement of this application. It has some similarity in flower size and colour to the candidate. Mature trees of 'Octagenia' were available for comparison of flower characteristics. An unnamed form of *P. fortunei* was also chosen as a comparator because it is a selected from and represents the same seed source as the candidate. The source material represents the natural form of the species. Both mature and juvenile trees of *P. fortunei* were available for comparing vegetative and flower characteristics. No other similar varieties of common knowledge have been identified. *P. tomentosa* was initially considered but later excluded because it is entirely a different species.

Comparative Trial Location: (juvenile trees) Nowergup, WA, (mature trees) Nowergup and Gingin, WA, Jan 2001 to Feb 2002. Conditions: trial conducted in open split rows 3m apart and 3m between rows. Soil: deep coastal sand over limestone, pH 5.5 in $CaCl_2$ at 0 to 10cm. Plant propagation, juvenile trees cloned Sep 1998, planted Aug/Sep 1999, trees coppiced Jul 2000. Mature trees 5 to 7 years old from seed ('Octagenia' propagation by cloning). Juvenile trees have received the same treatment i.e. irrigation, fertiliser, pest and disease control since planting. Trial design: two split rows containing 80 immature trees as described above, forming two replicates. Measurements: taken from ten specimens taken at random from each replicate. One sample taken per plant.

Prior Applications and Sales Nil.

Description: **David Collins,** David Collins Consulting, Northam, WA

Table 36 *Paulownia* varieties

	'EFF No. 1'	***P. fortunei***	***'Octagenia'**
JUVENILE TREE			
LEAF: WIDTH (mm) at 10th node (16/03/01)			
mean	510	383.25	n/a
std deviation	42.75	61.54	n/a
LSD/sig	41.39	P≤0.01	n/a
LEAF: LENGTH (mm) at 10th node (16/03/01)			
mean	514.75	379	n/a
std deviation	46.6	49.86	n/a
LSD/sig	37.31	P≤0.01	n/a
PETIOLE: LENGTH (mm) at 10th node (16/03/01)			
mean	401.85	274.85	n/a
std deviation	22.18	39.88	n/a
LSD/sig	25.07	P≤0.01	n/a
PETIOLE: WIDTH OF BASE (mm) at 10th node (16/03/01)			
mean	18.14	11.97	n/a
std deviation	1.92	1.73	n/a
LSD/sig	3.06	P≤0.01	n/a
TRUNK: DIAMETER (mm) at 1 meter (06/02/01)			
mean	47.2	28.75	n/a
std deviation	8.69	8.54	n/a
LSD/sig	6.12	P≤0.01	n/a
PLANT: HEIGHT (mm) (06/02/01)			
mean	3770	2612	n/a
std deviation	404.44	258.71	n/a
LSD/sig	260.09	P≤0.01	n/a
MATURE TREE			
FLOWER: LENGTH (mm) (corolla and lobe)			
mean	76.19	87.64	79.06
std deviation	3.39	2.77	2.17
LSD/sig	3.59	P≤0.01	ns
FLOWER: LENGTH OF CENTRAL LOBE (mm)			
mean	26.44	21.44	24.44
std deviation	1.72	1.66	1.43
LSD/sig	2.84	P≤0.01	ns
FLOWER: CHARACTERISTICS			
internal stripes: width	wide	wide	narrow
internal stripes: definition	distinct	indistinct	distinct
internal spotting: size	medium	large	small
internal spotting: intensity	weak	weak	strong
lobe margin	moderately wavy	slightly wavy	slightly wavy
corolla: ground colour	violet blue	cream	violet blue

Note: No juvenile trees of 'Octagenia' were available for vegetative measurements.

Prunus armeniaca
Apricot

'Rivergem'

Application No: 1998/048 Accepted: 20 May 1998.
Applicant: **Minister for Agriculture, Food and Fisheries** and **Dried Fruits R&D Council,**
c/- SARDI, Adelaide, SA.

Characteristics (Table 37, Figure 36) Tree: size medium, vigour medium, habit spreading to drooping, predominant distribution of flower buds on spurs and one year old shoots, bearing regular. Trunk: size medium, texture medium. Young shoot: anthocyanin colouration of tip (shoot 10-15cm long) strong. One-year old shoot: number of lenticels medium, prominence of lenticels medium, size of wood bud support medium, feathering medium. Flowering shoot: ratio of number of flowering buds/number leaf buds low. Leaf: ratio of length of petiole/length of blade medium, autumn colour (just before falling of leaves) yellowish green, season of leaf fall medium. Leaf blade: length/breadth ratio medium, size medium, green colour of upper side light, shape of base sub-cordate, shape of tip cuspidate, angle of tip broad acute, incisions on margin bi-crenate, undulation of margin slight, angle of cross section (on spurs or at the base of flowering shoots) right or almost right. Petiole: length medium, thickness medium, anthocyanin colouration of upper side medium, anthocyanin colouration of lower

side medium, predominant number of glands two to three, size of glands medium. Flower: size medium, time of beginning of flowering (when tree presents some fully open flowers) medium. Fruit: size medium, shape in profile view trapezoidal, shape in frontal view triangular, ratio of thickness/breadth low, ratio height/breadth broader than high, symmetry along the suture predominantly symmetric, depth of suture shallow, depth of pedicel cavity shallow, shape of tip flat, mucron absent, surface smooth, ground colour of skin light orange, intensity of anthocyanin colouration of skin medium, extent of anthocyanin colouration of skin medium, distribution of anthocyanin colouration of skin solid flash, colour of flesh light orange, texture of flesh fine, firmness of flesh firm, percentage stone (by weight) low, adherence of stone to flesh absent, degree of adherence of stone to flesh absent, time of maturity early. Stone: shape oblong, bitterness of dried kernel present, degree of bitterness of dried kernel medium. Time of maturity: early. Season of leaf fall: medium.

Origin and Breeding Controlled pollination: F_1 between seed parent 'Trevatt' x pollen parent breeder's code "679" in a planned breeding program in Loxton, SA. Seed parent is characterised by heavy cropping habit, early ripening, free stone, pale apricot-lemon skin colour, medium fruit size with low to medium total soluble solids (TSS) levels. Pollen parent is characterised by high TSS levels, mid season ripening, small to medium fruit size, pale yellow colour with slightly adherent stones. "679" is an open pollinated seedling arising from seed collected in Syria in 1995 by Frank Gathercole. Selection criteria: high total soluble solids, firmness, size, and suitability for drying. Propagation: clonally by budding and grafting to suitable industry standard rootstocks. After each propagation the variety has been true to type and stable. Breeder: Frank Gathercole and Jennifer Witherspoon, Loxton , SA.

Choice of Comparators The grouping characteristics used in identifying the most similar varieties of common knowledge were – Time of maturity: early. On this basis, 'Trevatt' and 'Story' were selected as the comparators because of their similar maturity timing to the candidate variety. 'Trevatt' is also the seed parent of the candidate variety. A third comparator 'Hasanbey' was also included in the comparative trial for its close resemblance and origins to the pollen parent. The major differences the candidate displays to the comparators are increased flesh firmness, higher TSS levels and oblong pointed stone shape.

Comparative Trial Location: Loxton, SA, (Longitude 140º 39.8′ East, Latitude 34º 28.6′ South) June 1998 – Feb 2002. Conditions: budded on to mature peach rootstocks, grown under normal orchard conditions with fertiliser, pest and disease treatments applied as required. Trial design: six replicates of the candidate and the comparators arranged in a randomised design at a distance of 1.25m apart. Measurements: from all trial plants.

Prior Applications and Sales
No prior applications. First Australian sale Jul 1999.

Description: **Jenny Witherspoon,** Wesfarmers Landmark, Adelaide, SA.

Table 37 *Prunus* varieties

	'Rivergem'	*'Story'	*'Trevatt'	*'Hasanbey'
TREE: VIGOUR	medium	medium	strong	weak
TREE: HABIT	drooping	open	upright	drooping
TREE: PREDOMINANT DISTRIBUTION OF FLOWER BUDS	on spurs and one year old shoots	on spurs and one year old shoots	on spurs and one year old shoots	one year old shoots
YOUNG SHOOT: ANTHOCYANIN COLOURATION OF TIP (shoot 10-15 cm long)	strong	medium	medium	strong
ONE-YEAR OLD SHOOT: SIZE OF WOOD BUD SUPPORT	medium	small	small	small
ONE-YEAR OLD SHOOT: FEATHERING	medium	slight	slight	medium
LEAF: RATIO LENGTH OF PETIOLE/LENGTH OF BLADE	medium	low	low	medium
LEAF BLADE: LENGTH/BREADTH RATIO	medium	medium	medium	high
LEAF BLADE: SIZE	medium	medium	small	large
LEAF BLADE: GREEN COLOUR OF UPPER SIDE	light	medium	light	light
LEAF BLADE: SHAPE OF BASE	sub-cordate	sub-cordate	sub-cordate	truncate
LEAF BLADE: SHAPE OF TIP	cuspidate	cuspidate	mucronate	acuminate
LEAF BLADE: ANGLE OF TIP	broad acute	obtuse	obtuse	broad acute
LEAF BLADE: INCISIONS ON MARGIN	bi-crenate	serrate	bi-serrate	bi-serrate
LEAF BLADE: ANGLE OF CROSS SECTION (on spurs or at the base of flowering shoots)	right or almost right	acute	acute	right or almost right
PETIOLE: ANTHOCYANIN COLOURATION OF UPPER SIDE	medium	medium	medium	strong
PETIOLE: ANTHOCYANIN COLOURATION OF LOWER SIDE	medium	absent	weak	strong

Table 37 continued

PETIOLE: PREDOMINANT NUMBER OF GLANDS				
	two to three	more than three	two to three	more than three
FRUIT: SIZE				
	medium	medium	medium	small
FRUIT: SHAPE IN PROFILE VIEW				
	trapezoidal	rounded	rectangular	triangular
FRUIT: SHAPE IN FRONTAL VIEW				
	triangular	trapezoidal	triangular	triangular
FRUIT: RATIO THICKNESS/BREADTH				
	low	medium	low	low
FRUIT: RATIO HEIGHT/BREADTH				
	broader than high	as broad as high	broader than high	higher than broad
FRUIT: DEPTH OF SUTURE				
	shallow	shallow	shallow	medium
FRUIT: DEPTH OF PEDICEL CAVITY				
	shallow	shallow	medium	shallow
FRUIT: SHAPE OF TIP				
	flat	rounded	flat	rounded
FRUIT: GROUND COLOUR OF SKIN				
	light orange	orange	light orange	cream to yellow
FRUIT: INTENSITY OF ANTHOCYANIN COLOURATION OF SKIN				
	medium	medium	weak	weak
FRUIT: EXTENT OF ANTHOCYANIN COLOURATION OF SKIN				
	medium	medium	small	small
FRUIT: DISTRIBUTION OF ANTHOCYANIN COLOURATION OF SKIN				
	solid flash	solid flash	isolated flecks	isolated flecks
FRUIT: COLOUR OF FLESH				
	light orange	light orange	light orange	cream
FRUIT: TEXTURE OF FLESH				
	fine	medium	medium	fine
FRUIT: FIRMNESS OF FLESH				
	firm	soft	medium	firm
FRUIT: PERCENTAGE OF STONE (by weight)				
	low	low	low	medium
FRUIT: ADHERENCE OF STONE TO FLESH				
	absent	absent	absent	present
FRUIT: DEGREE OF ADHERENCE OF STONE TO FLESH				
	none	none	none	slight
STONE: SHAPE				
	oblong	round	round	elongate
TIME OF BEGINNING OF FLOWERING (when tree presents some fully opened flower)				
	medium	early	early	medium
TIME OF MATURITY				
	early	early	early	medium

Ptilotus obovatus
Ptilotus

‘Cobtus’

Application No: 1999/168 Accepted: 8 Mar 2000.
Applicant: **The University of Sydney,** Sydney, NSW.

Characteristics (Table 38, Figure 29) Ploidy: tetraploid. Plant: height very tall, attitude erect, density sparse, vigour very strong, degree of branching weak, type of branching full with central head. Stem: anthocyanin pigmentation absent, branch angle to main stem acute, lignification strong, pubescence present, internode spacing medium, colour greyed-green (RHS 192C). Leaf: length long, width medium, ratio length to width medium, colour of upper surface with hair removed green (ca RHS 137A), incision of margin absent, pubescence present, glossiness sparse, anthocyanin pigmentation absent, transverse section concave, longitudinal section convex, undulation of margin absent. Flower: diameter of individual fully opened 5-10mm, diameter of head 15-20mm, density of head dense, length 5-10mm, number of heads per primary branch high (>10), colour of perianth tip (closed) red-purple (RHS 73A/62B), habit twice flowering, degree of individual opening medium, fragrance absent, staminodes present, number of staminodes two. Inflorescence: attitude erect, position above foliage. (Note: all RHS colour chart numbers refer to 2001 edition.)

Origin and Breeding Seedling selection: ‘Cobtus’ is a selection made from around 600 plants grown from commercial seed sown during 1994. Selection criteria: it was originally selected during 1995 for its very long stems and great vigour compared to all other forms of *P. obovatus*. Growing trials confirmed the vigour of this variety and its suitability to cut flower production based on habit, vase life and stem yield. Propagation: it has been propagated by cuttings and through more than ten generations has shown no variation. Breeder: Mr. P G Abell, University of Sydney, Plant Breeding Institute, Cobbitty, NSW.

Choice of Comparators *P. obovatus* is not widely cultivated being an unreliable plant under commercial production. There is only one type or form known to be growing commercially. This variety called ‘Kuranga’ in the trial is available from Kuranga Nursery in Melbourne. The original sibling materials all differed considerably in habit being more compact and divaricate as well as lacking the vigour of ‘Cobtus’.

Comparative Trial Location: Plant Breeding Institute, Cobbitty, NSW. Conditions: the trial was set up in containers in a glasshouse. Fourteen plants of each variety planted into 300mm squat pots and placed on a bench with

bottom up irrigation. By the end of the trial six of the comparators ('Kuranga') plants had died through the presence of a soilborne disease. None of the candidate died during the trial. Trial design: completely randomised to reduce possible variation across the trial. Measurements: from all available plants.

Prior Applications and Sales
No prior applications. First Australian sale Oct 1999.

Description **Peter Abell**, Cobbitty, NSW

Table 38 *Ptilotus* varieties

	'Cobtus'	*'Kuranga'
PLANT: HEIGHT	very tall	medium
PLANT: ATTITUDE	erect	broadly spreading
PLANT: DENSITY	sparse	dense
PLANT: VIGOUR	very strong	weak
STEM: DEGREE OF BRANCHING	weak	strong
STEM: BRANCH ANGLE	acute	weakly acute
STEM: DEGREE OF PUBESCENCE	weak	strong
STEM: COLOUR (RHS, 2001)	192C	192B
LEAF: LENGTH	long (50-75mm)	medium (25-50mm)
LEAF: LENGTH/WIDTH RATIO	medium (2-5)	low (<2)
LEAF: COLOUR OF LOWER SURFACE (with hair removed) (RHS, 2001)	137B	137A
LEAF: DEGREE OF PUBESCENCE	sparse	medium
LEAVES: LONGITUDINAL SECTION	convex	concave
FLOWER: DENSITY OF HEAD	dense	medium
FLOWER: NUMBER OF HEADS PER PRIMARY BRANCH	high (>10)	medium (5-10)
FLOWER: COLOUR OF PERIANTH TIP (closed) (RHS, 2001)	73A/62B	68A
FLOWER: HABIT	twice flowering	almost continuous
FLOWER: FRAGRANCE	absent	present, medium
FLOWER: POSITION OF INFLORESCENCE	above foliage	at foliage
FLOWER: NUMBER OF STAMINODES	two	five

Rhododendron hybrid
Rhododendron

'Tilly Aston'

Application No: 1999/056 Accepted: 29 Mar 1999.
Applicant: **Advanced Specialty Horticultural Company of Australia Pty Ltd,** Olinda, VIC.

Characteristics (Table 39, Figure 18) Plant: persistence of leaves evergreen, growth habit broad bushy. Terminal inflorescence: bud shape broad elliptic. Young leaf: anthocyanin colouration of upper side medium. Mature leaf: colour of upper side medium green (RHS 147A), colour of lower side light green, mean length including petiole 106.60mm, mean width 40.7mm, shape of blade elliptic, shape of cross section of blade concave, glossiness of upper side absent to very weak. Inflorescence: mean number of flowers approximately 16, shape slightly domed. Pedicel: mean length 32.92mm, colour on sunny side reddish green. Calyx: present, mean length of longest lobe 12.92mm. Flower: shape open funnel, mean diameter 95mm, fragrance absent or very weak, type single. Corolla lobe: undulation of margin medium, colour of margin of upper side red (RHS 50B), colour of middle of upper side red (RHS 41B), colour of middle of lower side red (RHS 50A), conspicuousness of markings of the throat weak, type of markings spots not touching each other, colour of markings red (RHS 44A). Anthers: colour brown. Pistil: length in comparison with stamens longer, colour of stigma purple. Time of beginning of flowering: medium to late. (All RHS colour chart numbers refer to 1986 edition.)

Origin and Breeding Controlled pollination: seed parent 'Apricot Gold' x pollen parent 'Lem's Cameo'. The seed parent is characterised by late flowering, small orange-red open funnel flowers carried in domed inflorescence. The pollen parent is characterised by medium flowering season, pink-red flowers with undulated margins carried in domed inflorescence. Hybridisation took place in Olinda, VIC in 1985. From this cross, 'Tilly Aston' was chosen on the basis of flower colour and flowering season. Selection criteria: time of beginning of flowering. Propagation: by cuttings. Breeder: Karel Van de Ven, Olinda ,VIC.

Choice of Comparators Grouping characteristics used in identifying the most similar varieties of common knowledge were – Corolla lobe: colour of margin of upper side red, colour of markings red. On the basis of these grouping characteristics 'Australian Sunset'Φ was included in the trial as a comparator. 'Australian Sunset'Φ is a sibling

of the candidate variety. Both parents were also included for the purpose of providing evidence of breeding.

Comparative Trial Location: Olinda, VIC, 1997-2001. Conditions: trial outdoors in nursery, plants propagated by cuttings, plants potted into 20cm pots, filled with soilless potting mix (pine bark base), nutrition maintained with controlled release fertilisers, pest and disease treatments applied as required. Trial design: 15 pots of each variety arranged in a completely randomised design. Measurements: from all 15 plants. One sample per plant.

Prior Applications and Sales
No Prior applications. First Australian sale 1 Oct 2001.

Description: **Paul Armitage,** Lilydale, VIC.

Table 39 *Rhododendron* varieties

	'Tilly Aston'	*'Australian Sunset'ϕ	*'Lem's Cameo'	*'Apricot Gold'
COROLLA LOBE: COLOUR OF MARGIN OF UPPER SIDE (RHS, 1986)	red 50B	red 46B	red 51C	red 38B
COROLLA LOBE: COLOUR OF MIDDLE OF UPPER SIDE (RHS, 1986)	red 41B	orange-red 32C	yellow 13D	orange 29B
COROLLA LOBE: COLOUR OF MIDDLE OF LOWER SIDE (RHS, 1986)	red 50A	red margins 46B, orange base 24D	red 51B	red 41B
COROLLA LOBE: COLOUR OF MARKINGS (RHS, 1986)	red 44A	red 53A	red 53A	red 45B
PISTIL: COLOUR OF STIGMA	purple	green	green	red

Rosa hybrid
Rose

'Intertrogol' syn **Sun City**

Application No: 2000/337 Accepted: 8 Dec 2000.
Applicant **Interplant B.V.,** Leersum, The Netherlands.
Agent: **Grandiflora Nurseries Pty Ltd,** Cranbourne, VIC.

Characteristics (Table 40, Figure 2) Plant: type cut flower, habit narrow bushy, height medium, width narrow to medium. Young shoot: anthocyanin colouration very weak to weak, hue of anthocyanin colouration bronze to reddish brown. Prickles: present, shape of lower side concave, number of short prickles very few, number of long prickles medium. Leaf: size medium, green colour medium, glossiness of upper side medium. Leaflet: cross section flat, undulation of margin medium. Terminal leaflet: length of blade medium (70.7 – 94.5mm), width of blade medium (35.1 – 55.2mm), shape of base obtuse. Flowering shoot: number of flowers many. Flower pedicel: number of prickles few. Flower bud: shape of longitudinal section round. Flower type: double, number of petals medium (42 – 64), diameter small (49.6 – 59.4mm), view from above round to irregularly rounded, side view of upper part flat, side view of lower part flattened convex, fragrance weak. Sepal: extensions weak. Petal: size small, colour of middle zone of inner side yellow (RHS 7A), colour of marginal zone of inner side yellow (RHS 7C), spot at base of inner side absent, colour of middle zone of outer side yellow (RHS 12B), colour of marginal zone of outer side yellow (RHS 12B), spot at base of outer side absent, reflexing of margin weak, undulation of margin weak. Outer stamen: predominant colour of filament orange. Seed vessel: size medium. Hip: shape of longitudinal section pitcher-shaped. Flowering habit: remontant. (Note: All RHS colour chart numbers refer to 1995 edition.)

Origin and Breeding Controlled pollination: seed parent T568-92 x pollen parent 'Interfla'. The seed parent is characterised by yellow flowers. The pollen parent is characterised by yellow flowers on many flowering shoots. Hybridisation took place in Leersum, The Netherlands in 1995. From this cross, the seedling was chosen in 1996 on the basis of flower colour and multi-flowering stems suitable as a spray rose in greenhouse cut flower production. Selection criteria: flower colour, flowering shoot number, flowering habit. Propagation: a number mature stock plants were generated from this seedling through cutting, grafting and budding and were found to be uniform and stable. 'Intertrogol' will be commercially propagated by vegetative cuttings, and budded from the stock plants. Breeder: Interplant B.V., Leersum, The Netherlands

Choice of Comparators Grouping characteristics used in identifying the most similar varieties of common knowledge were – Plant: narrow bushy to bushy, type cut flower. Flowering shoot: number of flowers many. Flower: diameter small to medium, colour yellow. On the basis of these grouping characteristics the following comparator varieties were included in the trial: 'Interlis' syn Lydia, due to flowering shoot number, flower diameter, and similarity in plant characteristics. 'Korflapei', due to flower diameter, and flower colour. The parents were not used for reasons stated above.

Comparative Trial Location: Clyde, VIC (Latitude 38º09′ South, Elevation 16m), summer 2001-2002, measurements taken mid Jan 2002. Conditions: trial conducted in an unheated double skinned polyhouse, with a UVB screening film, specifically formulated for rose production plants propagated from cutting, rooted cuttings planted into 210mm (1 plant per pot) pots filled with scoria. Nutrition maintained as part of a commercial hydroponic system for cut rose plants, pest and disease treatments applied as required. Trial design: eight 210mm pots of each variety on benches in small sub sections of a double row. Measurements: from all plants at random. One sample per plant stem.

Prior Applications and Sales

Country	Year	Current Status	Name Applied
The Netherlands	1998	Granted	'Intertrogol'
Germany	1999	Granted	'Intertrogol'

EU	2000	Granted	'Intertrogol'
Canada	2000	Applied	'Intertrogol'

First sold in The Netherlands in Mar 1999. First Australian sale Dec 2001.

Description: **Christopher Prescott,** Prescott Roses Pty Ltd, Clyde, VIC

Table 40 *Rosa* varieties

	'Intertrogol' syn **Sun City**	***'Korflapei'** syn **Frisco**	***'Interlis'** syn **Lydia**
PLANT: GROWTH HABIT (1 = narrow bushy, 9 = creeping) (excluding climbing varieties)	1	3	1
YOUNG SHOOT: ANTHOCYANIN COLOURATION (1 = absent, 9 = very strong) (shoot about 20cm long)	2	5	2
YOUNG SHOOT: HUE OF ANTHOCYANIN COLOURATION	bronze to reddish brown	reddish brown	bronze to reddish brown
SHORT PRICKLES: NUMBER (1 = absent or very few, 9 = very many)	1	3	5
LONG PRICKLES: number (1 = absent or very few, 9 = very many)	5	3	3
LEAF SIZE (1 = very small, 9 = very large)	7	7	5
LEAF: GLOSSINESS OF UPPER SIDE (1 = absent or very weak, 9 = very strong)	5	3	3
LEAFLET: CROSS SECTION (1 = concave, 9 = convex)	5	3	5
LEAFLET: UNDULATION OF MARGIN CROSS SECTION (1 = absent, 9 = very strong)	5	1	3
TERMINAL LEAFLET: LENGTH OF BLADE (mm)			
mean	84.44	72.7	71.4
std deviation	9.15	6.18	9.60
LSD/sig	7.589	P≤0.01	P≤0.01
TERMINAL LEAFLET: SHAPE OF BASE	obtuse	rounded	rounded
FLOWERING SHOOT: NUMBER OF FLOWERS (1 = very few, 9 = very many)	5	3	3
FLOWER PEDICEL: NUMBER OF HAIRS OR PRICKLES	few	few	medium
FLOWER BUD: SHAPE OF LONGITUDINAL SECTION	round	ovate	round
FLOWER: NUMBER OF PETALS			
mean	55.0	32.7	33.3
std deviation	6.99	4.24	6.03
LSD/sig	5.13	P≤0.01	P≤0.01
FLOWER: DIAMETER (mm)			
mean	56.31	96.67	47.36
std deviation	2.93	6.11	2.67
LSD/sig	8.55	P≤0.01	P≤0.01
FLOWER: SIDE VIEW OF UPPER PART	flat	flattened convex	flat
FLOWER: SIDE VIEW OF LOWER PART	flattened convex	flat	flattened convex
SEPAL: EXTENSIONS (1 = very small, 9 = very strong)	3	7	3
PETAL: SIZE (1 = very small, 9 = very large)	3	5	3
PETAL: COLOUR (RHS, 1995)			
inner side:			
middle zone	7A	6C	55D
marginal zone	7C	4C	55D
outer side:			
middle zone	12B	7C	55D
marginal zone	12B	5D	55D
PETAL: SPOT AT BASE OF (1 = absent, 9 = present)			
inner side	1	9	9
outer side	1	1	9
PETAL: REFLEXING OF MARGIN (1 = absent or very weak, 9 = very strong)	3	7	3
OUTER STAMEN: PREDOMINANT COLOUR OF FILAMENT	orange	yellow	orange
SEED VESSEL: SIZE (at petal fall) (1 = very small, 9 = very large)	5	3	3
HIP: SHAPE OF LONGITUDINAL SECTION	pitcher-shaped	funnel-shaped	pitcher-shaped

'Ruiroskee' syn **Sweet Unique**

Application No: 2000/204 Accepted: 19 Jul 2000.
Applicant: **De Ruiter's Nieuwe Rozen B.V.,** De Kwakel, The Netherlands.
Agent: **Grandiflora Nurseries Pty Ltd,** Cranbourne, VIC.

Characteristics (Table 41, Figure 1) Plant: type cut flower, habit narrow bushy, height medium, width narrow. Young shoot: anthocyanin colouration strong, hue of anthocyanin colouration bronze to reddish brown. Prickles: present, shape of lower side concave, number of short prickles absent or very few, number of long prickles medium. Leaf:

size medium, green colour medium, glossiness of upper side absent or very weak. Leaflet: cross section slight concave, undulation of margin weak. Terminal leaflet: length of blade medium (64.4 – 87mm), width of blade medium (34.9 – 61.4mm), shape of base rounded. Flowering shoot: number of flowers few. Flower pedicel: number of prickles few. Flower bud: shape of longitudinal section broad ovate. Flower type: double, number of petals medium (34 – 29), diameter medium (89.2 – 109.1mm), view from above irregularly rounded, side view of upper part flattened convex, side view of lower part flat, fragrance weak. Sepal: extensions strong. Petal: size medium, colour of middle zone of inner side pink (RHS 65A-B), colour of marginal zone of inner side pink (RHS 66C), spot at base of inner side present; size small; colour greenish white (RHS 157C), colour of middle zone of outer side pink (RHS 57D), colour of marginal zone of outer side pink (RHS 57C), spot at base of outer side present; size small; colour greenish white (RHS 157B), reflexing of margin medium, undulation of margin medium. Outer stamen: predominant colour of filament yellow. Seed vessel: size small. Hip: shape of longitudinal section pitcher-shaped. Flowering habit: remontant. (Note: All RHS colour chart numbers refer to 1995 edition.)

Origin and Breeding Controlled pollination: seed parent 'unnamed seedling' x pollen parent 'unnamed seedling' in a planned breeding program. Both parents are non-commercial breeding stock plants within the breeding program. Hybridisation took place in Hazerswoude, The Netherlands in 1994. From this cross, the seedling was chosen in 1995 on the basis of flowering colour and yield. Selection criteria: high production yield in cut flower production in greenhouse conditions, bright pink blooms of sufficient petal number to ensure good vase life, reasonable disease resistance and remontant flowering. Propagation: a number mature stock plants were generated from this seedling through grafting, budding and cuttings and were found to be uniform and stable. 'Ruiroskee' will be commercially propagated by vegetative cuttings from the stock plants. Breeder: Mr A.A. Pouw, De Ruiter's Nieuwe Rozen B.V., De Kwakel, The Netherlands.

Choice of Comparators Grouping characteristics used in identifying the most similar varieties of common knowledge were – Plant: habit narrow bushy to bushy, hight medium, type cut flower. Flower: type double, diameter medium, colour medium pink. On the basis of these grouping characteristics the following comparator varieties were initially considered in the trial: 'Jacbri' syn Bridal Pink, 'Kormagoro' and 'Pretufo' syn Charon. 'Kormagoro' was later rejected due to it being more of a bi-colour, and 'Pretufo' was not included for its lighter leaf colour and large oval bud shape. The parents were not used for reasons stated above.

Comparative Trial Location: Clyde, VIC (Latitude 38º09′ South, Elevation 16m), summer 2001-2002, measurements taken mid Jan 2002. Conditions: trial conducted in a controlled environment double skinned polyhouse, with a UVB screening film, specifically formulated for rose production plants, and a shade covering of 70% shade, rooted cuttings planted into 210mm (1 plant per pot) pots filed with soilless potting mix (scoria), nutrition maintained as part of a commercial hydroponic system for cut rose plants, pest and disease treatments applied as required. Trial design: eight 210mm pots of both 'Ruiroskee' and 'Jacbri' in a completely randomised design. Measurements: from all plants at random. One sample per plant stem.

Prior Applications and Sales

Country	Year	Current Status	Name Applied
The Netherlands	1998	Granted	'Ruiroskee'
EU	1999	Granted	'Ruiroskee'
Ecuador	1999	Applied	'Ruiroskee'
Israel	2000	Applied	'Ruiroskee'

First sold in The Netherlands in Apr 1999. First Australian sale Aug 2001.

Description: **Christopher Prescott,** Prescott Roses Pty Ltd, Clyde, VIC.

Table 41 *Rosa* varieties

	'Ruiroskee' syn **Sweet Unique**	***'Jacbri'** syn **Bridal Pink**
PLANT: GROWTH HABIT (1 = narrow bushy, 9 = creeping)	1	3
PLANT: WIDTH	narrow	medium
YOUNG SHOOT: ANTHOCYANIN COLOURATION (1 = absent or very weak, 9 = very strong) (shoot about 20cm long)	7	3
YOUNG SHOOT: HUE OF ANTHOYANIN COLOURATION	bronze to reddish brown	reddish brown
SHORT PRICKLES: NUMBER (1 = absent or very few, 9 = very many)	1	3
LEAF: GLOSSINESS OF UPPER SIDE (1 = absent or very weak, 9 = very strong)	1	3
LEAFLET: CROSS SECTION (1 = concave, 9 = convex)	3	5
TERMINAL LEAFLET: SHAPE OF BASE	rounded	obtuse
FLOWERING SHOOT: NUMBER OF FLOWERS (1 = very few, 9 = very many)	3	1
FLOWER PEDICEL: NUMBER OF HAIRS OR PRICKLES	few	medium
FLOWER: NUMBER OF PETALS		
mean	36.40	59.10
std deviation	1.57	11.40
LSD/sig	10.27	P≤0.01
FLOWER: DIAMETER (mm)		
mean	96.87	110.92
std deviation	6.87	7.53
LSD/sig	9.1	P≤0.01

PETAL: COLOUR (RHS, 1995)		
inner side:		
middle zone	65A-B	62D
marginal zone	66C	62D
outer side:		
middle zone	57D	56C
marginal zone	57C	65B
PETAL: SIZE OF SPOT AT BASE OF INNER SIDE (1 = very small, 9 = very large)		
	3	1
PETAL: COLOUR OF SPOT AT BASE OF OUTER SIDE (RHS, 1995)		
	157B	155C
PETAL: REFLEXING OF MARGIN (1 = absent or very weak, 9 = very strong)		
	5	3
SEED VESSEL: SIZE (AT PETAL FALL) (1 = very small, 9 = very large)		
	3	5

Solanum rantonettii
Blue Potato Bush

'CATT 1'

Application No: 2001/059 Accepted: 5 Mar 2001.
Applicant: **D and M Catt Nurseries,** Annangrove, NSW.

Characteristics (Table 42, Figure 22) Plant: habit upright, degree of basal branching medium (longer branches occasionally spreading), height medium. Stem: length medium, shape pentagonal, colour yellow-green (RHS 146B) with rib colour greyed-orange (RHS 177D). Leaf: length medium (average 50.6mm), width medium (average 23.9mm), shape ovate, base attenuate, apex acute, margin entire, undulation absent to very weak, variegation present, marginal variegation colour yellow (RHS 11D), central mid-rib colour yellow-green (RHS 146A-B), mid leaf colour yellow-green (RHS 144A). Flower: diameter medium, number petals 5 fused, petal colour purple (RHS 77A), anther colour yellow-orange (RHS 17A). (Note: all RHS colour chart numbers refer to 1995 edition.)

Origin and Breeding Spontaneous mutation: from 'Royal Robe'. The parental variety is characterised by non-variegated leaves. A variegated mutant was selected from a stock plant in Annangrove, NSW. Selection took place in Annangrove, NSW in 1999 and uniformity and stability were confirmed through more than 10 generations propagated vegetatively by cuttings. Selection criteria: foliage variegation. Propagation: by vegetative cuttings. 'CATT 1' will be commercially propagated by vegetative cuttings from original stock plants. Breeder: Greg Catt, Annangrove, NSW.

Choice of Comparators The grouping characteristic used in identifying the most similar varieties of common knowledge were – Leaf: variegation present. Based on this grouping characteristic 'Golden Robe'(Φ) was selected as the most similar variety suitable as a comparator. The parent 'Royal Robe' was also included for the purpose of providing evidence of breeding. No other similar varieties of common knowledge have been identified.

Comparative Trial Location: Kincumber, NSW, spring – summer 2001. Conditions: plants were raised in a standard potting mixture in 140mm pots in open beds. Trial design: 12 plants of each variety arranged in a completely randomised design. Measurements: taken from 10 specimens at random, one sample per plant.

Prior Applications and Sales
First sold in Australia in 2002.

Description: **Ian Paananen,** Crop & Nursery Services, Central Coast, NSW.

Table 42 *Solanum* varieties

	'CATT 1'	*'Golden Robe'(Φ)	*'Royal Robe'
PLANT HEIGHT (cm) – tallest point on plant			
mean	64.3	28.9	94.6
std deviation	23.1	16.7	9.1
LSD/sig	19.7	P≤0.01	P≤0.01
GROWTH HABIT	upright	semi-upright	upright
DEGREE OF BASAL BRANCHING	medium	strong	weak
LEAF SHAPE:	ovate	ovate	elliptic
LEAF UNDULATION	absent to very weak	medium	very weak
LEAF VARIEGATION	present	present	absent
LEAF COLOUR (RHS 1995)			
margin	11D	11D (mature) 4D (new growth)	ca 137A
middle	144A	144A	ca 137A
central mid-rib	146 A-B	146 A-B	ca 137A

Trifolium pratense
Red Clover

'Sensation'

Application No: 2001/068 Accepted: 21 Mar 2001.
Applicant: **AgResearch Limited,** Palmerston North, New Zealand
Agent: **Denis McGrath**, AgResearch (Australia) Limited, Drumcondra, VIC.

Characteristics (Table 43, Figure 50) Ploidy: diploid. Plant: growth habit semi-erect, height medium-tall, width narrow, maturity medium-early. Stem: density medium-low, length medium-short (63.2cm), thickness thick (3.82mm), intensity of anthocyanin colouration medium, pubescence low, internode length long, number of internodes per stem medium (mean 9.8). Leaf: shape ovate, length medium (30.6mm), width medium-narrow (10.6mm), frequency of plants with white marks very high (90%), colour medium-

dark green. Time of flowering: early (42 days from 1st Nov). Flower: colour light purple 8% (RHS 75A-C), medium purple 76% (RHS 77C-D), dark purple 14% (RHS 77B) and 2% white flower. Seed: colour of coat multicoloured but mainly purple.

Origin and Breeding Polycross: 'Sensation' originated from selections within four Swiss red clover varieties screened in 1982. These were 'Renova', 'Monte Calme'. 'Leisi', and 'Changins'. These four varieties were identified as the most persistent in a large overseas germplasm screening trial. From this selection, 28 plants were placed in isolation and polycrossed to produce seed line F2210 in 1983-84. A variety of field trials followed this selection including spaced plant trials from which data were collected on seasonal productivity, flowering times, growth habit, disease resistance and uniformity. In 1988-89, a further selection was made and a polycross made in isolation conditions to produce seed line F2377. In 1990, a field plot trial was established and maintained for 3 years to assess this seed line for selected attributes against control material. It was then designated the code G40 and later named 'Sensation'. Selection criteria: persistence, seasonal productivity, early flowering and disease resistance. Propagation: seed. Breeder: Mr R Claydon, AgResearch Grasslands, Palmerston North. New Zealand.

Choice of Comparators The grouping characteristic used in the identifying the most similar varieties of common knowledge was – Ploidy: diploid. On this basis, 'Grasslands Hamua', 'Grasslands Colenso', 'Grasslands Turoa', 'Astred', 'Redwest', 'Redquin', 'Quinequeli', 'Renegade' and 'PAC 19' were included in the PBR trial as comparators. In a second trial, the parental varieties 'Renova', 'Monte Calme', 'Leisi, and 'Changins' were included to confirm differences achieved during the breeding program. It was confirmed that 'Sensation' significantly differs in flowering time (34 days) from the parental varieties 'Renova' (24 days), 'Monte Calme' (43.8 days) and 'Changins' (47.3 days). 'Sensation' also has significantly shorter stem length (58.7cm) compared to 'Leisi' (69.6cm) and 'Monte Calme' (71.9cm). 'Grasslands G27' was not included as it is a tetraploid variety.

Comparative Trial Comparators: Location: AgResearch Grasslands Research Centre, Palmerston North, New Zealand (Latitude 40º23′ South, elevation 33m), autumn-summer 2000-2002. Conditions: plants raised from seed sown on 22/3/00 (trial 1) and 15/3/01 (trial 2) in seed flats in controlled glasshouse conditions. Plants trimmed on 28/4/00 (trial 1) and 20/4/01 (trial 2) to enhance establishment and placed in the open for hardening. Plants transplanted into open field site on 8/7/00 (trial 1) and 8-11/6/01 (trial 2) at 60cm between plants and 120cm between plots. Trial design: randomised block 10 plots of 10 plants of each variety arranged in a completely randomised design in each block. Measurements: from all available plants.

Prior Applications and Sales

Country	Year	Current Status	Name Applied
New Zealand	2001	Applied	'Grasslands Sensation'

No prior sale.

Description: **Jeff E. Miller,** AgResearch Grasslands, Palmerston North, NZ.

Table 43 *Trifolium* varieties

	'Sensation'	*'G. Hamua'	*'G. Colenso'	*'G. Turoa'	*'Astred'	*'Redwest'	*'Redquin'	*'Quinqueli'	*'Renegade'	*'PAC19'
DAYS TO MEAN FLOWERING (Days from 1st flower on 1/11/2000)										
mean	42.0	46.2	46.0	74.5	42.7	34.5	49.0	53.6	34.7	61.9
std deviation	12.5	16.2	13.8	7.0	12.7	12.2	7.4	5.8	15.1	14.8
LSD/sig	4.9	ns	ns	P≤0.01	ns	P≤0.01	P≤0.01	P≤0.01	P≤0.01	P≤0.01
STEM LENGTH (cm)										
mean	63.2	66.6	60.7	79.0	80.7	56.6	72.5	95.5	64.5	75.5
std deviation	13.5	18.0	15.6	10.0	18.5	15.2	13.6	17.3	16.2	16.9
LSD/sig	6.5	ns	ns	P≤0.01	P≤0.01	P≤0.01	P≤0.01	P≤0.01	ns	P≤0.01
STEM THICKNESS (mm)										
mean	3.82	3.79	3.45	3.75	3.57	3.76	3.87	3.84	4.30	4.51
std deviation	0.56	0.60	0.40	0.45	0.49	0.62	0.57	0.45	0.69	0.70
LSD/sig	0.24	ns	P≤0.01	ns	P≤0.01	ns	ns	ns	P≤0.01	P≤0.01
NUMBER OF STEM INTERNODES (>0.5cm)										
mean	9.8	10.6	9.8	13.4	12.3	8.7	11.8	22.9	8.6	11.7
std deviation	2.4	2.9	2.4	2.0	2.8	2.4	2.1	2.9	2.6	2.8
LSD/sig	3.2	ns	ns	P≤0.01	ns	ns	ns	P≤0.01	P≤0.01	ns
LEAF LENGTH (mm) – Central terminal leaflet										
mean	30.6	31.2	28.2	24.3	28.5	32.0	34.7	30.9	36.2	31.6
std deviation	6.8	5.3	5.2	3.9	5.0	5.5	7.2	4.8	6.0	5.9
LSD/sig	2.5	ns	ns	P≤0.01	ns	ns	P≤0.01	ns	P≤0.01	ns
LEAF WIDTH (mm) – Central terminal leaflet										
mean	10.6	12.1	11.9	7.9	11.1	13.3	13.8	12.2	14.7	13.2

std deviation	2.7	2.7	2.8	1.8	2.6	3.0	3.3	3.8	3.1	3.0
LSD/sig	1.1	P≤0.01	P≤0.01	P≤0.01	ns	P≤0.01	P≤0.01	P≤0.01	P≤0.01	P≤0.01
PLANT GROWTH HABIT										
	semi-erect	interm-ediate	interm-ediate	semi-prostrate	semi-prostrate	interm-ediate	erect	semi-erect	erect	semi-erect
STEM DENSITY										
	medium -low	medium -high	medium -high	very high	medium -high	medium	medium -low	medium -low	low	low
STEM PUBESCENCE (4th internode)										
	low	medium -high	medium -low	medium -high	medium -high	medium	medium	low	high	low
PLANTS WITH LEAF MARKING (%)										
	90	92	88	94	94	100	97	87	93	94
FLOWER COLOUR PERCENTAGE										
Light purple (RHS 75A-C)										
	8	5	50	4.5	9.5	16	27	13	3	4
Medium purple (RHS 77 C-D)										
	76	83.5	46.0	77.5	73.5	72.0	62.5	80.0	59.0	79.0
Dark purple (RHS 77B)										
	14	11.5	3.0	18.0	17.0	11.0	8.5	7.0	38.0	17.0
Other	2 white	_	1 cream	_	_	1 white	2 white	_	_	_

Trifolium vesiculosum
Arrowleaf Clover

'Zulu II'

Application No: 2001/239 Accepted: 25 Sep 2001.
Applicant: **Seedco Australia Co-operative Ltd,** Hilton, SA.

Characteristics (Table 44, Figure 49) Seedling: habit semi-prostrate, height medium. Plant: habit semi-upright, height medium, maturity mid to late, life cycle annual. Stem: thickness medium (approx. diameter 12mm), structure solid (almost woody later, but with a hollow pithy core), hairiness absent (glabrous), colour green, anthocyanin colouration present, hue of anthocyanin colouration red. Petioles: hairiness absent (glabrous), colour green, anthocyanin colouration absent or very weak. Stipules: texture papery, type simple, length long, width narrow, margin single toothed, colour pale green, red-pigmented veins present. Leaf: size medium to large. Early vegetative leaves: shape obovate or ovate; margin entire or (in approximately 10% of plants) indented at distal end. Later vegetative and post flowering leaves: shape lanceolate, margins highly toothed. Leaf markings: present, clarity of markings prominent, colour white or green, shape V-shaped, position of markings central with point of V to distal end of leaflet, anthocyanin flecking absent or very weak. Peduncle: length medium, colour green, anthocyanin colouration absent or very weak. Flowering time: mid to late. Inflorescence: type terminal spike, size large, length medium (approx. 8cm), shape cylindrical, diameter small (2 to 3cm), arrangement of florets radial, number of florets per spike many (approx. 200), opening of floret progressing from the proximal to the distal end of the spike, duration of opening of florets three or four weeks. Floret: size medium. Calyx: colour white or pale green, teeth present, colour of teeth dark green, texture of tube papery. Corolla: size medium, type pea-type with pointed standard, colour at opening white then grading through pink to crimson before drying off to a light brown, retention of dehisced corolla at maturity present. Seed: size small, number per floret two or three, colour mostly tan, occasionally dark brown or yellow.

Origin and Breeding Recurrent phenotypic selection: derived from 3 cycles of recurrent phenotypic selection with open pollination between selections at each cycle. 27 plants were originally selected for plant vigour, yield and flowering time from field plots of the cultivar 'Zulu'. Half sib seed of these selections were then sown in field plots and re-selected over two cycles for the same characteristics. In each cycle, half sib seed of selected plants was bulked and re-sown for the subsequent cycle of selection. Breeders' seed of 'Zulu II' was derived from bulked half sib seed from the third selection cycle. The original selection plots were located at Roseworthy, SA and further trials were carried out at Flaxley and Struan, SA between 1995 and 1998. Selection criteria: maturity and seed yield. Propagation: seed. Breeder: Seedco Australia Cooperative Ltd, Hilton, SA.

Choice of Comparators The grouping characteristic used in identifying the most similar varieties of common knowledge was – Flowering time. On the basis of this grouping characteristic the parental variety 'Zulu' was chosen as the most similar variety. 'Cefalu' was also chosen as a comparator, as it an early flowering variety. 'Arrotas' was not considered because of its later flowering.

Comparative Trial Location: Currency Creek, or about 75km SSE of Adelaide, SA, between Jun – Dec 2001.

Conditions: trial plants were seeded and raised in Jiffy 7 pellets in a shade house, and then transplanted into the field at approximately 3 weeks of age in late Jun 2001. The soil was a moderately fertile, free draining sandy loam of approximately pH 6. Two spring irrigations of approximately 40mm rainfall equivalent were applied in Nov to allow plots to mature with minimum water stress. No chemical or fertiliser treatments were used and plots were hand weeded as required. Trial design: a randomised complete block with 4 replicates, each replicate comprised of 22 plants in 4 rows, with 20cm between plants and 50cm between rows. Measurements: from first 20 surviving plants in row, or from random plants or whole rows as indicated.

Prior Applications and Sales Nil.

Description: **Andrew W.H. Lake,** Pristine Forage Technologies, Daw Park, SA.

Table 44 *Trifolium* varieties

	'Zulu II'	***'Zulu'**	***'Cefalu'**
INDIVIDUALS WITH EARLY VEGETATIVE LEAVES WITH DISTAL INDENTATIONS			
	present	present	absent
PETIOLE LENGTH, VEGETATIVE LEAF (mm)			
mean	80.75	78.35	96.25
std deviation	3.20	5.92	9.60
LSD/sig	11.60	ns	P≤0.01
LEAF LENGTH, VEGETATIVE LEAF (mm)			
mean	19.63	18.10	26.05
std deviation	2.00	1.31	3.16
LSD/sig	4.22	ns	P≤0.01
DAYS TO FIRST FLOWER (days to opening of first floret for each plant from date of germination)			
mean	158.2	161.2	150.7
std deviation	1.32	0.47	1.69
LSD/sig	2.46	P≤0.01	P≤0.01

Note: leaf and petiole measurements are based on the youngest fully expanded trifoliate leaf from 5 random plants per replication collected on 16/9/01.

Triticum aestivum
Wheat

'Drysdale'

Application No: 2001/266 Accepted: 6 Nov 2001.
Applicant: **CSIRO** and **Grains Research and Development Corporation,** Canberra, ACT, and **AWB Limited**, Melbourne, VIC.

Characteristics (Table 45, Figure 46) Plant: growth habit erect, height short. Time of ear emergence: medium. Flag leaf: anthocyanin colouration of auricles weak, glaucosity of sheath medium, glaucosity of blade medium. Culm: glaucosity of neck medium. Straw: pith in cross section thin. Ear: glaucosity strong, shape in profile parallel sided, number of spikelets low, spikelet density medium, length short, awns present, colour white. Apical rachis segment: hairiness of convex surface weak. Lower glume: shoulder width narrow, shoulder shape slightly sloping, beak length short, beak shape straight. Lowest lemma: beak shape straight. Grain: colour white. Seasonal type: spring.

Origin and Breeding Controlled pollination: Hartog*3/Quarrion. The recurrent parent 'Hartog' is characterised by low transpiration efficiency. The initial cross was made in 1991 to incorporate the high transpiration efficiency of donor parent 'Quarrion' into 'Hartog'. The F_1 and F_2 seed was sown in the glasshouse in 1991. Selection criteria: six $F_{2:3}$ families with the highest transpiration efficiency in field tests were used as males in backcrossing to 'Hartog'. Harvested BC_1F_1 seed was sown in the glasshouse to produce BC_2F_2 seed. Progenies from this seed were selected on similarity to 'Hartog' and sown in the field in 1994 and screened for high transpiration efficiency. Seed from selected plants was increased and seed from sub-line QH71-2, which became 'Drysdale' was evaluated for yield and quality from 1996 to 2000. Propagation: by seed. Breeder: A. Condon, R. Richards, G. Farquhar, G. Rebetzke, P. Martin, H. Allen and Z. Tomes, ACT and NSW.

Choice of Comparators 'Hartog' was selected as a comparator because it is the recurrent parent and the most similar variety of common knowledge. 'Hartog' significantly contributes to the pedigree of the candidate variety. 'Sunstate'ϕ was also selected as a comparator because it was also derived through a backcross to 'Hartog'. 'Quarrion' was not selected as a comparator because it differs in having stronger colouration of auricles and a lower spikelet number and ear length. Other varieties considered but rejected as comparators were 'Mulgara' and 'Silverstar'ϕ. 'Mulgara' was rejected because of later maturity, and lower spikelet number and reduced ear length. 'Silverstar'ϕ was rejected because of earlier flowering, weaker glaucosity of blade and ear, and lower spikelet number and shorter ear length.

Comparative Trial Location: CSIRO Ginninderra Research Station, Canberra, ACT. Seeds were sown on 4 Jul 2001. Conditions: plants were raised in open fields under irrigated condition. Trial design: plots ($2x10m^2$) arranged in a randomised complete block with two replicates. Measurements: observations were made on ten randomly selected plants per replicate.

Prior Applications and Sales Nil.

Description: **Dr Ross Downes,** Innovative Plant Breeders, Canberra, ACT.

Table 45 *Triticum* varieties

	'Drysdale'	**'Sunstate'ϕ**	**'Hartog'**
TIME OF EAR EMERGENCE (days after October 1, 2001)			
	38	40	39
EAR: GLAUCOSITY			
	strong	medium	strong
PLANT: HEIGHT (cm)			
mean	70.4	79.3	75.9
std deviation	3.5	2.8	3.7
LSD/sig	2.3	P≤0.01	P≤0.01

EAR: SPIKELET NUMBER			
mean	15.4	17.2	17.1
std deviation	0.9	1.0	0.7
LSD/sig	0.6	P≤0.01	P≤0.01
EAR: LENGTH (mm)			
mean	88.4	101.3	97.7
std deviation	5.6	5.4	4.7
LSD/sig	3.7	P≤0.01	P≤0.01
LOWER GLUME: SHOULDER WIDTH			
	narrow	narrow	medium
LOWER GLUME: BEAK SHAPE			
	straight	slightly curve	straight

'Mackellar'

Application No: 2001/238 Accepted: 6 Nov 2001.
Applicant: **CSIRO** and **Grains Research and Development Corporation,** Canberra, ACT.

Characteristics (Table 46, Figure 47) Plant: growth habit semi-prostrate, height short. Time of ear emergence: medium late. Flag leaf: anthocyanin colouration of auricles weak, glaucosity of sheath medium, glaucosity of blade medium. Culm: glaucosity of neck medium. Straw: pith in cross section thin. Ear: glaucosity medium, shape in profile slightly tapering, number of spikelets medium, spikelet density medium, length short, awns absent, scurs at tip present, colour white. Apical rachis segment: hairiness of convex surface weak. Lower glume: shoulder width narrow, shoulder shape slightly sloping, beak length short, beak shape slightly curved. Lowest lemma: beak shape strongly curved. Grain: colour red. Seasonal type: winter. Time of maturity: late. Disease resistance: resistance to Barley Yellow Dwarf Virus (BYDV).

Origin and Breeding Controlled pollination: seed parent breeding line (Tatiara/ TC14//Beaver///Soisson) x pollen parent B1073 (Mercia2/Hartog) in a planned breeding program. Both parents are CSIRO breeding lines. The initial cross was made in 1992, the last in 1994. The F_1 was grown in 1994. Selection criteria: F_2 plots grown in 1995 with selection for disease resistance, straw strength, and flowering time. The F_3 and F_4s were selected for stem rust resistance in 1996, and F_5 single plants were selected in 1997 for plot assessment in 1998. Field trials were conducted from 1999 to 2001. Propagation: by seed. Breeders: Dr J.L. Davidson and Ms S. Kleven, CSIRO Plant Industries, Canberra, ACT.

Choice of Comparators The grouping characteristics used in identifying the most similar varieties of common knowledge were – Time of ear emergence and Seasonal type. On these bases, 'Rudd' and 'Dennis'(Þ were selected as comparators because of similar flowering time and seasonal type. 'Brennan'(Þ was not selected as a comparator because of white grain colour and 'Tennant'(Þ was excluded because of its later maturity. The parents were not included because of reasons stated above. The parents were not included as they were non-commercial breeding lines, one a spring wheat and the other a late flowering winter wheat.

Comparative Trial Location: CSIRO Ginninderra Research Station, Canberra, ACT. Seeds were sown on 4 Jul 2001. Conditions: plants were raised in open fields under irrigated condition. Trial design: plots (2x10m^2) arranged in a randomised complete block with two replicates. Measurements: observations were made on ten randomly selected plants per replicate.

Prior Applications and Sales Nil.

Description: **Dr Ross Downes,** Innovative Plant Breeders, Canberra, ACT.

'Rudd'

Application No: 2001/237 Accepted: 6 Nov 2001.
Applicant: **CSIRO** and **Grains Research and Development Corporation,** Canberra, ACT.

Characteristics (Table 46, Figure 47) Plant: growth habit semi-prostrate, height medium. Time of ear emergence: medium late. Flag leaf: anthocyanin colouration of auricles weak, glaucosity of sheath medium, glaucosity of blade weak. Culm: glaucosity of neck medium. Straw: pith in cross section thin. Ear: glaucosity medium, shape in profile very slightly tapering, number of spikelets medium, spikelet density medium, length short, awns absent, scurs at tip present, colour white. Apical rachis segment: hairiness of convex surface medium. Lower glume: shoulder width broad, shoulder shape straight, beak length short, beak shape slightly curved. Lowest lemma: beak shape slightly curved. Grain: colour red. Seasonal type: winter. Time of maturity: late. Disease resistance: resistance to stem, stripe and leaf rust, *Septoria tritici* blotch, and yellow spot.

Origin and Breeding Controlled pollination: seed parent 'Rendezvous' x pollen parent 'B41' in a planned breeding program. The seed parent is characterised by late maturity and the pollen parent is a CSIRO breeding line characterised by rust susceptibility. The initial cross was made in 1986 with the F_1 grown in the glasshouse in 1987. Selection criteria: in F_2 plots individual plants were selected for disease resistance, straw strength and flowering time in 1988. Selection for stem rust resistance continued in the F_3 to F_6 from 1989 to 1993. Single plants were selected in the F_7 in 1994. Yield trials proceeded from 1995 to 2001. Propagation: by seed. Breeders: Dr J.L. Davidson and Ms S. Kleven, CSIRO Plant Industries, Canberra, ACT.

Choice of Comparators The grouping characteristics used in identifying the most similar varieties of common knowledge were – Time of ear emergence and Seasonal type. On these bases, 'Mackellar' and 'Dennis'(Þ were selected as comparators because of similar flowering time and seasonal type. 'Brennan'(Þ was not selected as a comparator because of white grain colour and 'Tennant'(Þ was excluded because of its later maturity. The parents were not included because of reasons stated above.

Comparative Trial Location: CSIRO Ginninderra Research Station, Canberra, ACT. Seeds were sown on 4 Jul 2001. Conditions: plants were raised in open fields under irrigated condition. Trial design: plots (2x10m^2) arranged in a randomised complete block with two replicates. Measurements: observations were made on ten randomly selected plants per replicate.

Prior Applications and Sales Nil.

Description: **Dr Ross Downes,** Innovative Plant Breeders, Canberra, ACT.

Table 46 *Triticum* varieties

	'Mackellar'	'Rudd'	*'Dennis'ϕ
TIME OF EAR EMERGENCE (days after Oct 1, 2001)			
	38	36	39
FLAG LEAF: GLAUCOSITY OF BLADE			
	medium	weak	weak
EAR: GLAUCOSITY			
	medium	medium	slight
PLANT: HEIGHT (cm) LSD P≤0.01) =3.1			
mean	81.0[a]	85.0[b]	80.6[a]
std deviation	5.1	3.7	5.0
STRAW: PITH			
	thin	thin	medium
EAR: SHAPE IN PROFILE			
	slightly tapering	very slightly tapering	slightly tapering
EAR: SPIKELET NUMBER LSD (P≤0.01) =0.8			
mean	20.0[a]	21.6[b]	22.7[c]
std deviation	1.3	1.1	0.8
EAR: DENSITY (spikelets per 100 mm ear) LSD (P≤0.01) =0.8			
mean	19.8[a]	20.9[b]	20.8[b]
std deviation	1.3	1.1	0.8
EAR: LENGTH (mm) LSD (P≤0.01) =4.3			
mean	100.4[a]	104.1[a]	108.9[b]
std deviation	7.7	5.9	4.6
AWNS AT TIP OF EAR: LENGTH (mm) LSD (P≤0.01) =3.7			
mean	21.7[ab]	18.3[a]	24.5[b]
std deviation	5.3	4.5	5.7
APICAL RACHIS SEGMENT: HAIRINESS OF CONVEX SURFACE			
	weak	medium	medium
LOWER GLUME: SHOULDER WIDTH			
	narrow	broad	narrow
LOWER GLUME: SHOULDER SHAPE			
	slightly sloping	straight	sloping
LOWEST LEMMA: BEAK SHAPE			
	strongly curve	slightly curve	medium curve
GRAIN: COLOUR			
	red	red	white

Verbena hybrid
Verbena

'Balazdapu'

Application No: 2000/243 Accepted: 29 Aug 2000.
Applicant: **Ball FloraPlant-A Division of Ball Horticultural Company**, West Chicago, IL, USA.
Agent: **Ball Australia Pty Ltd**, Keysborough, VIC.

Characteristics (Table 47, Figure 10) Plant: habit mounded and trailing, height medium to tall (mean 183mm). Stem: anthocyanin present, pubescence medium. Leaf: length medium (mean 39.5mm), width medium (mean 24.1mm), shape hastate, margin incised bipinnatisect, lobe size broad, incisions deep, shape of apex obtuse, pubescence on upper side weak, pubescence on margin very weak, pubescence on lower side weak (veins only). Inflorescence: type spike, diameter medium (mean 40.5mm), number of flowers per spike medium (mean 34.3), peduncle length medium (mean 33.9mm). Flower: type single, attitude upwards facing, diameter medium (mean 14.3mm), main bud colour violet (RHS 83C), main colour of upper side of petals of young flower purple-violet (ca. RHS 82A), main colour of upper side of petals of mid aged flower purple-violet (RHS N81A), main colour of upper side of petals of older flower purple-violet (RHS N82B), main colour of lower side of petals violet (RHS 83D), eye zone present, colour of eye zone white (RHS 155A) with tan centre, corolla lobes separate. (Note: all RHS colour chart numbers refer to 2001 edition.)

Origin and Breeding Controlled pollination: seed parent *Verbena canadensis* breeding line PAS 3647 x pollen parent 'Quartz Blue' in a planned breeding program in Arroyo Grande, California, USA. The seed parent is characterised by whole leaf form and a semi trailing plant habit. The pollen parent is characterised by whole leaf form and an upright trailing plant habit. 'Balazdapu' was selected from the seedling progeny of this cross in 1997 in Arroyo Grande, California, USA. Selection criteria: plant habit, flowering habit, flower colour. Propagation: vegetative tip cuttings. 'Balazdapu' has been found to be uniform and stable through many generations since selection. Breeder: Dr Scott Trees, Ball FloraPlant, Arroyo Grande, California, USA.

Choice of Comparators Grouping characteristics used in identifying the most similar varieties of common knowledge were – Flower: type single, bud colour violet, and main colour of upper side of petals purple violet. On the basis of these grouping characteristics the following varieties were included in the trial: 'Sunmarefu TP-V'ϕ syn Purple Passionϕ, 'Sunmariba'ϕ syn Violet Surpriseϕ, 'Sunmarefu TP-L'ϕ syn Lilac Reflectionsϕ. For the purpose of providing evidence of breeding, the parent material can be clearly distinguished from the candidate variety using the grouping characteristics: Leaf: shape, Plant: habit.

Comparative Trial Location: Winmalee, NSW, Sep – Dec 2001. Conditions: trial conducted in outdoor production area, rooted cuttings (propagated from stock plants grown at Winmalee) potted in September into 150 mm standard pots in commercial potting mix, nutrients supplied by slow

release and liquid feed fertiliser applications, plant protection treatments applied as necessary. Trial design: 10 pots of each variety arranged in a completely randomised design. Measurements taken from 10 plants per variety selected at random (one sample per plant).

Prior Applications and Sales
No prior application.

First sold in USA and Canada in Jul 1999. First sold in Australia in Aug 2000.

Description: **Tim Angus**, Tim Angus Horticulture, Wellington, NZ.

'Balazdela'

Application No: 2000/242 Accepted: 29 Aug 2000.
Applicant: **Ball FloraPlant-A Division of Ball Horticultural Company,** West Chicago, IL, USA.
Agent: **Ball Australia Pty Ltd,** Keysborough, VIC.

Characteristics (Table 47, Figure 9) Plant: habit mounded and trailing, height medium to tall (mean 189mm). Stem: anthocyanin absent, pubescence medium. Leaf: length medium (mean 32.3mm), width medium (mean 21.2mm), shape hastate, margin incised bipinnatisect, lobe size broad, incisions medium, shape of apex acute, pubescence on upper side weak to medium, pubescence on margin medium, pubescence on lower side medium to strong (veins only). Inflorescence: type spike, diameter medium (mean 43.7mm), number of flowers per spike medium (mean 32.3), peduncle length medium (mean 33.3mm). Flower: type single, attitude upwards facing, diameter medium (mean 15.5mm), main bud colour violet-blue (darker than RHS 93A), main colour of upper side of petals of young flower violet-blue (brighter than RHS N89A), main colour of upper side of petals of mid aged flower violet blue (brighter than RHS N89A), main colour of upper side of petals of older flower violet-blue (brighter than RHS N89A), main colour of lower side of petals violet blue (ca. RHS N88A), eye zone absent, corolla lobes separate. (Note: all RHS colour chart numbers refer to 2001 edition.)

Origin and Breeding Controlled pollination: seed parent *Verbena tenera* "blue form" x pollen parent *V.* hybrid 'Quartz Blue' in a planned breeding program in Arroyo Grande, California, USA. The seed parent is characterised by a trailing plant habit and serrate leaf margins. The pollen parent is characterised by an upright plant habit and ovate leaf shape. 'Balazdela' was selected from the seedling progeny of this cross in 1997 in Arroyo Grande, California, USA. Selection criteria: plant habit, flowering habit, flower colour. Propagation: vegetative tip cuttings. 'Balazdela' has been found to be uniform and stable through many generations since selection. Breeder: Dr Scott Trees, Ball FloraPlant, Arroyo Grande, California, USA.

Choice of Comparators Grouping characteristics used in identifying the most similar varieties of common knowledge were – Flower: type single, bud colour violet-blue, and main colour of upper side of petals violet-blue. On the basis of these grouping characteristics the following varieties were included in the trial: 'Sunmarefu TP-V'(Þ syn Purple Passion(Þ, 'Sunmariba'(Þ syn Violet Surprise(Þ, 'Sunmarefu TP-L'(Þ syn Lilac Reflections(Þ. For the purpose of providing evidence of breeding, the parent material can be clearly distinguished from the candidate variety using the grouping characteristics: Leaf: shape, Plant: habit.

Comparative Trial Location: Winmalee, NSW, Sep – Dec 2001. Conditions: trial conducted in outdoor production area, rooted cuttings (propagated from stock plants grown at Winmalee) potted in September into 150 mm standard pots in commercial potting mix, nutrients supplied by slow release and liquid feed fertiliser applications, plant protection treatments applied as necessary. Trial design: 10 pots of each variety arranged in a completely randomised design. Measurements taken from 10 plants per variety selected at random (one sample per plant).

Prior Applications and Sales
No prior application.
First sold in USA and Canada in Jul 1999. First sold in Australia in Aug 2000.

Description: **Tim Angus,** Tim Angus Horticulture, Wellington, NZ.

'Balazlav'

Application No: 2000/244 Accepted: 29 Aug 2000.
Applicant: **Ball FloraPlant-A Division of Ball Horticultural Company,** West Chicago, IL, USA.
Agent: **Ball Australia Pty Ltd,** Keysborough, VIC.

Characteristics (Table 47, Figure 9) Plant: habit mounded and trailing, height tall (mean 212mm). Stem: anthocyanin present, pubescence medium. Leaf: length medium (mean 42.1mm), width medium (mean 26.1), shape hastate, margin incised bipinnatisect, lobe size medium to broad, incisions deep, shape of apex obtuse, pubescence on upper side very weak, pubescence on margin very weak, pubescence on lower side very weak (veins only). Inflorescence: type spike, diameter medium (mean 43.1mm), number of flowers per spike medium (mean 35.3), peduncle length medium to long (mean 44.5mm). Flower: type single, attitude upwards facing, diameter medium (mean 16.9mm), main bud colour violet (RHS 83C), main colour of upper side of petals of young flower purple-violet (ca. RHS N81A), main colour of upper side of petals of mid aged flower purple violet (ca. RHS N81A), main colour of upper side of petals of older flower purple-violet (ca. RHS N81A), main colour of lower side of petals violet (RHS 83B), eye zone present, colour of eye zone white (RHS 155A) with green centre, corolla lobes separate. (Note: all RHS colour chart numbers refer to 2001 edition.)

Origin and Breeding Controlled pollination: seed parent *Verbena* hybrid 'Quartz Dark Red' x pollen parent *V. speciosa* 'Imagination' in a planned breeding program in Arroyo Grande, California, USA. The seed parent is characterised by ovate leaf shape and upright plant habit. The pollen parent is characterised by serrated leaf margin and a trailing plant habit. 'Balazlav' was selected from the seedling progeny of this cross in 1997 in Arroyo Grande, California, USA. Selection criteria: plant habit, flowering habit, flower colour. Propagation: vegetative tip cuttings. 'Balazlav' has been found to be uniform and stable through many generations since selection. Breeder: Dr Scott Trees, Ball FloraPlant, Arroyo Grande, California, USA.

Choice of Comparators Grouping characteristics used in identifying the most similar varieties of common knowledge were – Flower: type single, bud colour violet, and main colour of upper side of petals purple violet. On the basis of these grouping characteristics the following varieties were included in the trial: 'Sunmarefu TP-V'(Ф) syn Purple Passion(Ф), 'Sunmariba'(Ф) syn Violet Surprise(Ф), 'Sunmarefu TP-L'(Ф) syn Lilac Reflections(Ф). For the purpose of providing evidence of breeding, the parent material can be clearly distinguished from the candidate variety using the grouping characteristics: Leaf: shape, Plant: habit.

Comparative Trial Location: Winmalee, NSW, Sep – Dec 2001. Conditions: trial conducted in outdoor production area, rooted cuttings (propagated from stock plants grown at Winmalee) potted in September into 150 mm standard pots in commercial potting mix, nutrients supplied by slow release and liquid feed fertiliser applications, plant protection treatments applied as necessary. Trial design: 10 pots of each variety arranged in a completely randomised design. Measurements taken from 10 plants per variety selected at random (one sample per plant).

Prior Applications and Sales
No prior application.

First sold in USA and Canada in Jul 1999. First sold in Australia in Aug 2000.

Description: **Tim Angus**, Tim Angus Horticulture, Wellington, NZ.

'Balwildaav'

Application No: 2000/240 Accepted: 29 Aug 2000.
Applicant: **Ball FloraPlant – A Division of Ball Horticultural Company**, West Chicago, IL, USA.
Agent: **Oasis Horticulture Pty Ltd**, Winmalee, NSW.

Characteristics (Table 47, Figure 10) Plant: habit mounded and trailing, height tall (mean 204mm). Stem: anthocyanin present, pubescence medium. Leaf: length long (mean 67.4mm), width medium to large (mean 29.6mm), shape ovate, margin crenate, shape of apex acute, pubescence on upper side very weak, pubescence on margin absent to weak, pubescence on lower side medium to strong (veins only). Inflorescence: type spike, diameter medium (mean 42.4mm), number of flowers per spike medium (mean 30.8), peduncle length medium to short (mean 17mm). Flower: type single, attitude upwards facing, diameter medium (mean 15.7mm), main bud colour violet-blue (RHS 90B), main colour of upper side of petals of young flower violet-blue (RHS N87A), main colour of upper side of petals of mid aged flower violet-blue (RHS N87B), main colour of upper side of petals of older flower violet-blue (RHS N87C), main colour of lower side of petals violet (RHS 86D), eye zone present, colour of eye zone violet (RHS 86A-B), corolla lobes separate. (Note: all RHS colour chart numbers refer to 2001 edition.)

Origin and Breeding Controlled self pollination: seed parent 'Blue Princess' x pollen parent 'Blue Princess' in a planned breeding program in Somerville, Tennessee, USA. The parent material is characterised by a 'true' blue flower colour. 'Balwildaav' was selected from the seedling progeny of this cross in 1997 in Somerville, Tennessee, USA. Selection criteria: plant habit, flowering habit, flower colour. Propagation: Vegetative tip cuttings. 'Balwildaav' has been found to be uniform and stable through many generations since selection. Breeder: Carolyn T. Parsons, San Antonio, Texas, USA.

Choice of Comparators Grouping characteristics used in identifying the most similar varieties of common knowledge were – Flower: type single, bud colour violet-blue, and main colour of upper side of petals violet-blue. On the basis of these grouping characteristics the following varieties were included in the trial: 'Sunmarefu TP-V'(Ф) syn Purple Passion(Ф), 'Sunmariba'(Ф) syn Violet Surprise(Ф), 'Sunmarefu TP-L'(Ф) syn Lilac Reflections(Ф). For the purpose of providing evidence of breeding, the parent material can be clearly distinguished from the candidate variety using the grouping characteristics: Flower colour.

Comparative Trial Location: Winmalee, NSW, Sep – Dec 2001. Conditions: trial conducted in outdoor production area, rooted cuttings (propagated from stock plants grown at Winmalee) potted in September into 150 mm standard pots in commercial potting mix, nutrients supplied by slow release and liquid feed fertiliser applications, plant protection treatments applied as necessary. Trial design: 10 pots of each variety arranged in a completely randomised design. Measurements taken from 10 plants per variety selected at random (one sample per plant).

Prior Applications and Sales

Country	Year	Current Status	Name Applied
USA	1999	Granted	'Balwildaav'
Canada	1999	Granted	'Balwildaav'

First sold in USA and Canada in Jan 1999. First sold in Australia in Aug 2000.

Description: **Tim Angus**, Tim Angus Horticulture, Wellington, NZ.

Table 47 *Verbena* varieties

	'Balwildaav'	**'Balazdela'**	**'Balazdapu'**	**'Balazlav'**	***'Sunmarefu TP-V'Φ** syn **Purple Passion Φ**	***'Sunmariba'Φ** syn **Violet Surprise Φ**	***'Sunmarefu TP-V'A** syn **Lilac Reflections Φ**
PLANT: HABIT	mounded trailing	mounded trailing	mounded trailing	mounded trailing	prostrate	prostrate	prostrate
PLANT: HEIGHT (mm) LSD (P≤0.01) = 34.5							
mean	204[a]	189[a]	183[ab]	212[a]	83[cd]	106[c]	59[d]
std deviation	27	23.3	25.0	16.2	14.2	38.9	15.2
STEM: ANTHOCYANIN	present	absent	present	present	present	present	present
STEM: PUBESCENCE	medium	medium	medium	medium	weak	medium to strong	very weak
LEAF: LENGTH (mm) LSD (P≤0.01) = 5.1							
mean	67.4[a]	32.3[de]	39.5[bc]	42.1[b]	26.4[f]	35.1[cd]	27.3[ef]
std deviation	4.3	3.1	2.5	2.6	3.8	3.6	4.4
LEAF: WIDTH (mm) LSD (P≤0.01) = 4.3							
mean	29.6[a]	21.2[c]	24.1[bc]	26.1[a]	18.7[c]	24.5[bc]	25.6[ab]
std deviation	2.6	3.8	3.7	2.7	3.8	3.6	4.4
LEAF: SHAPE	ovate	hastate	hastate	hastate	hastate	ovate	hastate
LEAF: MARGIN	crenate	incised bipinnatisect	incised bipinnatisect	incised bipinnatisect	incised bipinnatisect	crenate	incised bipinnatisect
LEAF: LOBE SIZE	n/a	broad	broad	medium to broad	broad	n/a	narrow
LEAF: INCISIONS	n/a	medium	deep	deep	deep	n/a	deep
LEAF: SHAPE OF APEX	acute	acute	obtuse	obtuse	acute	obtuse	acute
LEAF: PUBESCENCE – UPPER SIDE	very weak	weak to medium	weak	very weak	weak	medium	very weak to strong
LEAF: PUBESCENCE – MARGIN	absent to weak	medium	very weak	very weak	very weak	medium	very weak
LEAF: PUBESCENCE – LOWER SIDE VEINS	medium to strong	medium to strong	weak	very weak	very weak	medium to	absent to very weak
INFLORESCENCE: DIAMETER (mm) LSD (P≤0.01) = 3.8							
mean	42.4[c]	43.7[c]	40.5[cd]	43.1[c]	37.9[d]	57.1[a]	31.3[e]
std deviation	2.4	2.6	2.5	2.8	2.5	3.5	2.6
INFLORESCENCE: NUMBER OF FLOWERS PER SPIKE LSD (P≤0.01) = 5.4							
mean	30.8[abc]	32.3[abc]	34.3[ab]	35.3[a]	28.3[bc]	27.5[bc]	29.4[bc]
std deviation	6.0	3.3	3.6	3.7	7.1	3.1	3.4

Table 47 continued

INFLORESCENCE: PEDUNCLE LENGTH (mm) LSD (P≤0.01) = 6.7							
mean	17[d]	33.3[b]	33.9[b]	44.5[a]	22.8[cd]	45.3[a]	32.5[b]
std deviation	3.1	3.1	3.7	5.9	3.7	4.8	6.3
FLOWER: DIAMETER (mm) LSD (P≤0.01) = 4.6							
mean	15.7[b]	15.5[b]	14.3[b]	16.9[ab]	14.8[b]	21.2[a]	13.5[b]
std deviation	0.8	0.5	0.7	0.8	0.3	1.9	0.5
FLOWER: BUD MAIN COLOUR (RHS, 2001)							
	violet blue 90B	violet blue darker than 93A	violet 83C	violet 83C	violet 86A	purple violet 82A	violet 86D
FLOWER: MAIN COLOUR OF UPPER SIDE OF PETALS (RHS, 2001)							
Young	violet blue N87A	violet blue brighter than N89A	purple violet ca 82A	purple violet ca N81A	violet ca 86A	purple violet ca N81A	purple violet N82B
Mid aged	violet blue N87B	no change	purple violet N81A	no change	no change	no change	no change
Older	violet blue N87C	no change	purple violet N82B	no change	no change	no change	no change
FLOWER: MAIN COLOUR OF LOWER SIDE OF PETALS (RHS, 2001)							
	violet 86D	violet blue ca N88A	violet 83D	violet 83D	violet 86B	purple violet N82C	purple 76B
FLOWER: EYE ZONE							
	present	absent	present	present	absent	present	present
FLOWER: EYE ZONE COLOUR							
	violet 86A/B	n/a	white 155A with with tan centre	white 155A with green centre	n/a	yellow green 149C	white 155A

Note: mean values followed by the same letter are not significantly different at P≤0.01.

'Balazpima'

Application No: 2000/241 Accepted: 29 Aug 2000.
Applicant: **Ball FloraPlant – A Division of Ball Horticultural Company**, West Chicago, IL, USA.
Agent: **Ball Australia Pty Ltd**, Keysborough, VIC.

Characteristics (Table 48, Figure 12) Plant: habit mounded and trailing, height medium (mean 159.5mm). Stem: anthocyanin present, pubescence medium. Leaf: length medium (mean 41mm), width medium (mean 21.4mm), shape hastate, margin incised bipinnatisect, lobe size broad, incisions deep, shape of apex obtuse, pubescence on upper side medium, pubescence on margin weak, pubescence on lower side strong (veins only). Inflorescence: type spike, diameter medium (mean 39.9mm), number of flowers per spike medium to few (mean 25.4), peduncle length short (mean 26.4mm). Flower: type single, attitude upwards facing, diameter medium (mean 14.6mm), main bud colour purple (RHS 75A), main colour of upper side of petals of young flower red-purple (margin RHS 68A, centre RHS 73A), main colour of upper side of petals of mid aged flower red-purple (RHS 73B-C), main colour of upper side of petals of older flower red-purple (RHS 76D), main colour of lower side of petals red-purple (RHS 73B-C), eye zone present, eye zone colour yellow-green (RHS 145A-B), corolla lobes separate. (Note: all RHS colour chart numbers refer to 2001 edition.)

Origin and Breeding Controlled pollination: seed parent *Verbena speciosa* breeding line 1594 x pollen parent 'Tapien Violet Blue' in a planned breeding program in Arroyo Grande, California, USA. The seed parent is characterised by medium plant growth (a more open plant habit). The pollen parent is characterised by a violet blue flower colour. 'Balazpima' was selected from the seedling progeny of this cross in 1997 in Arroyo Grande, California, USA. Selection criteria: plant habit, flowering habit, flower colour. Propagation: vegetative tip cuttings. 'Balazpima' has been found to be uniform and stable through many generations since selection. Breeder: Dr Scott Trees, Ball FloraPlant, Arroyo, Grande, California, USA.

Choice of Comparators Grouping characteristics used in identifying the most similar varieties of common knowledge were – Flower: type single, bud colour purple, and main colour of upper side of petals red-purple. On the basis of these grouping characteristics the following varieties were included in the trial: 'Sunmarefu TP-P'(D) syn

Pink Passion(Φ), 'Morena'(Φ), 'Florena'(Φ), 'Pearl'. For the purpose of providing evidence of breeding, the parent material can be clearly distinguished from the candidate variety using the grouping characteristics: Plant: habit, Flower colour

Comparative Trial Location: Winmalee, NSW, Sep – Dec 2001. Conditions: trial conducted in outdoor production area, rooted cuttings (propagated from stock plants grown at Winmalee) potted in September into 150 mm standard pots in commercial potting mix, nutrients supplied by slow release and liquid feed fertiliser applications, plant protection treatments applied as necessary. Trial design: 10 pots of each variety arranged in a completely randomised design. Measurements taken from 10 plants per variety selected at random (one sample per plant).

Prior Applications and Sales

Country	Year	Current Status	Name Applied
USA	1999	Applied	'Balazpima'
Canada	1999	Granted	'Balazpima'
EU	2000	Applied	'Balazpima'
Poland	2000	Applied	'Balazpima'

First sold in USA and Canada in Jan 1999. First sold in Australia in Aug 2000.

Description: **Tim Angus**, Tim Angus Horticulture, Wellington, NZ.

'Balazropi'

Application No: 2000/239 Accepted: 29 Aug 2000.
Applicant: **Ball FloraPlant – A Division of Ball Horticultural Company**, West Chicago, IL, USA.
Agent: **Ball Australia Pty Ltd**, Keysborough, VIC.

Characteristics (Table 48, Figure 11) Plant: habit mounded and trailing, height medium to tall (mean 174.5mm). Stem: anthocyanin present, pubescence medium to strong. Leaf: length medium (mean 39.3mm), width medium to large (mean 29mm), shape hastate, margin incised bipinnatisect, lobe size medium, incisions medium, shape of apex obtuse, pubescence on upper side strong, pubescence on margin medium to strong, pubescence on lower side strong (veins only). Inflorescence: type spike, diameter medium (mean 40.1mm), number of flowers per spike medium to many (mean 45.9), peduncle length medium to long (mean 41.9mm). Flower: type single, attitude upwards facing, diameter medium (mean 15.1mm), main bud colour red-purple (RHS 70A), main colour of upper side of petals of young flower red-purple (RHS 67A), main colour of upper side of petals of mid aged flower red-purple (RHS 67A), main colour of upper side of petals of older flower red-purple (RHS 67A), main colour of lower side of petals red-purple (RHS 64D), eye zone present, colour of eye zone white (RHS 155A) with yellow green centre, corolla lobes separate. (Note: all RHS colour chart numbers refer to 2001 edition.)

Origin and Breeding Controlled pollination: seed parent *Verbena* hybrid 'Quartz Blue' x pollen parent *V. canadensis* 'Edith' in a planned breeding program in Arroyo Grande, California, USA. The seed parent is characterised by upright growth habit and ovate leaf shape. The pollen parent is characterised by trailing plant habit and serrate leaf margin. 'Balazropi' was selected from the seedling progeny of this cross in 1997 in Arroyo Grande, California, USA. Selection criteria: plant habit, flowering habit, flower colour. Propagation: vegetative tip cuttings. 'Balazropi' has been found to be uniform and stable through many generations since selection. Breeder: Dr Scott Trees, Ball FloraPlant, Arroyo Grande, California, USA.

Choice of Comparators Grouping characteristics used in identifying the most similar varieties of common knowledge were – Flower: type single, bud colour red-purple, and main colour of upper side of petals red-purple. On the basis of these grouping characteristics the following varieties were included in the trial: 'Sunmarefu TP-P'(Φ syn Pink Passion(Φ, 'Morena'(Φ, 'Florena'(Φ, 'Pearl'. For the purpose of providing evidence of breeding, the parent material can be clearly distinguished from the candidate variety using the grouping characteristics: Plant habit. Leaf: shape, margin.

Comparative Trial Location: Winmalee, NSW, Sep – Dec 2001. Conditions: trial conducted in outdoor production area, rooted cuttings (propagated from stock plants grown at Winmalee) potted in September into 150 mm standard pots in commercial potting mix, nutrients supplied by slow release and liquid feed fertiliser applications, plant protection treatments applied as necessary. Trial design: 10 pots of each variety arranged in a completely randomised design. Measurements taken from 10 plants per variety selected at random (one sample per plant).

Prior Applications and Sales
No prior application.
First sold in USA and Canada in Jul 1999. First sold in Australia in Aug 2000.

Description: **Tim Angus**, Tim Angus Horticulture, Wellington, NZ.

'Balwilblu'

Application No: 2000/238 Accepted: 29 Aug 2000.
Applicant: **Ball FloraPlant – A Division of Ball Horticultural Company**, West Chicago, IL, USA.
Agent: **Oasis Horticulture Pty Ltd**, Winmalee, NSW.

Characteristics (Table 48, Figure 12) Plant: habit mounded and trailing, height medium (mean 185.5mm). Stem: anthocyanin present, pubescence medium to strong. Leaf: length long (mean 71.5mm), width medium (mean 36.6mm), shape ovate, margin crenate, shape of apex acute pubescence on upper side very weak, pubescence on margin weak, pubescence on lower side strong (veins only). Inflorescence: type spike, diameter medium (mean 47.4mm), number of flowers per spike medium (mean 25.5), peduncle length medium (mean 49.6mm). Flower: type single, attitude upwards facing, diameter medium (mean 16.4mm), main bud colour red-purple (RHS 62C), main colour of upper side of petals of young flower purple (RHS 76D), main colour of upper side of petals of mid aged flower purple (RHS 76D), main colour of upper side of petals of older flower purple (RHS 76D), main colour of lower side of petals purple (RHS 76D), eye zone present, colour of eye zone purple (RHS 77A/B), corolla lobes separate. (Note: all RHS colour chart numbers refer to 2001 edition.)

Origin and Breeding Controlled self-pollination: seed parent 'Blue Princess' x pollen parent 'Blue Princess' in a planned breeding program in Somerville, Tennessee, USA. The parent material is characterised by a 'true' blue flower colour. 'Balwilblu' was selected from the seedling progeny of this cross in 1997 in Somerville, Tennessee, USA. Selection criteria: plant habit, flowering habit, flower colour. Propagation: vegetative tip cuttings. 'Balwilblu' has been found to be uniform and stable through many generations since selection. Breeder: Carolyn T. Parsons, San Antonio, Texas, USA.

Choice of Comparators Grouping characteristics used in identifying the most similar varieties of common knowledge were – Flower: type single, bud colour red-purple, and main colour of upper side of petals purple. On the basis of these grouping characteristics the following varieties were included in the trial: 'Sunmarefu TP-P'Φ syn Pink PassionΦ, 'Morena'Φ, 'Florena'Φ, 'Pearl'. For the purpose of providing evidence of breeding, the parent material can be clearly distinguished from the candidate variety using the grouping characteristics: Flower colour.

Comparative Trial Location: Winmalee, NSW, Sep – Dec 2001. Conditions: trial conducted in outdoor production area, rooted cuttings (propagated from stock plants grown at Winmalee) potted in September into 150 mm standard pots in commercial potting mix, nutrients supplied by slow release and liquid feed fertiliser applications, plant protection treatments applied as necessary. Trial design: 10 pots of each variety arranged in a completely randomised design. Measurements taken from 10 plants per variety selected at random (one sample per plant).

Prior Applications and Sales

Country	Year	Current Status	Name Applied
USA	1999	Granted	'Balwilblu'
Canada	1999	Granted	'Balwilblu'

First sold in USA and Canada in Jan 1999. First sold in Australia in Aug 2000.

Description: **Tim Angus**, Tim Angus Horticulture, Wellington, NZ.

Table 48 *Verbena* varieties

	'Balwilblu'	'Balazropi'	'Balazpima'	*'Pearl'	*'Sunmarefu TP-P' syn Pink PassionΦ	*'Morena'Φ	*'Florena'Φ
PLANT: HABIT							
	mounded trailing	mounded trailing	mounded trailing	prostrate	mounded trailing	mounded trailing	mounded trailing
PLANT: HEIGHT (mm) LSD (P≤0.01) = 18.2							
mean	185.5[a]	174.5[ab]	159.5[bc]	46.5[e]	151[c]	164.5[bc]	120[d]
std deviation	16.8	11.4	10.1	13.3	19.1	10.1	21.1
STEM: ANTHOCYANIN							
	present	present	present	absent	present	present	present
STEM: PUBESCENCE							
	medium to strong	medium to strong	medium	absent to very weak	weak	weak	medium to strong
LEAF: LENGTH (mm) LSD (P≤0.01) = 5.3							
mean	71.5[a]	39.3[bc]	41[b]	34.5[cd]	38[bcd]	33.8[d]	35.2[cd]
std deviation	3.9	5.0	4.9	4.9	3.9	3.3	4.4
LEAF: WIDTH (mm) LSD (P≤0.01) = 4.6							
mean	36.6[a]	29[b]	21.4[c]	28.3[b]	27.2[b]	27.2[b]	19.6[c]
std deviation	3.9	5.3	4.5	3.3	2.9	3.4	2.7
LEAF: SHAPE							
	ovate	hastate	hastate	hastate	hastate	hastate	hastate
LEAF: MARGIN							
	crenate	incised bipinnatisect	incised bipinnatisect	incised bipinnatisect	incised bipinnatisect	incised bipinnatisect	incised bipinnatisect
LEAF: LOBE SIZE							
	n/a	medium	broad	broad	broad	broad	medium
LEAF: INCISIONS							
	n/a	medium	deep	deep	deep	deep	deep

LEAF: SHAPE OF APEX							
	acute	obtuse	obtuse	acute	acute	obtuse	obtuse
LEAF: PUBESCENCE – UPPER SIDE							
	very weak	strong	medium	very weak	very weak	medium to weak	absent to very weak
LEAF: PUBESCENCE – MARGIN							
	weak	medium to strong	weak	absent	very weak	very weak	absent to very weak
LEAF: PUBESCENCE – LOWER SIDE VEINS							
	medium	strong	strong	very weak	very weak	medium	weak
INFLORESCENCE: DIAMETER (mm) LSD (P≤0.01) = 3.8							
mean	47.4[a]	40.1[b]	39.9[b]	38.7[bc]	35.4[c]	40.5[b]	40.6[b]
std deviation	4.4	2.0	3.4	2.2	3.0	3.3	3.3
INFLORESCENCE: NUMBER OF FLOWERS PER SPIKE LSD (P≤0.01) = 5.8							
mean	25.5[c]	45.9[a]	25.4[c]	33.2[b]	34.2[b]	45.4[a]	21.9[c]
std deviation	4.5	3.5	6.0	5.5	4.3	6.4	2.5
INFLORESCENCE: PEDUNCLE LENGTH (mm) LSD (P≤0.01) = 11.5							
mean	49.6[ab]	41.9[ab]	26.4[d]	48.4[ab]	38.7[bc]	52.6[a]	29[cd]
std deviation	16.3	6.6	7.1	9.8	5.9	10.4	6.4
FLOWER: DIAMETER (mm) LSD (P≤0.01) = 1.1							
mean	16.4[a]	15.1[b]	14.6[b]	15.4[ab]	12.4[c]	16[ab]	15.3[ab]
std deviation	1.2	0.4	1.4	0.5	0.8	0.9	0.7
FLOWER: BUD MAIN COLOUR							
	red purple 62C	red purple 70A	purple 75A	violet 83C	purple 77B	purple 75A	red purple 59D
FLOWER: MAIN COLOUR OF UPPER SIDE OF PETALS (RHS, 2001)							
Young	purple 76D	red purple 67A	red purple margin 68A centre 73A	purple 76C with streaks of 76B	red purple 73A/B	red purple 73A	red purple ca N66A
Mid aged	no change	no change	red purple 73B/C	no change	red purple N74D	red purple 73A	no change
Older	no change	no change	red purple ca 76D	no change	purple 75B streaked with 78A	red purple margin 65D centre 73A	no change
FLOWER: MAIN COLOUR OF LOWER SIDE OF PETALS (RHS, 2001)							
	purple 76D	red purple 64D	red purple 73B/C	purple 76C	purple 75A streaked with 78A	purple 75D	red purple 57D
FLOWER: EYE ZONE COLOUR (RHS, 2001)							
	purple 77A/B	white 155A with yellow green centre	yellow green 145A/B	yellow green 145C/D	purple 78A with yellow green centre	yellow green 145C/D	yellow green 145C/D

Note: mean values followed by the same letter are not significantly different at P≤0.01.

'Sunmaref TP-SAP'

Application No: 2001/186 Accepted: 8 Nov 2001.
Applicant: **Suntory Limited,** Osaka, Japan
Agent: **Yates Botanicals Pty Limited,** Somersby, NSW.

Characteristics (Table 49, Figure 8) Plant: habit spreading, average height 10cm, average main stem length 56cm, number of branches many, floriferousness high. Stem: internode length short (average length 19mm), anthocyanin colouration present, pubescence medium, colour yellow-green (RHS 144A). Leaf: size medium, (average length 20mm, average width 13mm), margin bipinnatisect, depth of incisions deep, shape of apex acute, colour of upper side green (RHS 137A), colour of lower side yellow-green (RHS 147B), pubescence weak. Inflorescence: type spike, diameter medium (average 40mm), average number flowers per spike many, peduncle length medium (average length 21mm). Flower: type single, attitude upward facing, diameter medium (average 14.8mm), main colour red-purple (RHS 58B-C), reverse colour red-purple (RHS 58D) diffuse with white (RHS 155D), eye zone present, colour of eye zone white (RHS 155D), corolla lobes separate, calyx colour green (RHS 137B). (Note: all RHS colour chart numbers refer to 1995 edition.)

Origin and Breeding Controlled pollination: seed parent *V. calliantha f. rosea* x pollen parent 'Rainbow Carpet Red'. The seed parent is characterised by deep purple pink colour and a semi-erect to spreading growth habit and the pollen parent is characterised by red flower colour and a semi-erect growth habit. Hybridisation took place in Osaka, Japan in 1995 and first flowers were observed on the new variety in 1996. Selection criteria: flower colour and spreading growth habit. Propagation: mature stock plants were generated from this seedling through tissue culture and were found to be uniform and stable. 'Sunmaref TP-SAP' will be commercially propagated by vegetative cuttings from elite stock plants from disease indexed tissue cultures. Marketed in Australia under the Tapien® brand name. Breeder: Yasunori Yomo, Shiga, Japan.

Choice of Comparators The grouping characteristics used in identifying the most similar varieties of common knowledge were – Flower: colour pink, leaf margin bipinnatisect, flower number many, flower size large. Based on these grouping characteristics 'Florena', 'Morena' and 'Sunmarefu TP-P'ϕ syn Pink Passionϕ were selected as the most similar varieties suitable as comparators. The parents were not included due to differing flower colour. No other similar varieties were identified.

Comparative Trial Location: Macquarie Fields, summer 2000-2001. Conditions: trial conducted in open beds initially and transferred to a polyhouse for rain protection during flowering, plants propagated from cutting, rooted cuttings planted into 125mm standard pots filled with soilless potting mix, nutrition maintained with slow release and liquid fertilisers, pest and disease treatments applied as required. Trial design: fifteen pots of each variety arranged in a completely randomised design. Measurements: from ten plants at random. One sample per plant.

Prior Applications and Sales

Country	Year	Current Status	Name Applied
Japan	1998	Applied	'Sunmaref TP-SAP'
USA	1999	Applied	'Sunmaref TP-SAP'
Norway	2000	Applied	'Sunmaref TP-SAP'
Canada	2001	Applied	'Sunmaref TP-SAP'

First sold in Europe in Jan 2000. First sold in Australia in Sep 2000.

Description: **Ian Paananen,** Crop & Nursery Services, Central Coast, NSW.

Table 49 *Verbena* varieties

	'Sunmaref TP-SAP'	* 'Florena'	*'Morena'	*'Sunmarefu TP-P'ϕ syn Pink Passionϕ
PLANT HABIT	trailing, low compact	spreading, trailing upright-	spreading, trailing upright-	trailing, medium compact
PLANT HEIGHT (cm) – maximum LSD (P≤0.01) = 3.0				
mean	9.5[c]	17.4[b]	21.4[a]	16.0[b]
std deviation	0.8	5.0	2.2	1.8
STEM LENGTH (cm) – maximum LSD (P≤0.01) = 8.7				
mean	56.0[a]	31.0[b]	57.8[a]	56.5[a]
std deviation	7.1	2.8	8.5	7.5
INTERNODE LENGTH (mm) LSD (P≤0.01) = 7.2				
mean	18.5[b]	19.9[ab]	26.8[a]	17.9[b]
std deviation	5.3	5.8	8.0	4.7
LEAF LENGTH (mm) LSD (P≤0.01) = 4.6				
mean	19.5[d]	31.1[a]	24.0[bcd]	21.7[cd]
std deviation	2.9	2.7	3.5	4.0
INFLORESCENCE DIAMETER (mm) LSD (P≤0.01) = 3.0				
mean	39.5[a]	46.1[c]	43.0[b]	39.9[a]
std deviation	1.6	4.0	3.2	1.4
FLOWER NUMBER PER SPIKE LSD (P≤0.01) = 7.2				
mean	33.3[bc]	21.5[d]	41.3[ab]	34.5[bc]
std deviation	10.0	4.3	4.8	6.0
FLOWER DIAMETER (mm) LSD (P≤0.01) = 1.3				
mean	14.8[b]	17.2[a]	16.3[ab]	15.1[b]
std deviation	1.2	1.0	1.1	0.5
PEDUNCLE LENGTH (mm) LSD (P≤0.01) = 15.3				
mean	21.4[d]	46.5[bc]	69.8[a]	26.8[cd]
std deviation	10.9	15.8	21.0	6.5
FLOWER COLOURS (RHS, 1995)				
main petal	58B-C	ca 57A (deeper)	73A mixed 155D	73B-A
reverse	58D mixed with white	57A fading to margins	73C mixed with white	73B mixed with white/ purple
eye	155D	145C-D	145C-D	74A

Mean values followed by the same letter are not significantly different at P≤0.01 according to an S-N-K test.

Zingiber officinale
Ginger

'Buderim Gold'

Application No: 2000/161 Accepted: 8 Jun 2000.
Applicant: **The State of Queensland through its Department of Primary Industries**, Brisbane, QLD.

Characteristics (Table 50, Figure 37) Ploidy: autotetraploid (4n = 44). Plant: height tall (mean 84.2cm), number of stems few (mean 7.2), attitude of top leaf semi-erect, number of leaves on main stem many (mean 23.3). Leaf: length medium (mean 26.6cm), width broad (mean 3.72cm), intensity of green colour dark. Stem: diameter medium, thickened at the base (mean diameter 1.39cm), anthocyanin colouration at base medium. Rhizome: total weight high (mean 910.2g), shape type III (zigzagged rhizome with low density of sections), skin colour greenish-yellow, texture of surface medium-rough, number of sections low (mean 57.3), size of sections large (mean 16.9g), colour of flesh yellow, time of harvest maturity medium.

Origin and Breeding Induced tetraploid selection: following application of colchicine to *in vitro* shoot tips of 'Queensland' (2n = 22). Autotetraploid ginger was first established on the basis of altered morphology, particularly the size of the stomata. Putative tetraploids were grouped and the chromosome numbers were determined from a root-tip squash. Selection criteria: leaf and stem size, stomata size (primary); rhizome weight and size of sections, retention of flavour and aroma characteristics (secondary). Propagation: tissue culture and rhizome, stable for more than nine generations. Breeders: MK Smith and SD Hamill, Nambour, QLD.

Choice of Comparators Grouping characteristics used in identifying the most similar varieties of common knowledge were – Rhizome: colour of flesh yellow, shape type III, size of sections large. On the basis of this grouping, 'Canton' was chosen as the most similar variety. 'Queensland' was chosen because it is the original parent treated to increase ploidy. Both 'Canton' and 'Queensland' are diploids (2n = 22) and are varieties of common knowledge.

Comparative Trial Location: Nambour, QLD Oct. 1999 – May 2000, Sept. 2000 – April 2001; the trial was conducted over 2 separate seasons but at the same location. Conditions: plants were grown from high quality rhizome sections (80-100gm) in a sandy loam; plants were grown in a 3-row bed, with 20cm between plants along the row and 30cm between rows; plants were grown under commercial conditions. Trial design: randomised complete block design. Measurements: 30 plants. Observations were made on mature plants at flowering.

Prior Applications and Sales Nil.

Description: **AW Whiley,** Queensland Department of Primary Industries, Nambour, QLD.

Table 50 *Zingiber* varieties

	'Buderim Gold'	***'Queensland'**	***'Canton'**
PLOIDY			
	tetraploid (4n = 44)	diploid (2n = 22)	diploid (2n = 22)
PLANT HEIGHT (cm)			
mean	84.2	76.9	74.3
std deviation	8.9	12.0	7.1
LSD/sig	8.3	ns	P≤0.01
NUMBER OF STEMS			
mean	7.2	15.4	10.3
std deviation	1.3	4.3	2.8
LSD/sig	1.92	P≤0.01	P≤0.01
LEAF WIDTH (cm) upper third of stem			
mean	3.72	2.83	2.80
std deviation	0.19	0.31	0.22
LSD/sig	0.19	P≤0.01	P≤0.01
LEAF: INTENSITY OF GREEN COLOUR			
	dark green	light green	light green
STEM DIAMETER (cm) 5cm from soil level			
mean	1.39	1.07	1.05
std deviation	0.12	0.15	0.13
LSD/sig	0.11	P≤0.01	P≤0.01
RHIZOME: TEXTURE OF SURFACE			
	medium-rough	medium-rough	smooth
RHIZOME: NUMBER OF SECTIONS			
mean	57.3	122.4	63.7
std deviation	14.6	45.1	22.2
LSD/sig	46.0	P≤0.01	ns
RHIZOME: SIZE OF SECTIONS (g)			
mean	16.9	9.4	14.7
std deviation	1.6	1.5	1.6
LSD/sig	2.13	P≤0.01	P≤0.01

GRANTS

Abelia grandiflora
Abelia

'Short & Sweet'(Þ)
Application No: 1999/211 Grantee: **Robert Pearce**, Mcleans Ridge Via Lismore, NSW.
Certificate No: 1930 Expiry Date: 28 March, 2022.

Agapanthus inapertus x *Agapanthus orientalis*
Agapanthus

'Blue Brush'(Þ)
Application No: 1999/271 Grantee: **Lifetech Laboratories Limited**.
Certificate No: 1949 Expiry Date: 28 March, 2022.
Agent: **Avondale Nurseries Ltd**, Glenorie, NSW.

Agapanthus orientalis
Agapanthus

'Glen Avon'(Þ) syn **Summer Blue**(Þ)
Application No: 1998/147 Grantee: **Lifetech Laboratories Limited**.
Certificate No: 1948 Expiry Date: 28 March, 2022.
Agent: **Avondale Nurseries Ltd**, Glenorie, NSW.

'Lavender Haze'(Þ)
Application No: 1999/272 Grantee: **R J & D M L Wood**.
Certificate No: 1950 Expiry Date: 28 March, 2022.
Agent: **Avondale Nurseries Ltd**, Glenorie, NSW.

'Regal Beauty'(Þ)
Application No: 1999/273 Grantee: **R J & D M L Wood**.
Certificate No: 1951 Expiry Date: 28 March, 2022.
Agent: **Avondale Nurseries Ltd**, Glenorie, NSW.

'Snow Cloud'(Þ) **syn Summer Pearl**(Þ)
Application No: 1998/146 Grantee: **Lifetech Laboratories Limited**.
Certificate No: 1947 Expiry Date: 28 March, 2022.
Agent: **Avondale Nurseries Ltd**, Glenorie, NSW.

Argyranthemum frutescens
Marguerite Daisy

'Amy Belle'(Þ)
Application No: 1997/154 Grantee: **Frank Hammond**, Narre Warren East, VIC.
Certificate No: 1895 Expiry Date: 21 January, 2022.

Avena sativa
Oats

'Nugene'(Þ)
Application No: 1998/259 Grantee: **NDSU Research Foundation**.
Certificate No: 1896 Expiry Date: 21 January, 2022.
Agent: **The State of Queensland through its Department of Primary Industries**, Toowoomba, QLD.

Brachyscome hybrid
Brachyscome

'Mauve Mystique'(Þ)
Application No: 2000/121 Grantee: **Pacific Plant Development Pty Ltd**, Buxton, NSW.
Certificate No: 1932 Expiry Date: 28 March, 2022.

Brassica napus var. *oleifera*
Canola

'44C71'(Þ)
Application No: 2000/091 Grantee: **Pioneer Hi-Bred International, Inc.**.
Certificate No: 1916 Expiry Date: 27 March, 2022.
Agent: **Pioneer Hi-Bred Australia Pty Ltd**, Toowoomba, QLD.

'46C03'(Þ)
Application No: 2000/199 Grantee: **Pioneer Hi-Bred International, Inc.**.
Certificate No: 1922 Expiry Date: 27 March, 2022.
Agent: **Pioneer Hi-Bred Australia Pty Ltd**, Toowoomba, QLD.

'ATR-Grace'(Þ)
Application No: 1999/344 Grantee: **Agriculture Victoria Services Pty Ltd and Grains Research and Development Corporation**.
Certificate No: 1912 Expiry Date: 27 March, 2022.
Agent: **Ag-Seed Research Pty Ltd**, Horsham, VIC.

'ATR-Hyden'(Þ)
Application No: 1999/349 Grantee: **Ag-Seed Research Pty Ltd**, Horsham, VIC.
Certificate No: 1914 Expiry Date: 27 March, 2022.

'TM8'(Þ)
Application No: 1999/346 Grantee: **Agriculture Victoria Services Pty Ltd and Grains Research and Development Corporation**.
Certificate No: 1913 Expiry Date: 27 March, 2022.
Agent: **Ag-Seed Research Pty Ltd**, Horsham, VIC.

'AG Outback'(Þ)
Application No: 2000/266 Grantee: **Ag-Seed Research Pty Ltd**, Horsham, VIC.
Certificate No: 1903 Expiry Date: 25 January, 2022.

'Insignia'(Þ)
Application No: 1999/169 Grantee: **Ag-Seed Research Pty Ltd**, Horsham, VIC.
Certificate No: 1898 Expiry Date: 25 January, 2022.

'Trooper'(Þ)
Application No: 1999/170 Grantee: **Ag-Seed Research Pty Ltd**, Horsham, VIC.
Certificate No: 1899 Expiry Date: 25 January, 2022.

Ceratopetalum gummiferum
New South Wales Christmas Bush

'Bill Winter'Ⓟ
Application No: 1999/033 Grantee: **Kay Winter, Vic Ciccolella and Yellow Rock Native Nursery Pty Ltd**.
Certificate No: 1940 Expiry Date: 28 March, 2022.
Agent: **Yellow Rock Native Nursery Pty Ltd**, Winmalee, NSW.

Chamelaucium megalopetalum **x** *Chamelaucium uncinatum*
Waxflower

'Albany Pearl'Ⓟ
Application No: 1998/097 Grantee: **State of Western Australia through its Department of Agriculture**, South Perth, WA.
Certificate No: 1909 Expiry Date: 25 January, 2022.

'Denmark Pearl'Ⓟ
Application No: 1998/096 Grantee: **State of Western Australia through its Department of Agriculture**, South Perth, WA.
Certificate No: 1908 Expiry Date: 25 January, 2022.

'Esperance Pearl'Ⓟ
Application No: 1997/138 Grantee: **State of Western Australia through its Department of Agriculture**, South Perth, WA.
Certificate No: 1906 Expiry Date: 25 January, 2022.

Chamelaucium uncinatum
Waxflower

'Jurien Brook'Ⓟ
Application No: 1997/140 Grantee: **State of Western Australia through its Department of Agriculture**, South Perth, WA.
Certificate No: 1907 Expiry Date: 25 January, 2022.

Cuphea hyssopifolia
False Feather

'Lemon Squash'Ⓟ
Application No: 2000/123 Grantee: **The Shadehouse Nursery**, Blackstone, QLD.
Certificate No: 1941 Expiry Date: 28 March, 2022.

Euphorbia pulcherrima
Poinsettia

'Duepre'Ⓟ
Application No: 2001/148 Grantee: **Marga Dummen**.
Certificate No: 1938 Expiry Date: 28 March, 2022.
Agent: **F & I Baguley Flower & Plant Growers**, Clayton South, VIC.

Festuca arundinacea
Tall Fescue

'Prosper'Ⓟ
Application No: 2000/039 Grantee: **Barenbrug Holland BV**.
Certificate No: 1900 Expiry Date: 25 January, 2022.
Agent: **Heritage Seeds Pty Ltd**, Mulgrave, VIC.

Gossypium hirsutum
Cotton

'Sicala V-3RRi'Ⓟ
Application No: 2000/324 Grantee: **CSIRO**, Canberra, ACT.
Certificate No: 1928 Expiry Date: 27 March, 2022.

'Sicot 289i'Ⓟ
Application No: 2000/280 Grantee: **CSIRO**, Canberra, ACT.
Certificate No: 1923 Expiry Date: 27 March, 2022.

'Sicot 70'Ⓟ
Application No: 2000/282 Grantee: **CSIRO**, Canberra, ACT.
Certificate No: 1925 Expiry Date: 27 March, 2022.

'Sicot 72'Ⓟ
Application No: 2000/283 Grantee: **CSIRO**, Canberra, ACT.
Certificate No: 1926 Expiry Date: 27 March, 2022.

'Siokra S-102'Ⓟ
Application No: 2000/284 Grantee: **CSIRO**, Canberra, ACT.
Certificate No: 1927 Expiry Date: 27 March, 2022.

'Siokra V-16i'Ⓟ
Application No: 2000/281 Grantee: **CSIRO**, Canberra, ACT.
Certificate No: 1924 Expiry Date: 27 March, 2022.

Hordeum vulgare
Barley

'Lofty Nijo'Ⓟ
Application No: 2000/167 Grantee: **Sapporo Breweries Limited**.
Certificate No: 1952 Expiry Date: 28 March, 2022.
Agent: **Luminis Pty Ltd**, Adelaide, SA.

Lavandula angustifolia
English Lavender

'Avice Hill'Ⓟ syn **Impression**Ⓟ
Application No: 1998/110 Grantee: **Lavenite Enterprises**.
Certificate No: 1897 Expiry Date: 25 January, 2022.
Agent: **Wyvee Horticultural Services**, Lilydale, VIC.

Lechenaultia hybrid
Lechenaultia

'Kings Park Spirit of Suffrage'Ⓟ
Application No: 1999/215 Grantee: **Botanic Gardens and Parks Authority**, West Perth, WA.
Certificate No: 1931 Expiry Date: 28 March, 2022.

Mimusops elengi
Spanish Cherry

'Street Elegance'(Þ)
Application No: 2000/192 Grantee: **Darwin Plant Wholesalers**, Winnellie, NT.
Certificate No: 1933 Expiry Date: 28 March, 2027.

Prunus persica
Peach

'Ivory Princess'(Þ) syn **Ivory White**(Þ)
Application No: 2000/270 Grantee: **Lowell G Bradford and Norman G Bradford**.
Certificate No: 1936 Expiry Date: 28 March, 2027.
Agent: **Buchanan's Nursery**, Hodgson Vale, QLD.

'Snowbrite'(Þ)
Application No: 1998/125 Grantee: **Zaiger's Inc. Genetics**.
Certificate No: 1939 Expiry Date: 28 March, 2027.
Agent: **Fleming's Nurseries & Associates Pty Ltd**, Monbulk, VIC.

Prunus persica var. *nucipersica*
Nectarine

'Arctic Pride'(Þ)
Application No: 1998/124 Grantee: **Zaiger's Inc. Genetics**.
Certificate No: 1946 Expiry Date: 28 March, 2027.
Agent: **Fleming's Nurseries & Associates Pty Ltd**, Monbulk, VIC.

'August Pearl'(Þ) syn **August Ice**(Þ)
Application No: 2000/268 Grantee: **Lowell G Bradford and Norman G Bradford**.
Certificate No: 1934 Expiry Date: 28 March, 2027.
Agent: **Buchanan's Nursery**, Hodgson Vale, QLD.

'Fire Sweet'(Þ) syn **Fire Gold**(Þ)
Application No: 2000/269 Grantee: **Lowell G Bradford and Norman G Bradford**.
Certificate No: 1935 Expiry Date: 28 March, 2027.
Agent: **Buchanan's Nursery**, Hodgson Vale, QLD.

'Kay Pearl'(Þ) syn **Kay Ice**(Þ)
Application No: 2000/271 Grantee: **Lowell G Bradford and Norman G Bradford**.
Certificate No: 1937 Expiry Date: 28 March, 2027.
Agent: **Buchanan's Nursery**, Hodgson Vale, QLD.

Prunus persica x Prunus davidiana
Peach

'Avimag'(Þ)
Application No: 1995/250 Grantee: **Agri Obtentions**.
Certificate No: 1945 Expiry Date: 28 March, 2027.
Agent: **Fleming's Nurseries & Associates Pty Ltd**, Monbulk, VIC.

Rosa hybrid
Rose

'Panroug'(Þ) syn **Red Calypso**(Þ)
Application No: 2000/205 Grantee: **Panorama Roses N.V.**.
Certificate No: 1942 Expiry Date: 28 March, 2022.
Agent: **Grandiflora Nurseries Pty Ltd**, Cranbourne, VIC.

'Tanarua'(Þ)
Application No: 2000/294 Grantee: **Rosen Tantau, Mathias Tantau Nachfolger**.
Certificate No: 1904 Expiry Date: 25 January, 2022.
Agent: **Anton Buskermolen**, Catherine Field, NSW.

'Tanotika'(Þ)
Application No: 2000/296 Grantee: **Rosen Tantau, Mathias Tantau Nachfolger**.
Certificate No: 1905 Expiry Date: 25 January, 2022.
Agent: **Anton Buskermolen**, Catherine Field, NSW.

Saccharum hybrid
Sugarcane

'Q194'(Þ)
Application No: 2000/180 Grantee: **Bureau of Sugar Experiment Stations**, Bundaberg, QLD.
Certificate No: 1920 Expiry Date: 27 March, 2022.

'Q195'(Þ)
Application No: 2000/181 Grantee: **Bureau of Sugar Experiment Stations**, Bundaberg, QLD.
Certificate No: 1921 Expiry Date: 27 March, 2022.

Syzygium francisii
Giant Water Gum

'Little Gem'(Þ)
Application No: 2000/326 Grantee: **Russell and Sharon Costin**, Limpinwood, NSW.
Certificate No: 1944 Expiry Date: 28 March, 2027.

Syzygium wilsonii subsp. wilsonii x *Syzygium leuhmanii*
Lilly Pilly

'Cascade'(Þ)
Application No: 2000/302 Grantee: **Russell and Sharon Costin**, Limpinwood, NSW.
Certificate No: 1943 Expiry Date: 28 March, 2022.

Trifolium repens
White Clover

'Mink'(Þ)
Application No: 2000/031 Grantee: **Agriculture Victoria Services Pty Ltd, Dairy Research and Development Corporation and AgriSeeds Holdings Ltd**.
Certificate No: 1915 Expiry Date: 27 March, 2022.
Agent: **Agriculture Victoria Services Pty Ltd**, Attwood, VIC.

Triticum aestivum
Wheat

'Anlace'Φ
Application No: 1999/089 Grantee: **Luminis Pty Ltd and Grains Research and Development Corporation**, Adelaide, SA.
Certificate No: 1911 Expiry Date: 27 March, 2022.

'Babbler'Φ
Application No: 2000/143 Grantee: **Department of Agriculture for and on behalf of the State of New South Wales and Grains Research and Development Corporation**.
Certificate No: 1919 Expiry Date: 27 March, 2022.
Agent: **SGB Australia Ltd**, Melbourne, VIC.

'Clearfield WHT JNZ'Φ
Application No: 2000/102 Grantee: **State of Western Australia through its Department of Agriculture**, South Perth, WA.
Certificate No: 1901 Expiry Date: 25 January, 2022.

'Clearfield WHT STL'Φ
Application No: 2000/103 Grantee: **State of Western Australia through its Department of Agriculture**, South Perth, WA.
Certificate No: 1902 Expiry Date: 25 January, 2022.

'Koelbird'Φ
Application No: 2001/017 Grantee: **Department of Agriculture for and on behalf of the State of New South Wales**.
Certificate No: 1929 Expiry Date: 27 March, 2022.
Agent: **Moree Seed Graders Pty Ltd**, Moree, NSW.

'Mulgara'Φ
Application No: 2000/125 Grantee: **Department of Agriculture for and on behalf of the State of New South Wales**, Orange, NSW.
Certificate No: 1917 Expiry Date: 27 March, 2022.

'Thornbill'Φ
Application No: 2000/142 Grantee: **Department of Agriculture for and on behalf of the State of New South Wales and Grains Research and Development Corporation**.
Certificate No: 1918 Expiry Date: 27 March, 2022.
Agent: **Sunprime Seeds Pty Ltd**, Dubbo, NSW.

Vitis vinifera
Grape

'BW 41/5'Φ
Application No: 1996/018 Grantee: **Andriske Table Grapes Pty Ltd**, Gol Gol, NSW.
Certificate No: 1910 Expiry Date: 27 March, 2027.

DENOMINATION CHANGED

Chamelaucium megalopetalum x *Chamelaucium uncinatum*
Waxflower

'Bridal Pearl'
Application No: 2001/028
From: 'WX10'

'Pastel Gem'
Application No: 2001/029
From: 'WX13'

Chamelaucium uncinatum x *Chamelaucium megalopetalum*
Waxflower

'Purple Gem'
Application No: 2000/050
From: 'WX14'

Hordeum vulgare
Barley

'Binalong'
Application No: 2001/009
From: 'B%1302'

Santalum acuminatum
Sweet Quandong

'Powells #1'
Application No: 1992/157
From: 'Powell's Number One'

Triticum aestivum
Wheat

'Rubric'
Application No: 2001/002
From: 'HS 5170'

Vitis vinifera
Grape

'Shirana'
Application No: 2001/147
From: 'S67'

CHANGE OF ASSIGNMENT

From: P & A Taverna and RJ & S Tulloch
To: **Quorn Quandong Pty Ltd**

for the following PBR application:

Santalum acuminatum
Sweet Quandong

'Powell's #1'
Application No: 1992/157

From: Joseph H Tucker
To: **Michael Snow**

for the following PBR application:

Prunus persica
Peach

'Tucker's' syn **Tucker's Autumn Blush**
Application No: 1996/109

CHANGE OF APPLICANT'S NAME

From: Consort Deutsch Baum Pflazenhandelge mbH
To: **Consortium Deutscher Baumschulen GmbH**

for the following PBR application:

Prunus cerasus x *Prunus canescens*
Cherry

'Gisela 6' syn **G I 148/1**
Application No: 1998/164

From: Consortium Deutscher Baumschulen
To: **Consortium Deutscher Baumschulen GmbH**

for the following PBR application:

Prunus cerasus x *Prunus canescens*
Cherry

'Gisela 5' syn **GI 148/2**
Application No: 1996/155

From: Minister for Primary Industries
To: **Minister for Agriculture, Food and Fisheries**

for all the PBR applications that previously included Minister for Primary Industries as the applicant or the joint applicant

From: Pepinieres & Roseraies Georges Delbard
To: **Societe Anonyme des Pepinieres et Roseraies GEORGES DELBARD**

for the following PBR applications:

Malus domestica
Apple

'Delblush'ф
Application No: 1997/074 Certificate No: 1288

'Delkistar'
Application No: 1997/158

From: Pepinieres & Roseraies Georges Delbard Societe Anonyme
To: **Societe Anonyme des Pepinieres et Roseraies GEORGES DELBARD**

for the following PBR application:

Prunus avium
Sweet Cherry

'Rivedel'
Application No: 2000/040

NOMINATION OF AGENT

'Sunprime Seeds Pty Ltd. has been nominated as the agent for the following PBR applications for which **The University of Sydney and Grains Research and Development Corporation** are the joint applicants.

Triticum aestivum
Wheat

'Braewood'
Application No: 2001/006

'Sunbrook'ф
Application No: 1996/058 Certificate No: 1128

'Sunland'ф
Application No: 1996/060 Certificate No: 1130

'Sunsoft 98'
Application No: 1999/151

'Sunstate'ф
Application No: 1993/127 Certificate No: 1131

'Sunvale'ф
Application No: 1996/059 Certificate No: 1129

CHANGE OF AGENT

From: Breeders Rights International Pty Ltd
To: **ANFIC (Australian Nurserymen's Fruit Improvement Cooperative Ltd)**
for the following PBR application:

Prunus persica
Peach

'Tucker's' syn **Tucker's Autumn Blush**
Application No: 1996/109

From: Gladland Flowers
To: **Sprint Horticulture**
for the following PBR applications:

Euphorbia pulcherrima
Poinsettia

'Fiscor'(Þ) syn **Cortez Red'**(Þ)
Application No: 1998/189 Certificate No: 1491

'Fiscor Creme'(Þ) syn **Cortez White**(Þ)
Application No: 1998/190 Certificate No: 1488

TERMINATION OF AGENT

Florabundance Wholesale Nursery is no longer acting as an agent for the following PBR application:

Brunfelsia latifolia
Brunfelsia

'Sweet & Petite'
Application No: 1998/176

Mr Ian Aberdeen is no longer acting as an agent for the following PBR applications.

Lolium perenne
Perennial Ryegrass

'Arena 1'
Application No: 1999/188

'Checkmate'
Application No: 1999/187

APPLICATIONS WITHDRAWN

The following varieties are no longer under provisional protection:

Brassica napus var. *oleifera*
Canola

'AV-Fortress'
Application No: 2001/310.

Carica papaya
Pawpaw

'Oz Red'
Application No: 2000/316.

Chamelaucium uncinatum
Waxflower

'WX03'
Application No: 2000/047.

'WX05'
Application No: 2000/048.

Codiaeum variegatum
Variegated Croton

'Cleopatra'
Application No: 2001/032.

Dodonaea subglandulifera
Hop Bush

'Fire Bush'
Application No: 1998/085.

Impatiens wallerana
Impatiens

'Golden Delight'
Application No: 2000/215.

Poa annua
Creeping Bluegrass

'MN 117'
Application No: 1997/221.

Rosa hybrid
Rose

'Meicobuis'
Application No: 1999/064.

Trifolium resupinatum var. *majus*
Persian Clover

'Morbulk'
Application No: 1997/240.

Triticum aestivum
Wheat

'QT8620'
Application No: 2001/071.

GRANTS SURRENDERED

The following varieties are no longer under PBR protection:

Alstroemeria hybrid
Peruvian Lily

'Stalbel' syn **Libelle**
Application No: 1989/105 Certificate No: 129

'Stalsam' syn **Samora**
Application No: 1989/110 Certificate No: 125

Anthurium scherzerianum
Flamingo Flower

'Arabella' syn **Arndt's Flamenco Arabella**
Application No: 1990/118 Certificate No: 140

x*Cupressocyparis*
Cupressocyparis

'Atlas'
Application No: 1993/037 Certificate No: 696

Fragaria x*ananassa*
Strawberry

'Parker'
Application No: 1989/072 Certificate No: 246

Hordeum vulgare
Barley

'Molloy'
Application No: 1996/246 Certificate No: 961

'Morrell'
Application No: 1993/230 Certificate No: 521

'Picola'
Application No: 1996/075 Certificate No: 1039

Juniperus conferta
Shore Juniper

'NO. 001'
Application No: 1996/267 Certificate No: 1160

Limonium hybrid
Limonium

'Daicean' syn **Ocean Blue**
Application No: 1992/057 Certificate No: 382

Lolium multiflorum
Italian Ryegrass

'Cordura'
Application No: 1993/070 Certificate No: 510

Lolium perenne
Perennial Ryegrass

'Cobber' syn **Mirasol**
Application No: 1994/034 Certificate No: 1178

'Embassy'
Application No: 1991/027 Certificate No: 509

Lonicera nitida
Box Honeysuckle

'Little Nikki'
Application No: 1999/159 Certificate No: 1645

Pisum sativum
Field Pea

'King'
Application No: 1997/110 Certificate No: 1164

'Magnet'
Application No: 1997/109 Certificate No: 1163

Rosa hybrid
Rose

'Nirpstrip' syn **Shiba**
Application No: 1997/217 Certificate No: 1453

'Ruialex' syn **Red Festival**
Application No: 1994/029 Certificate No: 778

'Ruicharm' syn **Charming Festival**
Application No: 1994/024 Certificate No: 776

'Ruigal' syn **Milana Festival**
Application No: 1994/027 Certificate No: 777

Scaevola aemula
Fanflower

'Rhapsody'
Application No: 1999/035 Certificate No: 1694

'Sweet Serenade'
Application No: 1999/034 Certificate No: 1695

Trifolium brachycalcinum
Subterranean Clover

'Nuba'
Application No: 1990/004 Certificate No: 88

Triticum aestivum
Wheat

'Amery'
Application No: 1993/229 Certificate No: 972

'Kalannie'
Application No: 1996/248 Certificate No: 975

'Nyabing'
Application No: 1997/123 Certificate No: 1210

'Perenjori'
Application No: 1996/249 Certificate No: 973\

'Stretton'
Application No: 1993/228 Certificate No: 967

'Tammin'
Application No: 1995/074 Certificate No: 969

x*Triticosecale*
Triticale

'Abacus'
Application No: 1991/112 Certificate No: 200

GRANTS REVOKED

The PBR grant for the following application has been revoked under subsection 50(1) (b) of the *Plant Breeder's Rights Act 1994*. It is no longer under PBR protection.

Alstroemeria hybrid
Peruvian Lily

'Staylor' syn **Helios**
Application No: 1990/259 Certificate No: 368

CORRIGENDA

Brassica napus var. *oleifera*
Canola

'Surpass 603CL'
Application No: 2000/320

Journal Reference PVJ 14(4) p.25

In the **Characteristics** section, the plant height should be 173cm instead of 73cm as published. In the **Comparative Trial** section, the sowing date should be 14 May 2001 instead of 14 Nov 2000 as published.

Ceratopetalum gummiferum
New South Wales Christmas Bush

'Bill Winter'
Application Number: 1999/033

'Festival'
Application Number: 1999/032

Journal Reference: PVJ 14.2, page 30, Table 5

The superscript for Leaflet Length of 'Albery's Red' should read "a" not "c".
The superscript for Leaflet Width of 'Albery's Red' should read "a" not "ab"

Impatiens hybrid
Impatiens

'Kiala' syn **Moala**
Journal Reference: PVJ 13.3 page 59

In the **Comparative Table** (Table 29) sufficient data was not provided to show that this variety is distinctly different from one of its comparators 'Prep' syn Prepona. Therefore, a re-examination of this variety was carried out in Feb 2002 with a side by side comparison of 'Kiala' syn Moala with 'Prep' syn Prepona with the following results:

	'Kiala' syn **Moala**	***'Prep'** syn **Prepona**
FLOWER COLOUR (RHS, 1995)	darker than 45A	45A
LEAF COLOUR – upper side (RHS, 1995)	137A	147A
VEIN COLOUR upper side (RHS, 1995)	187B	184B
PETAL INCISIONS	medium	shallow –medium

Note: There is no exact RHS colour chart match for flower colour of 'Kiala'. It has darker flower colour than 'Prep' (RHS 45A), which is visible to naked eye even from a distance of 10m.

Ornithopus compressus
Serradella

'Charano'
Application Number: 1997/176

Journal Reference: PVJ 10.3 page 51
At the end of the **Origin** section the following supplementary information should be added:

To provide additional proof of "breeding" as defined by the *Plant Breeders Rights Act 1994*, a re-collection from the original site was undertaken by Dr M. E. Ewing (an original collector) and Mr. G. Sandral in 2000. This provided 90 detached pods randomly selected to provide a representation of the population at the site. A single seed was removed from each pod and grown in a single plant nursery along with 38 individual 'Charano' plants.

'Charano' can be described as having an upright habit, yellow flowers and relatively straight, red pods. In this experiment 34 of the 38 'Charano" plants closely matched this description with the outliers mainly having a more curled pod type. Only one individual of the Mykonos population matched this description. Also 'Charano' plants were consistently larger than the Mykonos population.

		Mykonos population (site 87GEH56)	**'Charano'**
TOTAL NUMBER OF PLANTS		90	38
FLOWER COLOUR	% orange	47	0
	% yellow	53	100
POD COLOUR	% pale tan	74	3
	% red	26	97
POD SHAPE	% curled	97	8
	% straight	3	92
GROWTH HABIT (SPRING)			
	% prostrate	41	0
	% intermediate	57	0
	% upright	2	100
PLANT DIAMETER 2/9/01 (cm)		44 +/- 2	87 +/- 2
WHOLE PLANT DRY MATTER (g)		468 +/- 14	633 +-15

APPENDIX 1

FEES

Two fee structures exist as a result of the transition from Plant Variety Rights to Plant Breeders Rights.
For new applications (those lodged on or after 11 November 1994) the PBR fees apply. For older applications lodged before 11 November 1994 and not finally disposed of (Granted, Withdrawn, Refused etc.) the PVR fees in force at the time apply.

The Treasurer has determined that all statutory fees under PBR regulations will be exempted from GST.

Payment of Fees
All cheques for fees should be made payable and sent to:

Collector of Public Monies
C/-Plant Breeders Rights Office
GPO Box 858
Canberra, ACT 2601

The **application fee** ($300) must accompany the application at the time of lodgement.

Consequences of not paying fees when due
Application fee
Should an application not be accompanied by the prescribed application fee the application will be deemed to be 'non-valid' and neither assigned an application number nor examined for acceptance pending the payment of the fee.

Examination fee
Non-payment of the examination fee of an application will automatically result, at the end of 12 months from the date of acceptance, in a refusal of the application. The consequences of refusal are the same as for applications deemed to be inactive (see 'inactive applications' below).

Consideration of a request for an extension of the period of provisional protection from the initial 12-month period may require the prior payment of the examination fee.

Certificate fee
Following the successful completion of the examination, including the public notice period, the applicant will be required and invoiced to pay the certification fee. Payment of the certification fee is a prerequisite to granting PBR and issuing the official certificate by the PBR office. Failure to pay the fee may result in a refusal to grant PBR.

Annual fee
Should an annual renewal fee not be paid within 30 days after the due date, the grant of PBR will be revoked under Section 50 of the PBR Act. To assist grantees, the PBR office will invoice grantees or their Australian agents for renewal fees.

Inactive applications
An application will be deemed inactive if, after 24 months of provisional protection (or 12 months in the case of non-payment of the examination fee) the PBR Office has not received a completed application or has not been advised to proceed with the examination or an extension of provisional protection has not been requested or not granted or a certificate fee has not been paid. Inactive applications will be examined and, should they not fully comply with Section 44 of the PBR Act 1994, they will be refused. As a result provisional protection will lapse, priority claims on that variety will be lost and should the variety have been sold, it will be ineligible for plant breeders rights on reapplication. Continued use of labels or any other means to falsely imply that a variety is protected after the application has been refused is an offence under Section 75 of the Act.

FEES

Basic Fees	Schedule A	B	C	D
$				
Application	300	300	400	300
Examination – per application	1400	1200	1400	800
Certificate	300	300	250	300
Total Basic Fees	2000	1800	2050	1400
Annual Renewal – all applications	300			

Schedule

A Single applications and applications based on an official overseas test reports.

B Applicable when two or more Part 2 Applications are lodged simultaneously and the varieties are of the same genus and the examinations can be completed at one location at the same time.

C Applications lodged under PVR (prior to 10th Nov 1994)

D Applicable to 5 or more applications examined at an Accredited Centralised Testing Centre

Other Fees

Variation to application(s) – per hour or part thereof	75
Change of Assignment – per application	100
Copy of an application (Part1 and/or Part2), an objection or a detailed description	50
Copy of an entry in the Register	50
Lodging an objection	100
Annual subscription to Plant Varieties Journal	40
Back issues of Plant Varieties Journal	14
Administration – Other work relevant to PBR – per hour or part thereof	75
Application for declaration of essential derivation	800
Application for (a) revocation of a PBR	500
(b) revocation of a declaration of essential derivation	500
Compulsory licence	500
Request under subsection 19(11) for exemption from public access – varieties with no direct use as a consumer	

APPENDIX 2

Plant Breeders Rights Advisory Committee (PBRAC)

(Members of the PBRAC hold office in accordance with Section 85 of the *Plant Breeder's Rights Act 1994*.)

Dr Paul **Brennan**
PO Box 144
LENNOX HEAD NSW 2478
Representing Plant Breeders

Ms Cheryl **McCaffery**
Proprietor
Eclipse IP Management
PO Box 2221 Milton Business Centre
MILTON QLD 4064
Member with appropriate qualifications and experience

Mr David **Moore**
Consultant
Applied Economic and Technology Services
PO Box 193
GAWLER, SA 5118
Representing consumers

Mr Peter **Neilson**
Crop and Food Research
Birrabee Park
Bowna via
ALBURY NSW 2640
Representing Plant Breeders

Mr Hugh **Roberts**
Farmer
'Birralee'
COOTAMUNDRA NSW 2694
Representing Users

Ms Anna **Sharpe**
Clayton Utz
GPO Box 55
BRISBANE QLD 4000
Member with appropriate qualifications and experience

Mr Doug **Waterhouse** (Chair)
Registrar, Plant Breeders Rights
GPO Box 858
CANBERRA ACT 2601

Comments on the technical operation of, or amendments to, the *Plant Breeder's Rights Act 1994*, particularly applications under section 17(2), should be directed through the Chairman.

31st MEETING OF THE PLANT BREEDER'S RIGHTS ADVISORY COMMITTEE (PBRAC)

The 31st meeting of the Plant Breeder's Rights Advisory Committee (PBRAC) was held in Canberra on 7 March 2002.

Key matters discussed were:

The Plant Breeder's Rights Amendment Bill 2002

PBRAC supported the Government's decision to introduce the proposed amendments to the PBR Act.

US Patents and Trademark Office (USPTO) Administrative Change

PBRAC noted the need to continue to monitor developments regarding US administrative procedures regarding asexually reproduced plant varieties.

International Treaty on Plant Genetic Resources for Food and Agriculture

PBRAC ***noted*** the need for an extensive consultation process regarding possible accession to this treaty, which deals with important issues on access to plant genetic resources.

International Acceptance of Australia's Plant Protection Standards

PBRAC noted that Australian participation at UPOV meetings is necessary to protect vital Australian interests.

Expert Panel Report Clarifying Plant Breeding Issues

PBRAC ***noted*** that the draft report of the Expert Panel clarifying certain breeding issues is open for public comment. The Committee was of the view that the section on essentially derived varieties could be expected to draw most comment.

APPENDIX 3

INDEX OF ACCREDITED CONSULTANT 'QUALIFIED PERSONS'

The following persons have been accredited by the PBR office based on information provided by these persons. From the information provided by the applicants, the PBR office believes that these people can fulfil the role of 'qualified person' in the application for plant breeder's rights. Neither accreditation nor publication of a name in the list of persons is an implicit recommendation of the person so listed. The PBR office cannot be held liable for damages that may arise from the omission or inclusion of a person's name in the list nor does it assume any responsibility for losses or damages arising from agreements entered into between applicants and any person in the list of accredited persons. Qualified persons charge a fee for services rendered.

A guide to the use of the index of consultants:

- locate in the left column of Table 1 the plant group for which you are applying;
- listed in the right column are the names of accredited qualified persons from which you can choose a consultant;
- in Table 2 find that consultant's name, telephone number and area in which they are willing to consult (they may consult outside the nominated area);
- using the "Nomination of Qualified Person" form as a guide, agree provisionally on the scope and terms of the consultancy; complete the form and attach it to Part 1 of the application form;
- when you are notified that your nomination of a consultant qualified person is acceptable in the letter of acceptance of your application for PBR you should again consult the qualified person when planning the rest of the application for PBR.

TABLE 1

PLANT GROUP/ SPECIES/ FAMILY	CONSULTANT'S NAME (TELEPHONE AND AREA IN TABLE 2)
Almonds	Swinburn, Garth
Apple	Baxter, Leslie Darmody, Liz Fleming, Graham Langford, Garry Mackay, Alastair Maddox, Zoee Malone, Michael Mitchell, Leslie Portman, Anthony Pullar, David Robinson, Ben Scholefield, Peter Stearne, Peter Tancred, Stephen Valentine, Bruce
Anigozanthos	Paananen, Ian Kirby, Greg Smith, Daniel
Aroid	Harrison, Peter
Avocado	Swinburn, Garth
Azalea	Barrett, Mike Hempel, Maciej Paananen, Ian
Barley (Common)	Boyd, Rodger Brouwer, Jan Collins, David Khan, Akram
Berry Fruit	Darmody, Liz Fleming, Graham Maddox, Zoee Pullar, David Robinson, Ben Scholefield, Peter
Blueberry	Pullar, David
Bougainvillea	Iredell, Janet Willa
Brassica	Aberdeen, Ian Baker, Andrew Chequer, Robert Cross, Richard Easton, Andrew Fennell, John Kadkol, Gururaj Light, Kate McMichael, Prue Pullar, David Robinson, Ben Rudolph, Paul Sanders, Milton Scholefield, Peter Young, Heidi
Buddleia	Robb, John Paananen, Ian
Camellia	Paananen, Ian Robb, John
Cereals	Brouwer, Jan Bullen, Kenneth Collins, David Cook, Bruce Cooper, Kath Cross, Richard Davidson, James Derera, Nicholas AM Downes, Ross Fennell, John Hare, Raymond Harrison, Peter Henry, Robert J Khan, Akram Kidd, Charles Law, Mary Ann Mitchell, Leslie Moore, Stephen Oates, John Platz, Greg Poulsen, David Roake, Jeremy Rose, John Scattini, Walter John Stearne, Peter Stuart, Peter Vertigan, Wayne Wilson, Frances
Cherry	Darmody, Liz Fleming, Graham Mackay, Alastair Maddox, Zoee Mitchell, Leslie Pullar, David Robinson, Ben Scholefield, Peter
Chickpeas	Brouwer, Jan Collins, David
Citrus	Fox, Primrose Gingis, Aron Lee, Slade Maddox, Zoee Mitchell, Leslie Pullar, David Robinson, Ben Scholefield, Peter Swinburn, Garth Sykes, Stephen

Clover
- Lake, Andrew
- Miller, Jeff
- Mitchell, Leslie

Conifer
- Stearne, Peter

Cotton
- Derera, Nicholas AM
- Khan, Akram
- Leske, Richard

Cucurbits
- Cross, Richard
- Herrington, Mark
- McMichael, Prue
- Pullar, David
- Robinson, Ben
- Scholefield, Peter

Cydonia
- Baxter, Leslie

Dogwood
- Darmody, Liz
- Fleming, Graham
- Maddox, Zoee

Feijoa
- Robinson, Ben
- Scholefield, Peter

Fibre Crops
- Khan, Akram

Fig
- Darmody, Liz
- FitzHenry, Daniel
- Fleming, Graham
- Maddox, Zoee
- Pullar, David

Forage Brassicas
- Goulden, David

Forage Grasses
- Fennell, John
- Harrison, Peter
- Kirby, Greg
- Mitchell, Leslie
- Smith, Kevin

Forage Legumes
- Fennell, John
- Foster, Kevin
- Harrison, Peter
- Hill, Jeff
- Lake, Andrew
- Miller, Jeff

Forest Trees
- Lubomski, Marek

Fruit
- Darmody, Liz
- Fleming, Graham
- Gingis, Aron
- Kennedy, Peter
- Lenoir, Roland
- Maddox, Zoee
- McCarthy, Alec
- Mitchell, Leslie
- Pullar, David
- Robinson, Ben
- Scholefield, Peter

Fungi, Basidiomycetes
- Cairney, John

Grapes
- Biggs, Eric
- Darmody, Liz
- Fleming, Graham
- Gingis, Aron
- Lee, Slade
- Maddox, Zoee
- Mitchell, Leslie
- Pullar, David
- Robinson, Ben
- Scholefield, Peter
- Smith, Daniel
- Stearne, Peter
- Swinburn, Garth
- Sykes, Stephen

Grevillea
- Herrington, Mark

Hydrangea
- Hanger, Brian
- Maddox, Zoee

Impatiens
- Paananen, Ian

Jojoba
- Dunstone, Bob

Legumes
- Aberdeen, Ian
- Baker, Andrew
- Collins, David
- Cook, Bruce
- Cruickshank, Alan
- Downes, Ross
- Foster, Kevin
- Harrison, Peter
- Imrie, Bruce
- Kirby, Greg
- Khan, Akram
- Knights, Edmund
- Lake, Andrew
- Law, Mary Ann
- Loch, Don
- Mitchell, Leslie
- Nutt, Bradley
- Rose, John

Lentils
- Brouwer, Jan
- Collins, David
- Goulden, David
- Khan, Akram

Lucerne
- Lake, Andrew
- Mitchell, Leslie

Lupin
- Collins, David
- Sanders, Milton

Magnolia
- Paananen, Ian

Myrtaceae
- Dunstone, Bob

Native grasses
- Quinn, Patrick
- Waters, Cathy

Oat
- Collins, David
- Khan, Akram
- Platz, Greg

Oilseed crops
- Downes, Ross
- Kidd, Charles
- Poulsen, David

Olives
- Bazzani, Mr Luigi
- Gingis, Aron
- Pullar, David

Onions
- Cross, Richard
- Fennell, John
- Gingis, Aron
- Khan, Akram
- McMichael, Prue
- Pullar, David
- Robinson, Ben

Ornamentals – Exotic
- Armitage, Paul
- Angus, Tim
- Barth, Gail
- Collins, Ian
- Cross, Richard
- Cunneen, Thomas
- Darmody, Liz
- Dawson, Iain
- Derera, Nicholas AM
- Eggleton, Steve
- Fisk, Anne Marie
- Fitzhenry, Daniel
- Fleming, Graham
- Gingis, Aron
- Guy, Gareme
- Harrison, Peter
- Hempel, Maciej
- Johnston, Margaret
- Kirkham, Roger
- Kulkarni, Vinod
- Lamont, Greg
- Larkman, Clive
- Lenoir, Roland
- Lowe, Greg
- Lubomski, Marek
- Lunghusen, Mark
- Maddox, Zoee
- McMichael, Prue
- Milne, Carolynn
- Mitchell, Hamish
- Mitchell, Leslie
- Nichols, David
- Oates, John
- Paananen, Ian
- Prescott, Chris
- Prince, John
- Robb, John
- Robinson, Ben
- Scholefield, Peter
- Singh, Deo
- Smith, Daniel

Stearne, Peter
Stewart, Angus
Van der Ley, John
Watkins, Phillip

Ornamentals – Indigenous
Allen, Paul
Angus, Tim
Barrett, Mike
Barth, Gail
Cunneen, Thomas
Dawson, Iain
Derera, Nicholas AM
Downes, Ross
Eggleton, Steve
Harrison, Peter
Henry, Robert J
Hockings, David
Jack, Brian
Johnston, Margaret
Kirby, Greg
Kirkham, Roger
Lenoir, Roland
Lowe, Greg
Lullfitz, Robert
Lunghusen, Mark
McMichael, Prue
Milne, Carolynn
Mitchell, Hamish
Molyneux, W M
Nichols, David
Oates, John
Paananen, Ian
Prince, John
Robinson, Ben
Scholefield, Peter
Singh, Deo
Smith, Daniel
Stearne, Peter
Tan, Beng
Watkins, Phillip
Worrall, Ross

Ornithopus
Foster, Kevin
Nichols, Phillip
Nutt, Bradley

Osmanthus
Paananen, Ian
Robb, John

Pastures & Turf
Aberdeen, Ian
Anderson, Malcolm
Cameron, Stephen
Cook, Bruce
Downes, Ross
Croft, Valerie
Harrison, Peter
Kirby, Greg
Loch, Don
Miller, Jeff
Mitchell, Leslie
Rose, John
Smith, Raymond
Scattini, Walter John
Smith, Kevin
Wilson, Frances

Peanut
Cruickshank, Alan
George, Doug

Pear
Baxter, Leslie
Darmody, Liz
Fleming, Graham
Langford, Garry
Mackay, Alastair
Maddox, Zoee
Malone, Michael
Portman, Anthony
Pullar, David
Robinson, Ben
Scholefield, Peter
Tancred, Stephen
Valentine, Bruce

Persimmon
Swinburn, Garth

Petunia
Paananen, Ian
Nichols, David

Photina
Robb, John

Pistacia
Pullar, David
Richardson, Clive
Sykes, Stephen

Pisum
Brouwer, Jan
Goulden, David
McMichael, Prue
Sanders, Milton

Potatoes
Baker, Andrew
Cross, Richard
Fennell, John
Guertsen, Paul
Kirkham, Roger
McMichael, Prue
Pullar, David
Robinson, Ben
Scholefield, Peter
Smith, Daniel
Stearne, Peter

Proteaceae
Barth, Gail
Kirby, Neil
Robb, John
Robinson, Ben
Scholefield, Peter
Smith, Daniel

Prunus
Darmody, Liz
Fleming, Graham
Kennedy, Peter
Mackay, Alastair
Maddox, Zoee
Malone, Michael
Porter, Gavin
Portman, Anthony
Pullar, David
Topp, Bruce
Witherspoon, Jennifer

Pulse Crops
Bestow, Sue
Brouwer, Jan
Collins, David
Cross, Richard
Kidd, Charles
Oates, John
Poulson, David

Raspberry
Darmody, Liz
Fleming, Graham
Pullar, David
Robinson, Ben
Scholefield, Peter

Rhododendron
Barrett, Mike
Paananen, Ian

Rose
Barrett, Mike
Cross, Richard
Darmody, Liz
Fitzhenry, Daniel
Fleming, Graham
Fox, Primrose
Gingis, Aron
Hanger, Brian
Lee, Peter
Maddox, Zoee
McKirdy, Simon
Prescott, Chris
Robinson, Ben
Scholefield, Peter
Smith, Daniel
Stearne, Peter
Swane, Geoff
Syrus, A Kim
Van der Ley, John

Sesame
Bennett, Malcolm
Harrison, Peter
Imrie, Bruce

Sorghum
Khan, Akram

Soybean
Harrison, Peter
James, Andrew

Spices and Medicinal Plants
Derera, Nicholas AM
Khan, Akram
Pullar, David

Stone Fruit
Barrett, Mike
Darmody, Liz
Fleming, Graham
Kennedy, Peter
Mackay, Alistair
Maddox, Zoee
Malone, Michael
Pullar, David
Robinson, Ben
Scholefield, Peter
Swinburn, Garth
Valentine, Bruce

Strawberry
- Gingis, Aron
- Herrington, Mark
- Mitchell, Leslie
- Morrison, Bruce
- Porter, Gavin
- Pullar, David
- Robinson, Ben
- Scholefield, Peter
- Zorin, Clara

Sugarcane
- Cox, Mike
- Morgan, Terence

Sunflower
- George, Doug

Tomato
- Cross, Richard
- Gingis, Aron
- Herrington, Mark
- Khan, Akram
- McMichael, Prue
- Pullar, David
- Robinson, Ben
- Scholefield, Peter
- Smith, Daniel

Tree Crops
- McRae, Tony

Triticale
- Collins, David

Tropical/Sub-Tropical Crops
- Harrison, Peter
- Kulkarni, Vinod
- Pullar, David
- Robinson, Ben
- Scholefield, Peter
- Winston, Ted

Umbrella Tree
- Paananen, Ian

Vegetables
- Baker, Andrew
- Cross, Richard
- Derera, Nicholas AM
- Fennell, John
- Frkovic, Edward
- Gingis, Aron
- Harrison, Peter
- Kirkham, Roger
- Khan, Akram
- Lenoir, Roland
- McMichael, Prue
- Oates, John
- Pearson, Craig
- Pullar, David
- Robinson, Ben
- Scholefield, Peter
- Smith, Daniel
- Westra Van Holthe, Jan

Verbena
- Paananen, Ian

Wheat (Aestivum & Durum Groups)
- Brouwer, Jan
- Collins, David
- Khan, Akram
- Platz, Greg
- Sanders, Milton

TABLE 2

NAME	TELEPHONE/FAX	AREA OF OPERATION
Aberdeen, Ian	03 5782 1029	
	03 5782 2073 fax	SE Australia
Allen, Paul	07 3824 0263 ph/fax	SE QLD, Northern NSW
Anderson, Malcolm	03 5573 0900	
	03 5571 1523 fax	
	017 870 252 mobile	Victoria
Angus, Tim	(64 4) 565 3121	
	plantatim@aol.com	Australia and New Zealand
Armitage, Paul	03 9756 7233	
	03 9756 6948 fax	Victoria
Baker, Andrew	03 6426 2545	
	03 6427 8554 fax	Tasmania
Barrett, Mike	02 9875 3087	
	02 9980 1662 fax	
	0407 062 494 mobile	NSW/ACT
Barth, Gail	08 8389 7479	SA and Victoria
Baxter, Leslie	03 6224 4481	
	03 6224 4468 fax	
	0181 21943 mobile	Tasmania
Bazzani, Luigi	08 9772 1207	
	08 9772 1333 fax	Western Australia
Bennett, Malcolm	08 8973 9733	
	08 8973 9777 fax	NT, QLD, NSW, WA
Bestow, Sue	02 6795 4695	
	02 6795 4358 fax	
	0418 953 050 mobile	Australia
Biggs, Eric	03 5023 2400	
	03 5023 3922 fax	Mildura Area
Boyd, Rodger	08 9380 2553	
	08 9380 1108 fax	Western Australia
Brouwer, Jan	03 5362 2159	
	03 5362 2187 fax	South Eastern Australia
Cairney, John	02 9685 9903	Sydney
	j.cairney@nepean.uws.edu.au	
Chequer, Robert	03 5382 1269	Victoria
	0419 145 262 mobile	
Collins, David	08 9623 2343 ph/fax	Central Western Wheatbelt of
	0154 42694 mobile	Western Australia
Cooper, Katharine	08 8303 6563	
	08 8303 7119 fax	Australia
Cox, Mike	07 4132 5200	
	07 4132 5253 fax	Queensland and NSW
Croft, Valerie	03 5573 0900	
	03 5571 1523 fax	Victoria
Cross, Richard	64 3 325 6400	
	64 3 325 2074 fax	New Zealand
Cruickshank, Alan	07 4160 0722	
	07 4162 3238 fax	QLD
Cunneen, Thomas	02 4889 8647	
	02 4889 8657 fax	Sydney Region
Darmody, Liz	03 9756 6105	
	03 9752 0005 fax	Australia
Davidson, James	02 6246 5071	High rainfall zone of temperate
	02 6246 5399 fax	Australia
Dawson, Iain	02 6251 2293	ACT, South East NSW
Derera, Nicholas AM	02 9639 3072	
	02 9639 0345 fax	
	0414 639 307 mobile	Australia
Downes, Ross	02 6255 1461 ph	
	02 6278 4676 fax	
	0414 955258 mobile	ACT, South East Australia
Dunstone, Bob	02 6281 1754 ph/fax	South East NSW
Easton, Andrew	07 4690 2666	
	07 4630 1063 fax	QLD and NSW
Eggleton, Steve	03 9876 1097	
	03 9876 1696 fax	Melbourne Region
Fennell, John	03 5334 7871	
	03 5334 7892 fax	
	0419 881 887	Australia
FitzHenry, Daniel	02 4862 2487 ph/fax	Sydney and surrounding
	0417 891 651 mobile	districts
Fleming, Graham	03 9756 6105	
	03 9752 0005 fax	Australia
Foster, Kevin	08 9368 3670	Mediterranean areas of
		Australia
Frkovic, Edward	02 6962 7333	
	2 6964 1311 fax	Australia
George, Doug	07 5460 1308	
	07 5460 1112 fax	Australia
Gingis, Aron	03 9887 6120	Victoria, South Australia and
	03 9769 1522 fax	Southern NSW
	0419 878658 mobile	
Goulden, David	64 3 325 6400	
	64 3 325 2074 fax	New Zealand
Guertsen, Paul	02 6845 3789	
	02 6845 3382 fax	
	0407 658 105 mobile	NSW, VIC, SE QLD
Guy, Graeme	03 9457 1927	
	gguy@netspace.net.au	Victoria
Hanger, Brian	03 9837 5547 ph/fax	
	0418 598106 mobile	Victoria
Hare, Ray	02 6763 1232	
	02 6763 1222 fax	QLD, NSW VIC & SA
Harrison, Peter	08 8948 1894 ph	Tropical/Sub-tropical
	08 8948 3894 fax	Australia, including NT and
	0407 034 083 mobile	NW of WA & tropical arid areas
Hempel, Maciej	02 4628 0376	
	02 4625 2293 fax	NSW, QLD, VIC, SA
Henry, Robert J	02 6620 3010	
	02 6622 2080 fax	Australia
Herrington, Mark	07 5441 2211	
	07 5441 2235 fax	Southern Queensland
Hill, Jeff	08 8303 9487	
	08 8303 9607 fax	South Australia
Hockings, David	07 5494 3385 ph/fax	Southern Queensland
Imrie, Bruce	02 4474 0951	
	02 4474 0952	
	imriecsc@sci.net.au	SE Australia
Iredell, Janet Willa	07 3202 6351 ph/fax	SE Queensland
Jack, Brian	08 9952 5040	
	08 9952 5053 fax	South West WA
James, Andrew	07 3214 2278	
	07 3214 2410 fax	Australia
Johnston, Margaret	07 5460 1240	
	07 5460 1455 fax	SE Queensland
Kadkol, Gururaj	03 5382 1269	
	03 5381 1210 fax	North Western Victoria
Kennedy, Peter	02 6382 7600	
	02 6382 2228 fax	New South Wales
Khan, Akram	02 9351 8821	
	02 9351 8875 fax	New South Wales
Kidd, Charles	08 8842 3591	
	08 8842 3066 fax	
	0417 336 458 mobile	Southern Australia
Kirby, Greg	08 8201 2176	
	08 8201 3015 fax	South Australia
Kirby, Neil	02 4754 2637	
	02 4754 2640 fax	New South Wales
Kirkham, Roger	03 5957 1200	
	03 5957 1210 fax	
	0153 23713 mobile	Victoria
Knights, Edmund	02 6763 1100	
	02 6763 1222 fax	North Western NSW
Kulkarni, Vinod	08 9992 2221	
	08 9992 2049 fax	Australia
Lake, Andrew	08 8177 0558	
	0418 818 798 mobile	
	lake@arcom.com.au	SE Australia
Lamont, Greg	02 9652 1285	
	02 9652 1924 fax	Sydney region
Langford, Garry	03 6266 4344	
	03 6266 4023 fax	
	418 312 910 mobile	Australia
Larkman, Clive	03 9735 3831	
	03 9739 6370	
	larkman@tpgi.com.au	Victoria
Law, Mary Ann	07 4637 9960	
	07 4637 9962 fax	
	malaw@bigpond.com	Toowoomba region
Lee, Peter	03 6330 1147	
	03 6330 1927 fax	SE Australia
Lee, Slade	02 6620 3410	Queensland/Northern New
	02 6622 2080 fax	South Wales
Lenoir, Roland	02 6231 9063 ph/fax	Australia
Leske, Richard	07 4671 3136	Cotton growing regions of
	07 4671 3113 fax	QLD & NSW
Light, Kate	03 5362 2175	
	0419 145 768 mobile	Victoria
Loch, Don	07 3286 1488	
	07 3286 3094 fax	Queensland
Lowe, Greg	02 4389 8750	
	02 4389 4958 fax	
	0411 327390 mobile	Sydney, Central Coast NSW
Lubomski, Marek	07 5525 3023 ph/fax	NSW & QLD
Lullfitz, Robert	08 9447 6360	South West WA
Lunghusen, Mark	03 5998 2083	
	03 5998 2089 fax	
	0407 050 133 mobile	Melbourne & environs
Mackay, Alastair	08 9310 5342 ph/fax	
	0159 87221 mobile	Western Australia
Maddox, Zoee	03 9756 6105	
	03 9752 0005 fax	Australia

NAME	TELEPHONE/FAX	AREA OF OPERATION
Malone, Michael	+64 6 877 8196	
	+64 6 877 4761 fax	New Zealand
McCarthy, Alec	08 9780 6273	
	08 9780 6136 fax	South West WA
McKirdy, Simon	08 9457 1241	
	08 9368 3261	
	0411 471 146 mobile	Western Australia
McMichael, Prue	08 8373 2488	
	08 8373 2442 fax	SE Australia
McRae, Tony	08 8723 0688	
	08 8723 0660 fax	Australia
Miller, Jeff	64 6 356 8019 extn 8027	Manawatu region, New
	64 3 351 8142 fax	Zealand
Milne, Carolynn	07 3206 3509	QLD
Mitchell, Hamish	03 9737 9568	
	03 9737 9899 fax	Victoria
Mitchell, Leslie	03 5821 2021	
	03 5831 1592 fax	VIC, Southern NSW
Molyneux, William	03 5965 2011	
	03 5965 2033 fax	Victoria
Moore, Stephen	02 6799 2230	
	02 6799 2239 fax	NSW
Morgan, Terence	07 4783 6000	
	07 4783 6001 fax	Australia
Morrison, Bruce	03 9210 9251	
	03 9800 3521 fax	East of Melbourne
Nichols, David	03 5977 4755	SE Melbourne, Mornington
	03 5977 4921 fax	Peninsula and Dandenong Ranges, Victoria
Nichols, Phillip	08 9387 7442	
	08 9383 9907 fax	Western Australia
Nutt, Bradley	08 9387 7423/	
	08 9383 9907 fax	Western Australia
Oates, John	02 4473 8465	Sydney region, Eastern Australia
Paananen, Ian	02 4381 0051	
	02 4381 0071 fax	
	0412 826589 mobile	Sydney/Newcastle
Platz, Greg	07 4639 8817	
	07 4639 8800 fax	QLD, Northern NSW
Porter, Gavin	07 5460 1233	
	07 5460 1455 fax	SE QLD, Northern NSW
Portman, Anthony	08 9274 5355	
	08 9250 1859 fax	South-west Western Australia
Poulsen, David	07 4661 2944	
	07 4661 5257 fax	SE QLD, Northern NSW
Prescott, Chris	03 5998 5100	
	03 5998 5333	
	0417 340 558 mobile	Victoria
Prince, John	07 5533 0211	
	07 5533 0488 fax	SE QLD
Pullar, David	03 9415 1533	
	03 9419 1317 fax	
	0418 575 444 mobile	Australia
Quinn, Patrick	03 5427 0485	SE Australia
Richardson, Clive	03 51550255	Victoria
Roake, Jeremy	02 9351 8830	
	02 9351 8875 fax	Sydney Region
Robb, John	02 4376 1330	
	02 4376 1271 fax	
	0199 19252 mobile	Sydney, Central Coast NSW
Robinson, Ben	08 8373 2488	
	08 8373 2442 fax	SE Australia
Rose, John	07 4661 2944	
	07 4661 5257 fax	SE Queensland
Rudolph, Paul	03 5381 2168	
	03 5381 1210 fax	
	0438 083 840 mobile	Victoria
Sanders, Milton	08 9825 8087	
	08 9387 4388 fax	Southern Australia: WA,Vic,
	0427 031 951 mobile	NSW, SA
Scattini, Walter	07 3356 0863 ph/fax	Tropical and sub-tropical Australia
Scholefield, Peter	08 8373 2488	
	08 8373 2442 fax	
	018 082022 mobile	SE Australia
Singh, Deo	0418 880787 mobile	
	07 3207 5998 fax	Brisbane
Smith, Daniel	08 8373 2488	
	08 8373 2442 fax	South Australia
Smith, Kevin	03 5573 0900	
	03 5571 1523 fax	SE Australia
Smith, Stuart	03 6336 5234	
	03 6334 4961 fax	SE Australia
Stearne, Peter	02 9262 2611	
	02 9262 1080 fax	Sydney, ACT & NSW
Stewart, Angus	02 4385 9788ph/fax	
	0419 632 123 mobile	Sydney, Gosford
Stuart, Peter	07 4690 2666	
	07 4630 1063 fax	SE Queensland
Swane, Geoff	02 6889 1545	
	02 6889 2533 fax	
	0419 841580 mobile	Central western NSW
Swinburn, Garth	03 5023 4644	Murray Valley Region – from
	03 5021 3131 fax	Swan Hill (V) to Waikere (SA)
Sykes, Stephen	03 5051 3100	
	03 5051 3111 fax	Victoria
Syrus, A Kim	03 8556 2555	
	03 8556 2955 fax	Adelaide
Tan, Beng	08 9266 7168	
	08 9266 2495	Perth & environs
Tancred, Stephen	07 4681 2931	
	07 4681 4274 fax	
	0157 62888 mobile	QLD, NSW
Topp, Bruce	07 4681 1255	
	07 4681 1769 fax	SE QLD, Northern NSW
Valentine, Bruce	02 6361 3919	
	02 6361 3573 fax	New South Wales
Van Der Ley, John	02 6561 5047	
	02 6561 5138 fax	Sydney to Brisbane and New
	0417 423 768 mobile	England area
Vertigan, Wayne	03 6336 5221	
	03 6334 4961 fax	Tasmania
Waters, Cathy	02 6888 7404	
	02 6888 7201 fax	SE Australia
Watkins, Phillip	08 9525 1800	
	08 9525 1607 fax	Perth Region
Westra Van Holthe, Jan	03 9706 3033	
	03 9706 3182 fax	Australia
Wilson, Frances	64 3 318 8514	
	64 3 318 8549 fax	Canterbury, New Zealand
Winston, Ted	07 4068 8796 ph/fax	
	0412 534 514 mobile	QLD, Northern NSW and NT
Witherspoon, Jennifer	0407 688 457 mobile	South Australia
Worrall, Ross	02 4348 1900	
	02 4348 1910 fax	Australia
Young, Heidi	07 4690 2666	
	07 4630 1063	QLD, NSW
Zadow, Diane	03 5382 1269	
	03 5381 1210 fax	
	0419 145 763 mobile	Victoria
Zorin, Clara	07 3207 4306 ph/fax	
	0418 984 555	Eastern Australia

APPENDIX 4

INDEX OF ACCREDITED NON-CONSULTANT 'QUALIFIED PERSONS'

Name

Allen, Antony
Ali, S
Baelde, Arie
Baker, Ian
Barr, Andrew
Bell, David
Birmingham, Erika
Brennan, Paul
Breust, P
Brewer, L
Brindley, Tony
Buchanan, Peter
Bunker, John
Bunker, Kerry
Burton, Wayne
Cameron, Nick
Cant, Russell
Chivers, Ian
Clayton- Greene, Kevin
Constable, Greg
Cook, Esther
Cox, Michael
Craig, Andrew
Craigie, Gail
Dale, Gary
Dear, Brian
de Betue, Remco
Delaporte, Kate
Done, Anthony
Donnelly, Peter
Downe, Graeme
Draganovic, Oliver
Dyer, Natalie
Eastwood, Russell
Ebb, Fran
Eisemann, Robert
Elliott, Philip
Engel, Richard
Gibson, Peter
Gomme, Simon
Granger, Andrew
Green, Allan
Guerin, Jenny
Harden, Patrick
Hart, Ray
Hill, Jeffrey
Hollamby, Gil
Hoppo, Sue
Howie, Jake
Hurst, Andrea
Irwin, John
Jackson, B
Jaeger, M
Johnston, Christine
Jupp, Noel
Kaehne, Ian
Katelaris, A
Kebblewhite, Tony
Kennedy, Chris
Kimbeng, Collins
Knights, Ted
Knox, Graham
Kobelt, Eric
Lacey, Kevin
Langbein, Sueanne
Leighton, Alan
Leonforte, Tony
Lewin, Laurence
Lewis, Hartley
Liu, Chunji
Loi, Angelo
Lowe, Russell
Luckett, David
Macleod, Nick
Mann, Dorham
Mason, Lloyd
McCallum, Lesley
Mcdonald, David
Mcmaugh, P
Mendham, Neville
Menzies, Kim
Moody, David
Neilson, Peter
Newman, Allen
Norriss, Michael
Oakes, John
Offord, Cathy
Patel, Narandra
Paull, Jeff
Pearce, Bob
Peppe, Ivan
Perrott, Neil
Pressler, Craig
Piperidis, George
Reeve, Christopher
Reid, Peter
Roberts, Sean
Rose, Ian
Rowles, Cherie
Salmon, Alexander
Sammon, Noel
Sandral, Graeme
Sanewski, Garth
Saperstein, Sylvia
Schreuders, Harry
Scott, Ralph
Smith, Michael
Smith, Raymond
Smith, Sue
Song, Leonard
Stiller, Warwick
Sutton, John
Tonks, John
Trimboli, Daniel
Van der Spek, Folke
Vaughan, Peter
Watkinson, Andrew
Weatherly, Lilia
Whalley, R.D.B.
Whiley, Tony
Williams, Rex
Williams, Thomas
Wilson, Rob
Wilson, Stephen
Wirthensohn, Michelle
Wright, Gary
Yan, Guijun
Zeppa, Aldo

APPENDIX 5

ADDRESSES OF UPOV AND MEMBER STATES

International Union for the Protection of New Varieties of Plants (UPOV):

International Union for the
Protection of New Varieties of Plants
(UPOV)
34, Chemin des Colombettes
CH-1211
Geneva 20
SWITZERLAND

Phone: (41-22) 338 9111
Fax: (41-22) 733 0336
Web site: http://www.upov.int

Plant Variety Protection Offices in individual UPOV Member States:

ARGENTINA
Area Semillas
Secretaria de Agricultura, Ganaderia y Pesca
Ministerio de Economia y Obras
Y Servicios Publicos
Avda. Paseo Colon 922-3. Piso
1063 Buenos Aires

Phone: (54 11) 4349 2497
Fax: (54 11) 4349 2417
e-mail: inase@sagyp.mecon.ar

AUSTRALIA
Registrar
Plant Breeder's Rights Office
P O Box 858
Canberra ACT 2601

Phone: (61 2) 6272 3888
Fax: (61 2) 6272 3650
e-mail: pbr@affa.gov.au

AUSTRIA
Bundesamt und Forschungszentrum fur Landwirtschaft
Sortenschutzamt
Postfach 400
Spargelfeldstrasse 191
A-1226 Wien

Phone: (43 1) 73216 4000
Fax: (43 1) 73216 4211

BELGIUM
Ministere de classes moyennes et de l'agriculture
Service de la protection des obtentions
vegetales et des catalogues nationaux
Tour WTC/3- 11eme etage
Avenue Simon Bolivar 30
B-1000 Bruxelles

Phone: (32 2) 208 44 08
Fax: (32 2) 208 44 21

BOLIVIA
Direccion Nacional de Semillas
Secretaria Nacional de Agricultural y Ganaderia
Avda. 6 de Agosto 2006, Edif. V. Centenario
Casilla 4793
La Paz

Phone (591-2) 441 153/441 608
Fax: (591-2) 441 153/441 608
e-mail: semillas@ceibo.entelnet.bo

BRAZIL
Servico Nacional de Protecao de Cultivares-SNPC
(National Plant Varieties Protection Service)
Secretaria de Desenvolvimento Rural-SDR
Ministerio da Agricultura e do Abastedimento
Esplanada dos Ministerios, Bloco D, Anexo A
Terreo, Sala 1-12
CEP 70043-900, Brasilia, DF

Phone: (55-61) 218-2433
Fax: (55-61) 224 2842
e-mail: snpc@agricultura.gov.br

BULGARIA
Patent Office of the Republic of Bulgaria
52 B, Dr. G. M. Dimitrov Blvd.
BG -1113 Sofia

Phone: (359-2) 710 152
Fax: (359-2) 708 325

Central Office "Variety Testing"
Executive Agency for Variety Testing, Field
Inspection and Seed Control (IASAS)
125 Tzarigradsko shoes Blvd.
Block 1
1113 Sofia

Phone: (359-2)700 375
Fax: (359-2)71 36 35

CANADA
Plant Breeder's Rights Office
Canadian Food Inspection Agency (CFIA)
59 Camelot Drive
Ottawa, Ontario
K1A OY9

Phone: (1 613) 225 2342
Fax: (1 613) 228 6629

CHILE
Ministerio de Agricultura
Servicio Agricola y Ganadero
Departamento de Semillas
Casilla 1167-21
Santiago de Chile

Phone: (56 2) 696 29 96
Fax: (56 2) 696 64 80

CHINA
The Office for the Protection of New Varieties of Plants
Ministry of Agriculture
11 Nong Zhan Guan Nan Li
Beijing 100026

Phone: (86-10) 6419 3029
Fax: (86-10) 6419 3082
e-mail: cnpvp@agri.gov.cn

COLOMBIA
Instituto Colombiano Agropecuario (I.C.A)
Division de Semillas – Oficina 410
Calle 37 No. 8-43
Santa Fe de Bogota

Phone: (57 1) 232 4697
Fax: (57 1) 232 4695
e-mail: semilla@impsat.net.co

CROATIA
Institute for Seed and Seedlings
Vinkovacka cesta 63c
31000 Osijek

Phone (385-31) 275 206
Fax (385-31) 275 193
e-mail r.ore@zsr.hr

CZECH REPUBLIC
Central Institute for Supervising and Testing in Agriculture
Department of Plant Variety Rights
Za Opravnou 4
150 06 Praha 5 – Motol

Phone: (420 2) 5721 1755
Fax: (420 2) 5721 1752

DENMARK
Plantenyhedsnaevnet
(The Danish Institute of Plant and Soil Science)
Teglvaerksvej 10,
Tystofte
DK-4230 Skaelskoer
Phone: (45) 58 16 06 00
Fax: (45) 58 16 06 06

ECUADOR
Instituto Esuatoriano de la Propiedad Intelectual
Direccion Nacional de Obtenciones Vegetales
Avenida Republica 396 y Diego de Almagro
Edificio FORUM 300, 1er piso
Quito

Phone: (593-2) 2508 000, ext. 340
Fax: (593-2) 2508 026
e-mail: iepi@interactive.net.ec

ESTONIA
Estonian Plant Production Inspectorate
Teaduse 2
Saku
75501 Harjumaa

Phone: (372) 6 712 600
Fax: (372) 6 712 604
e-mail: plant@plant.agri.ee
website: www.plant.agri.ee

FINLAND
Plant Variety Board
Plant Variety Rights Office
Ministry of Agriculture and Forestry
Hallituskat 3a, Helsinki
Box 30
FIN-00023 GOVERNMENT

Phone: (358) 9 160 3316
Fax: (358) 9 88663

FRANCE
Comite de la protection des obtentions vegetales
11, rue Jean Nicot
F-75007 Paris

Phone: (331) 42 75 93 14
Fax: (331) 42 75 94 25

GERMANY
Bundessortenamt
Postfach 61 04 40
D-30604 Hannover

Phone: (49 511) 95 66 055
Fax: (49 511) 956 33 62
e-mail: bsa@bundessortenamt.de

HUNGARY
Hungarian Patent Office
Magyar Szabadalmi Hivatal
Garibaldi-u.2-B.P. 552
H-1370 Budapest

Phone: (36 1) 312 44 00
Fax: (36 1) 311 4841

IRELAND
Controller of Plant Breeder's Rights
Department of Agriculture and Food
Backweston
Leixlip
Co. Kildare

Phone: (353) 1 628 0608
Fax: (353) 1 628 0634
e-mail: backwest@indigo.ie

ISRAEL
Plant Breeder's Rights Council
The Volcani Center
PO Box 6
Bet-Dagan 50 250

Phone: (972) 3 948 5450
Fax: (972) 3 948 5839
e-mail: ilpbr_tu@netvision.net.il

ITALY
Ufficio Italiano Brevetti e Marchi
Ministero dell'Industria, del Commercio e dell'Artigianato
19,via Molise
I-00187 Roma

Phone: (39 06) 47 05 1
Fax: (39 06) 47 05 30 35

JAPAN
Seeds and Seedlings Division
Agricultural Production Bureau
Ministry of Agriculture, Forestry and Fisheries
1-2-1 Kasumigaseki – Chiyoda-ku
Tokyo 100

Phone: (81 3) 35 91 05 24
Fax: (81 3) 35 02 65 72

KENYA
Plant Breeder's Rights Office
Kenya Plant Health Inspectorate Service (KEPHIS)
Headquarters
Waiyaki Way
PO Box 49592
Nairobi

Tel: (254 –2) 44 40 29
Fax: (254-2) 44 89 40
e-mail: kephis@nbnet.co.ke

KYRGYZSTAN
State Agency of Intellectual Property
House 10/1, Microregion 11
720049 Bishkek

Tel: (996-3312) 510 810
Fax: (996 3312) 510 813
e-mail: kyrgyzpatent@infotel.kg

MEXICO
Servicio Nacional de Inspection y Certification de Semillas – SNICS
Secretaria de Agricultura, Ganaderia y Desarrollo Rural
Av. Presidente Juarez No. 13
Col. El Cortijo
54000 Tlalnepantla, Estado de Mexico
Mexico

Phone: (52-55) 5384 2213
Fax: (52-55) 5390 1441
e-mail:
eduardo.benitez@sagar.gob.mx

NETHERLANDS
Raad voor het Kwekersrecht
(Board of Plant Breeder's Rights)
Postbus 104
NL-6700 AC Wageningen

Phone: (31 317) 47 80 90
Fax: (31 317) 42 58 67
e-mail:
raad.kwekersrecht@rkr.agro.nl
website: www.kwekersrecht.nl

NEW ZEALAND
Commissioner of Plant Variety Rights
Plant Variety Rights Office
PO Box 130
Lincoln, Canterbury

Phone: (64 3) 325 63 55
Fax: (64 3) 983 3946

NICARAGUA
Registro de la Propiedad Industrial e Intelectual
Ministerio de Economía y Desarrollo (MEDE)
Apartado postal 8
Managua

Phone: (505) 267 3061, 237 2417
Fax: (505) 267 5393
e-mail: rpi-nic@ibw.com.ni

NORWAY
Plantesortsnemnda
(The Plant Variety Board)
Pb. 3
N-1432 As

Phone: (47) 64 94 44 00
Fax: (47) 64 94 44 10

PANAMA
Direccion General del Registro de la Propiedad Industrial
(DIGERPI)
Ministerio de Comercio e Industrias
Apartado 9658- Zona 4
Panama 4

Phone: (507) 227 3987
Fax: (507) 227 2139
e-mail: digerpi@sinfo.net

PARAGUAY
Ministerio de Agricultura y Ganaderia
Direccion de Semillas (DISE)
Gaspar R. de Francia No. 685
c/ Mcal. Estigarribia
San Lorenzo

Phone: (595) 21 58 22 01
Fax: (595) 21 58 46 45

POLAND
Research Center of Cultivars Testing (COBORU)
63-022 Slupia Wielka

Phone: (48 61) 285 2341
Fax: (48 61) 285 3558
e-mail: coboru@bptnet.pl

PORTUGAL
Centro Nacional de Registo de Variedades Protegidas (CENARVE)
Edificio II da DGPC
Tapada da Ajuda
P-1300 Lisboa

Phone: (351 213) 613 216
Fax: (351 213) 613 222
e-mail:
dgpc.cenarve@mail.telepac.pt

REPUBLIC OF KOREA
The Director General
National Seed Management Office
Ministry of Agriculture and Forestry
433 Anyang-6-dong
Anyang City 430-016

Tel: (82-31) 467-0150
Fax: (82-31) 467-0161
e-mail: chakim@seed.go.kr

REPUBLIC OF MOLDOVA
State Commission for Crops Variety Testing and Registration
Ministry of Agriculture
Bul. Stefan Cel Mare 162
C.P. 1873
2004 Chisinau

Phone: (373-2) 24 62 22
Fax: (373-2) 24 69 21

ROMANIA
State Office for Inventions and Trademarks (OSIM)
5, Ion Ghica Str., Sector 3
PO Box 52
70018 Bucharest
Phone: (40-1) 315 90 66
Fax: (373-2) 312 38 19
E-mail: office@osim.ro
Website: www.osim.ro

RUSSIAN FEDERATION
State Commission of the Russian Federation
for Selection Achievements Test and Protection
Orlicov per., 1/11
107139 Moscow

Phone: (70-95) 204 49 26
Fax: (70-95) 207 86 26
e-mail: desel@agro.aris.ru
Website:
www.angelfire.com/mi/soundsbyte

SLOVAKIA
Ministry of Agriculture
Dobrovicova 12
812 66 Bratislava

Phone: (421 7) 306 62 90
Fax: (421 7) 306 62 94

SLOVENIA
Ministry of Agriculture, Forestry and Food (MAFF)
Administration for Plant Protection and seeds
Dunajska 58
1000 Ljubljana

Phone: (386-1) 436 3344
Fax: (386-1) 436 3312

SOUTH AFRICA
The Registrar
National Department of Agriculture
Directorate: Genetic Resources
PO Box 25322
Gezina 0031

Phone: (27 12) 808 0365
Fax: (27 12) 808 0365
e-mail: variety.control@nda.agric.za

SPAIN
Oficina Espanola de Variedades Vegetales (OEVV)
Ministerio de Agricultura, Pesca y Alimentacion
Av. Ciudad de Barcelona No 6
Madrid 28007

Phone: (34 91) 347 65 93
Fax: (34 91) 347 67 03

SWEDEN
Statens vaxtsortnamnd
(National Plant Variety Board)
Box 1247
S-171 24 Solna
Phone: (46) 8 783 12 60
Fax: (46) 8 833 170
e-mail: info@vaxtsortnamnden

SWITZERLAND
Bundesamt fur Landwirtschaft
Buro fur Sortenschutz
Mattenhofstr. 5
CH-3003 Bern

Phone: (41 31) 322 25 24
Fax: (41 31) 322 26 34
Email:
manuela.brand@blw.admin.ch
Website: blw.admin.ch

TRINIDAD AND TOBAGO
Controller
Intellectual Property Office
Ministry of Legal Affairs
72-74 South Quay
Port of Spain

Tel: (1 868) 625 9972
Fax: (1 868) 624 1221
e-mail: info@ipo.gov.tt

UKRAINE
State Commision of Ukraine for Testing and Protection of
Plant Varieties
15, Henerala Rodimtseva str.
03041 Kyiv

Phone: (380 44) 257 9933
Fax: (380 44) 257 9934

UNITED KINGDOM
Department for Environment, Food and Rural Affairs (DEFRA)
The Plant Variety Rights Office and Seeds Division
White House Lane
Huntingdon Road
Cambridge CB3 OLF

Phone: (44 1223) 34 23 81
Fax: (44 1223) 34 23 86
Email:
h.Hamilton@pvs.maff.gsi.gov.uk

UNITED STATES OF AMERICA
(For PVP)
The Commissioner
Plant Variety Protection Office
Agricultural Marketing Service
Department of Agriculture
Beltsville, Maryland 20705-2351

Phone: (1 301) 504 55 18
Fax: (1 301) 504 52 91

(For Plant Patent)
The Commissioner of Patents and Trademarks

Patent and Trade Mark Office
Box 4
Washington DC 20231

Phone: (1 703) 305 93 00
Fax: (1 703) 305 88 85

URUGUAY
Instituto Nacional de Semillas (INASE)
Casilla de Correos 7731
Pando
90.000 Canelone

Phone: (59 82) 288 7099
Fax: (59 82) 288 7077
e-mail: inasepre@adinet.com.uy
Website: www.chasque.apc.org/inase

EUROPEAN UNION
(for applications filed within the EU)

Community Plant Variety Office
P.O. Box 2141
F-49021 Angers Cedex 02
FRANCE

Phone: (33 2) 41 25 64 32
Fax: (33 2) 41 25 64 10
Website: www.cpvo.eu.int

CURRENT STATUS OF PLANT VARIETY PROTECTION LEGISLATURE IN UPOV MEMBER COUNTRIES

Argentina[2]
Australia[3]
Austria[2,4]
Belgium[1,4]
Bolivia[2]
Brazil[2]
Bulgaria[3]
Canada[2]
Chile[2]
China[2]
Columbia[2]
Croatia[3]
Czech Republic[2]
Denmark[3,4]
Ecuador[2]
Estonia[3]
Finland[3,4]
France[2,4]
Germany[3,4]
Hungary[2]
Ireland[2,4]
Israel[3]
Italy[2,4]
Japan[3]
Kenya[2]
Kyrgyzstan[3]
Mexico[2]
Netherlands[3,4]
New Zealand[2]
Nicaragua[3]
Norway[2]
Panama[2]
Paraguay[2]
Poland[2,5]
Portugal[2,4]
Republic of Korea[3]
Republic of Moldova[3]
Romania[3]
Russian Federation[3]
Slovakia[2,5]
Slovenia[5]
South Africa[2,5]
Spain[1,4]
Sweden[3,4]
Switzerland[2]
Trinidad and Tobago[2]
Ukraine[2]
United Kingdom[3,4]
USA[3]
Uruguay[2]
(Total 50)

1 Bound by the 1961 Act as amended by the Additional Act of 1972.
2 Bound by the 1978 Act.
3 Bound by the 1991 Act.
4 Member of the European Community which has introduced a (supranational) Community plant variety rights system based upon the 1991 Act.
5 Has already amended its law to conform to the 1991 Act; most other states are in the process of doing so.

APPENDIX 6

CENTRALISED TESTING CENTRES

Under Plant Breeder's Rights Regulations introduced in 1996, establishments may be officially authorised by the PBR office to conduct test growings. An authorised establishment will be known as Centralised Test Centre (CTC).

Usually, the implementation of PBR in Australia relies on a 'breeder testing' system in which the applicant, in conjunction with a nominated Qualified Person (QP), establishes, conducts and reports a comparative trial. More often than not, trials by several breeders are being conducted concurrently at different sites. This makes valid comparisons difficult and often results in costly duplication.

While the current system is and will remain satisfactory, other optional testing methods are now available which will add flexibility to the PBR process.

Centralised Testing is one such optional system. It is based upon the authorisation of private or public establishments to test one or more genera of plants. Applicants can choose to submit their varieties for testing by a CTC or continue to do the test themselves. Remember, using a CTC to test your variety is voluntary.

The use of CTCs recognises the advantages of testing a larger number of candidate varieties (with a larger number of comparators) in a single comprehensive trial. Not only is there an increase in scientific rigour but also there are substantial economies of scale and commensurate cost savings. A CTC will establish, conduct and report each trial on behalf of the applicant.

The PBR office has amended its fees so that cost savings can be passed to applicants who choose to test their varieties in a CTC. Accordingly, when 5 or more candidate varieties of the same genus are tested simultaneously, each will qualify for the CTC examination fee of $800. This is a saving of nearly 40% over the normal fee of $1400.

Trials containing less than 5 candidate varieties capable of being examined simultaneously will not be considered as Centralised test trials regardless of the authorisation of the facility. Candidate varieties in non-qualifying small trials will not qualify for CTC reduction of examination fees.

Establishments wishing to be authorised as a CTC may apply in writing to the PBR office outlining their claims against the selection criteria. Initially, only one CTC will be authorised for each genus. Exemptions to this rule can be claimed due to special circumstances, industry needs and quarantine regulations. Authorisations will be reviewed periodically.

Authorisation of CTCs is not aimed solely at large research institutions. Smaller establishments with appropriate facilities and experience can also apply for CTC status. There is no cost for authorisation as a CTC.

APPLICATIONS FOR AUTHORISATION AS A 'CENTRALISED TESTING CENTRE'

Establishments interested in gaining authorisation as a Centralised Testing Centre should apply in writing addressing each of the Conditions and Selection Criteria outlined below.

Conditions and Selection Criteria

To be authorised as a CTC, the following conditions and criteria will need to be met:

Appropriate facilities

While in part determined by the genera being tested, all establishments must have facilities that allow the conduct and completion of moderate to large-scale scientific experiments without undue environmental influences. Again dependent on genera, a range of complementary testing and propagation facilities (e.g. outdoor, glasshouse, shadehouse, tissue culture stations) is desirable.

Experienced staff

Adequately trained staff, and access to appropriately accredited Qualified Persons, with a history of successful PVR/PBR applications will need to be available for all stages of the trial from planting to the presentation of the analysed data. These staff will require the authority to ensure timely maintenance of the trial. Where provided by the PBR office, the protocol and technical guidelines for the conduct of the trial must be followed.

Substantial industry support

Normally the establishment will be recognised by a state or national industry society or association. This may include/be replaced by a written commitment from major nurseries or other applicants, who have a history of regularly making applications for PBR in Australia, to use the facility.

Capability for long-term storage of genetic material

Depending upon the genus, a CTC must be in a position to make a long-term commitment to collect and maintain, at minimal cost, genetic resources of vegetatively propagated species as a source of comparative varieties. Applicants indicating a willingness to act as a national genetic resource centre in perpetuity will be favoured.

Contract testing for 3rd Parties

Unless exempted in writing by the PBR office operators of a CTC must be prepared to test varieties submitted by a third party.

Relationship between CTC and 3rd Parties

A formal arrangement between the CTC and any third party including fees for service will need to be prepared and signed before the commencement of the trial. It will include among other things: how the plant material will be delivered (e.g. date, stage of development plant, condition etc); allow the applicant and/or their agent and QP access to the site during normal working hours; and release the use of all trial data to the owners of the varieties included in the trial.

One trial at a time

Unless exempted in writing by the PBR office, all candidates and comparators should be tested in a single trial.

One CTC per genus

Normally only one CTC will be authorised to test a genus. Special circumstances may exist (environmental factors, quarantine etc) to allow more than one CTC per genus, though a special case will need to be made to the PBR office. More than one CTC may be allowed for roses.

One CTC may be authorised to test more than one genus. Authorisations for each genus will be reviewed periodically.

Authorised Centralised Test Centres (CTCs)

Following publication of applications for accreditation and ensuing public comment, the following organisations/individuals are authorised to act as CTCs. Any special conditions are also listed.

Name	Location	Approved Genera	Facilities	Name of QP	Date of accreditation
Agriculture Victoria, National Potato Improvement Centre	Toolangi, VIC	Potato	Outdoor, field, greenhouse, tissue culture laboratory	R Kirkham G Wilson	31/3/97
Bureau of Sugar Experiment Stations	Cairns, Tully, Ingham, Ayr, Mackay, Bundaberg, Brisbane QLD	*Saccharum*	Field, glasshouse, tissue culture, pathology	M Cox	30/6/97
Ag-Seed Research	Horsham and other sites	Canola	Field, glasshouse, shadehouse, laboratory and biochemical analyses	R Rudolph	30/6/97
Agriculture Western Australia	Northam WA	Wheat	Field, laboratory	D Collins	30/6/97
University of Sydney, Plant Breeding Institute	Camden, NSW	*Argyranthemum, Diascia, Mandevilla*,	Outdoor, field, irrigation, greenhouses with controlled micro-climates, controlled environment rooms, tissue culture, molecular genetics and cytology lab	J Oates	30/6/97
Boulters Nurseries Monbulk Pty Ltd	Monbulk, VIC	*Clematis*	Outdoor, shadehouse, greenhouse	M Lunghusen	30/9/97
Geranium Cottage Nursery	Galston, NSW	*Pelargonium*	Field, controlled environment house	I Paananen	30/11/97
Agriculture Victoria	Hamilton, VIC	Perennial ryegrass, tall fescue, tall wheat grass, white clover, persian clover	Field, shadehouse, glasshouse, growth chambers. Irrigation. Pathology and tissue culture. Access to DNA and molecular marker technology. Cold storage.	V Gellert M Anderson	30/6/98
Koala Blooms	Monbulk, VIC	*Bracteantha*	Outdoor, irrigation	M Lunghusen	30/6/98
Redlands Nursery	Redland Bay, QLD	*Aglaonema*	Outdoor, shadehouse, glasshouse and indoor facilities	K Bunker	30/6/98
Protected Plant Promotions	Macquarie Fields, NSW	New Guinea Impatiens including *Impatiens hawkeri* and its hybrids	Glasshouse	I Paananen	30/9/98
University of Queensland, Gatton College	Lawes, QLD	Some tropical pastures	Field, irrigation, glasshouse, small phytotron, plant nursery & propagation, tissue culture, seed and chemical lab, cool storage	D Hanger	30/9/98
Jan and Peter Iredell	Moggill, QLD	*Bougainvillea*	Outdoor, shadehouse	J Iredell	30/9/98
Protected Plant Promotions	Macquarie Fields, NSW	*Verbena*	Glasshouse	I Paananen	31/12/98
Avondale Nurseries Ltd	Glenorie, NSW	*Agapanthus*	Greenhouse, tissue culture with commercial partnership	I Paananen	31/12/98

Paradise Plants	Kulnura, NSW	*Camellia, Lavandula, Osmanthus, Ceratopetalum*	Field, glasshouse, shadehouse, irrigation, tissue culture lab	J Robb	31/12/98
Prescott Roses	Berwick, VIC	*Rosa*	Field, controlled environment greenhouses	C Prescott	31/12/98
F & I Baguley Flower and Plant Growers	Clayton South, VIC	*Euphorbia*	Controlled glasshouses, quarantine facilities, tissue culture	G Guy	31/3/99
Paradise Plants	Kulnura, NSW	*Limonium, Raphiolepis, Eriostemon, Lonicera, Jasminum*	Field, glasshouse, shadehouse, irrigation, tissue culture lab	J Robb	30/6/00
Ramm Pty Ltd	Macquarie Fields, NSW	*Angelonia*	Glasshouse	I Paananen	30/6/00
Carol's Propagation	Alexandra Hills, QLD	*Cuphea*	Field beds, wide range of comparative varieties	C Milne	30/6/00
Queensland Department of Primary Industries Redlands Research Station	Cleveland, QLD	*Cynodon, Zoysia* and other selected warm season-season turf and amenity species	Field, glasshouse, irrigation, tissue culture lab	D Loch	30/9/00
Luff Partnership	Kulnura, NSW	*Bracteantha*	Field beds, irrigation, shade house, propagation house, cool rooms	I Dawson	31/12/00
Ramm Pty Ltd	Macquarie Fields, NSW	*Petunia, Calibrachoa*	Glasshouse	I Paananen	31/12/00
NSW Agriculture	Temora	*Triticum, Hordeum, Avena*	field irrigation, glasshouse, climate controlled areas	P Breust	31/3/01
Bywong Nursery	Bungendore, NSW	*Leptospermum*	Field, shadehouse greenhouse	P Ollerenshaw	31/3/01
S J Saperstein	Mullumbimby NSW	*Rhododendron* (vireya types)	Field and propagation facilities	S Saperstein	31/12/01
Redlands Nursery	Redland Bay, QLD	*Osteospermum, Rhododendron*	Outdoor, shadehouse, glasshouse and indoor facilities	K Bunker	31/3/02
Ramm Pty Ltd	Macquarie Fields, NSW	*Euphorbia*	Glasshouse	I Paananen	31/3/02

The following applications are pending:

Name	Location	Genera applied for	Facilities	Name of QP
Yates Botanicals Pty Ltd	Somersby and Tuggerah, NSW	*Rosa*	Tissue culture lab, glasshouse, quarantine and nursery facilities	I Paananen
Outeniqua Nursery	Monbulk, VIC	Unspecified	Outdoor, glasshouse	
University of Queensland, Gatton College	Lawes, QLD	Ornamental & bedding sp., wheat, millet, *Prunus, Capsicum, Glycine, Ipomea, Vigna, Lycopersicon,* Asian vegetables, Tropical fruits, *Solanum*	Field, irrigation, glasshouse, small phytotron, plant nursery & propagation, tissue culture, seed and chemical lab, cool storage	D George M Johnston G Lewis G Porter D Tay A Wearing D Hanger

Comments (both for or against) either the continued accreditation of a CTC or applications to become a CTC are invited. Written comments are confidential and should be addressed to:

The Registrar
Plant Breeders Rights Office
PO Box 858
CANBERRA ACT 2601
Fax (02) 6272 3650

Closing date for comment: 21 June 2002.

APPENDIX 7

LIST OF CLASSES FOR VARIETY DENOMINATION PURPOSES[1]

As amended by the Council at its twenty-fifth ordinary session, on October 25, 1991.

[Recommendation 9
For the purposes of the fourth sentence of Article 13(2) of the Convention, all taxonomic units are considered closely related that belong to the same botanical genus or are contained in the same class in the list in Annex I to these Recommendations.]

Note: Classes which contain subdivisions of a genus may lead to the existence of a complementary class containing the other subdivisions of the genus concerned (example: Class 9 (Vicia faba) leads to the existence of another class containing the other species of the genus Vicia).*

Class 1: Avena, Hordeum, Secale, xTriticosecale, Triticum

Class 2: Panicum, Setaria

Class 3: Sorghum, Zea

Class 4: Agrostis, Alopecurus, Arrhenatherum, Bromus, Cynosurus, Dactylis, Festuca,Lolium, Phalaris, Phleum, Poa, Trisetum

Class 5: Brassica oleracea, Brassica chinensis, Brassica pekinensis

Class 6: Brassica napus, B. campestris, B. rapa, B. juncea, B. nigra, Sinapis

Class 7: Lotus, Medicago, Ornithopus, Onobrychis, Trifolium

Class 8: Lupinus albus L., L. angustifolius L., L. luteus L.

Class 9: Vicia faba L.

Class 10: Beta vulgaris L. var. alba DC., Beta vulgaris L. var. altissima

Class 11: Beta vulgaris ssp. vulgaris var. conditiva Alef. (syn.: Beta vulgaris L. var. rubra L.), Beta vulgaris L. var. cicla L., Beta vulgaris L. ssp. vulgaris var. vulgaris

Class 12: Lactuca, Valerianella, Cichorium

Class 13: Cucumis sativus

Class 14: Citrullus, Cucumis melo, Cucurbita

Class 15: Anthriscus, Petroselinum

Class 16: Daucus, Pastinaca

Class 17: Anethum, Carum, Foeniculum

Class 18: Bromeliaceae

Class 19: Picea, Abies, Pseudotsuga, Pinus, Larix

Class 20: Calluna, Erica

Class 21: Solanum tuberosum L.

Class 22: Nicotiana rustica L., N. tabacum L.

Class 23: Helianthus tuberosus

Class 24: Helianthus annuus

Class 25: Orchidaceae

Class 26: Epiphyllum, Rhipsalidopsis, Schlumbergera, Zygocactus

Class 27: Proteaceae

COMPLEMENTARY CLASSES

Class 28: Species of Brassica other than
(in Class 5 + 6) Brassica oleracea, Brassica chinensis, Brassica pekinensis + Brassica napus, B. campestris, B. rapa, B. juncea, B. nigra, Sinapis

Class 29: Species of Lupinus other than
(in Class 8) Lupinus albus L., L. angustifolius L., L. luteus L.

Class 30: Species of Vicia other than
(in Class 9) Vicia faba L.

Class 31: Species of Beta + subdivisions of the species Beta vulgaris other than
(in Class 10 +11) Beta vulgaris L. var. alba DC., Beta vulgaris L. var. altissima + Beta vulgaris ssp. vulgaris var. conditiva Alef. (syn.: Beta vulgaris L. var. rubra L.), Beta vulgaris L. var. cicla L., Beta vulgaris L. ssp. vulgaris var. vulgaris

Class 32: Species of Cucumis other than
(in Class 13 + 14) Cucumis sativus + Citrullus, Cucumis melo, Cucurbita

Class 33: Species of Solanum other than
(in Class 21) Solanum tuberosum L.

Class 34: Species of Nicotiana other than
(in Class 22) Nicotiana rustica L., N. tabacum L.

Class 35: Species of Helianthus other than
(in Class 23 + 24) Helianthus tuberosus + Helianthus annuus

1 From UPOV RECOMMENDATIONS ON VARIETY DENOMINATIONS, Adopted by The Council of UPOV on October 16, 1987, and amended on October 25, 1991

* The complementary classes have been added by the Office of the Union for the convenience of the reader and are given the numbers 28 to 35.

APPENDIX 8

REGISTER OF PLANT VARIETIES

Register of Plant Varieties contains the legal description of the varieties granted Plant Breeder's Rights. Under section 62(1) of the *Plant Breeder's Rights Act 1994* a person may inspect the Register at any reasonable time. Following are the contact details for registers kept in each state and territories*

South Australia
Ms Lisa Halskov
AQIS
8 Butler Street
PORT ADELAIDE SA 5000
Phone 08 8305 9706

Western Australia
Mr Geoffrey Wood
AQIS
Level, Wing C
Market City
280 Bannister Road
CANNING VALE WA 6154
Phone 08 9311 5407

New South Wales
Mr. Alex Jabs
General Services
AQIS
2 Hayes Road
ROSEBERY NSW 2018
Phone 02 9364 7293

Victoria and Tasmania
Mr. Colin Hall
AQIS
Building D, 2nd Floor
World Trade Centre
Flinders Street
MELBOURNE VIC 3005
Phone 03 9246 6810

Queensland
Mr. Ian Haseler
AQIS
2nd Floor
433 Boundary Street
SPRING HILL QLD 4000
Phone 07 3246 8755

Australian Capital Territory and Northern Territory
ACT and NT Registers are kept in the Library of PBR Office in Canberra
Phone 02 6272 4228

* In accordance with an amendment to section 61 of Plant Breeder's Rights Act 1994, the Register of Plant Varieties will be kept only in one location, the Library of PBR Office in Canberra. Please contact PBR office if you need further information.

APPENDIX 9

Common Name to Botanical Name Index

For varieties included in this issue

Abelia	*Abelia* x *grandiflora*
Agapanthus	*Agapanthus inapertus* x *Agapanthus orientalis*
	Agapanthus orientalis
Aglaonema	*Aglaonema* hybrid
Apple	*Malus domestica*
Apricot	*Prunus armeniaca*
Arrowleaf Clover	*Trifolium vesiculosum*
Barley	*Hordeum vulgare*
Blue Potato Bush	*Solanum rantonettii*
Boronia	*Boronia heterophylla* x *Boronia megastigma*
Box Honeysuckle	*Lonicera nitida*
	Lonicera nitida
Brachyscome	*Brachyscome* hybrid
Brunfelsia	*Brunfelsia latifolia*
Calibrachoa, Petunia	*Calibrachoa* hybrid
Canola	*Brassica napus* var *oleifera*
Capsicum	*Capsicum annum* subsp *annum* var. *pomiferum*
Cherry	*Prunus cerasus* x *Prunus canescens*
Chickpea	*Cicer arietinum*
	Cicer arietinum
Chicory	*Cichorium intybus*
Chrysanthemum	*Chrysanthemum indicum*
Cotton	*Gossypium hirsutum*
Creeping Bluegrass	*Poa annua*
Cupressocyparis	x *Cupressocyparis*
Durum Wheat	*Triticum turgidum* var. *turgidum*
English Lavender	*Lavandula angustifolia*
Etemoya/Custard Apple	*Annona squamosa* x *Annona cherimola*
Everlasting Daisy	*Bracteantha bracteata*
False Feather	*Cuphea hyssopifolia*
Fanflower	*Scaevola aemula*
Field Pea	*Pisum sativum*
Flamingo Flower	*Anthurium scherzerianum*
Freesia	*Freesia* hybrid
Gardenia	*Gardenia radicans*
Gaura	*Gaura lindheimeri*
Gazania	*Gazania* hybrid
Giant Water Gum	*Syzygium francisii*
Ginger	*Zingiber officinale*
Grape	*Vitis vinifera*
Grevillea	*Grevillea juniperina* x *Grevillea victoriae*
	Grevillea lanigera x *Grevillea lavandulacea*
Hebe	*Hebe* hybrid
Hop Bush	*Dodonae subglandulifera*
Impatiens	*Impatiens wallerana*
Impatiens Hybrid	*Impatiens flaccida* x *Impatiens hawkeri*
Italian Ryegrass	*Lolium multiflorum*
Lechenaultia	*Lechenaultia* hybrid
Lilly Pilly	*Syzygium wilsonii* subsp. *wilsonii* x *Syzygium leuhmanii*

Lily	*Lilium* hybrid
Limonium	*Limonium* hybrid
Lucerne, Alfalfa	*Medicago sativa*
Mandevilla	*Mandevilla* x *amabilis*
Marguerite Daisy	*Argyranthemum frutescens*
Michelia	*Michelia yunnanensis*
Nectarine	*Prunus persica* var. *nucipersica*
New Guinea Impatiens	*Impatiens hawkeri*
New South Wales Christmas Bush	*Ceratopetalum gummiferum*
Oats	*Avena sativa*
Paulownia	*Paulownia fortunei*
Pawpaw	*Carica papaya*
Peach	*Prunus persica*
	Prunus persica x *Prunus davidiana*
Pelargonium	*Pelargonium peltatum* x *Pelargonium* x*hortorum*
	Pelargonium x*hortorum*
Perennial Ryegrass	*Lolium perenne*
Persian Clover	*Trifolium resupinatum* var. *majus*
Persian Clover	*Trifolium resupinatum*
Peruvian Lily	*Alstroemeria* hybrid
Pittosporum	*Pittosporum tenuifolium*
Poinsettia	*Euphorbia pulcherrima*
Ptilotus	*Ptilotus obovatus*
Red Clover	*Trifolium pratense*
Rhododendron	*Rhododendron* hybrid
Rose	*Rosa* hybrid
Saltbush	*Atriplex nummularia*
Santa Barbara Daisy	*Erigeron karvinskianus*
Shore Juniper	*Juniperus conferta*
Spanish Cherry	*Mimusops elengi*
Spotted Dead Nettle	*Lamium maculatum*
Strawberry	*Fragaria* x*ananassa*
Subterraneum Clover	*Trifolium brachycalcinum*
Sugarcane	*Saccharum* hybrid
Sweet Cherry	*Prunus avium*
Sweet Quandong	*Santalum acuminatum*
Tall Fescue	*Festuca arundinacea*
Triticale	x*Triticosecale*
Variegated Croton	*Codiaeum variegatum*
Verbena	*Verbena* hybrid
Veronica	*Veronica spicata*
Waxflower	*Chamelaucium uncinatum* x *Chamelaucium megalopetalum*
	Chamelaucium megalopetalum x *Chamelaucium uncinatum*
	Chamelaucium uncinatum
Wheat	*Triticum aestivum*
White Clover	*Trifolium repens*
Zantedeschia/Calla Lily	*Zantedeschia sprengeri*
Zoysia Grass	*Zoysia japonica*

SERVICE DIRECTORY

ADVERTISE YOUR NEW VARIETY OR SERVICES IN THE

Plant Varieties Journal

Plant Breeders and their agents are invited to take this opportunity to promote their new plant varieties by advertising in the Plant Varieties Journal. Consultant Qualified Persons are also invited to advertise their services. The Journal is well circulated throughout the horticultural and agricultural industry. Advertising in the Journal will promote the commercialisation of new plant varieties and the services offered by the qualified persons. Our policy is to promote the varieties which are currently in the PBR scheme and the services of those who are currently accredited by the PBR office.

The Journal also has a Service Directory. This Directory is suitable for advertising the services provided by Consultant Qualified Persons, Agents, Patent Attorneys, CTC sites or photographers.

Advertising is available at a casual space rate as well as a four times rate, attracting a considerable discount of 25%! Advertisements will be published on the back cover or inside front and back covers. The front cover is restricted to full colour photographs of a PBR variety.

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For bookings or further information please contact Kathryn Dawes-Read on 02 6272 4338, fax 02 6272 3650 or email Kathryn.Dawes-Read@affa.gov.au

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DNA PLANTest is a commercial DNA analysis service offering genetic testing and genotyping of plants and plant materials.

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- Plant breeding support
- High throughput genotyping
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- Plant variety genetic identification
- SNP discovery and characterisation
- Support for policing of Plant Breeder's Rights
- Seed identification and varietal purity testing
- Quality assurance in food processing
- Food genetic purity analysis
- Forensic analysis of plants
- Microarray analysis.

CONTACT: DNA PLANTest

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