Winter







ORGANIC GROWING IN THE CANBERRA REGION

Quarterly publication of the Canberra Organic Growers Society Inc.



WINTER 2001

VOL. 9 NO. 2

1//inter







ORGANIC GROWING IN THE CANBERRA REGION

Quarterly publication of the Canberra Organic Growers Society Inc.



WINTER 2001

VOL. 9 NO. 2

Sty BEC Healthy City Canberra

Healthy City Canberra is an initiative of the Department of Health and Community Care and operates under the Healthy Cities principles set down by the World Health Organization. Healthy City Canberra facilitates partnerships between government, private and community sectors to improve health and quality of life in the ACT region. Our goal is to develop and support communities so that they are able to articulate their priority health and quality of life needs, and willing to engage with others to develop solutions that address those needs.

Canberra Organic Growers would like to thank Health City Canberra for the allocation of a grant to help us publish this magazine, buy new books for our library and help the community gardens with much needed funds.

Contents

From the Editor Deborah Avery & Steve Sutton	3
Committee members and helpers	4
President's Report Keith Colls	5
Community Garden Convenors' Reports Michelle Johnson, Steve Sutton	6
Recycling Without Guilt	9
Genetic Engineering News	10
Square Foot Gardening Joyce Wilkie	12
Healthy City Canberra	16
My Tomato Morning Betty Cornhill	21
From The Garden To The Pot Conrad van Hest	23
The Challenge of Growing Onions Michelle Johnson	24
2 nd Recycled Organics Conference	26
Winter Vegetable Planning Guide	28
About COGS	29
Membership Application/Renewal	30
COGS Notice Board	31

From the Editors

Welcome everyone! Just because the Winter's are cold in Canberra it doesn't mean you should forget about the garden. Winter should be a time of planning the next twelve months of activity. This is why we have included the article on Square Foot Gardening. It gives you an example of how planning can help you make the most out of your effects.

Many thanks to Health City Canberra for the support we have received in the form of a grant that has been used to improve the community gardens, buy new library books and help with the printing costs of *Canberra Organic*. You will find an article in this edition on some of there activities.

The editors are always looking for articles and photos from the membership about their gardening experiences and the methods you use to grow your produce. Half a page to a page is great. *Canberra Organic* gives us a way to communicate with each other and learn from each other. We are especially looking for plant profiles—the how and why.

Happy gardening ...

Steve Sutton and Deborah Avery

Email Address Updates

Many of you receive the flyer by email. This saves the organisation a lot of money, paper and time in distributing the flyer. Email also gives us a very efficient means of contacting the general membership quickly, easily and cheaply. However, one of the problems with email is that people change ISPs and forget to notify us of their new address so we get a lot of bounces. Others, after joining COGS, get an email account but again, forget to tell us. The upshot of this is that our list of email addresses is badly out of date.

To help us update the email address it would be greatly appreciated if those who receive the flyer (or any other correspondence) by email or would like to receive the flyer by email please send an email message to cogs@netspeed.com.au. Put EMAIL ADDRESS UPDATE in the subject field but leave the message field blank.

PO Box 347 DICKSON ACT 2602

CANBERRA ORGANIC GROWERS SOCIETY INC.

COMMITTEE MEMBERS & HELPERS

OFFICE BEARERS

President	Keith Colls	6251 7729	keithcolls@optusnet.com.au
Vice President	Steve Sutton	6292 5609	suttonsm@lightningpl.net.au
Secretary	Conrad Van Hest	6288 2443	zysyphot@netspeed.com.au
Treasurer	Adrienne Fazekas	6247 5882	afazekas@yahoo.com.au
Membership Secretary	Sigrid Drescher	6226 5086	sigandrod@interact.net.au
Editors	Deborah Avery	6231 8309	deboraha@interact.net.au
	Steve Sutton	6292 5609	suttonsm@lightningpl.net.au
Librarian	Maren Childs	6254 9927	maren.child@dynamite.com.au
Seed Librarian	Laurie Thompson	6288 7161	diamondjim@bigpond.com
Public Officer	Conrad Van Hest	6288 2443	zysyphot@netspeed.com.au

GENERAL COMMITTEE MEMBERS

Rosemary Stevenson, Laurie Thompson, Sandra Johnston

COGS FLYER

Pilots:

Vacant

MONTHLY MEETINGS

Book sales: Produce table: Supper convenors: Librarian: Murray Dadds Vacant Marie Bahr, Rosemary Stevenson Maren Childs

COGS REPRESENTATIVES

Conservation Council:Bren WeatherstoneEnvironment Centre:Steve Sutton, Deborah AveryGriffin Centre:Vacant

INQUIRIES ABOUT ORGANIC GROWING

Email:	cogs@netspeed.com.	au
Telephone:	Elizabeth Palmer	6248 8004

GARDEN CONVENORS

tter:	Michelle Johnson	6231 6219
arnwood:	Peter Marstin	6254 1278
rthside:	Margie Perkins	6241 6031
ks Estate:	George Rehn	6297 1036
eodore:	Steve Sutton	6292 5609
ndale:	Christine Carter	6231 5862
GS Backyard:	Conrad Van Hest	6288 2443
arnwood: rthside: ks Estate: eodore: indale: DGS Backyard:	Peter Marstin Margie Perkins George Rehn Steve Sutton Christine Carter Conrad Van Hest	6254 127 6241 603 6297 103 6292 560 6231 580 6288 244

COGS ON THE INTERNET

www.netspeed.com.au/cogs	Web Manager:	Maren Child	6288 2443	
cogs@netspeed.com.au	E-mail Coordinator:	Conrad Van Hest	6288 2443	

COGS monthly meetings are held on the 4th Tuesday of each month at 7:30pm in Room 4 of the Griffin Centre in Civic.

~ VISITORS WELCOME ~



Articles may be reproduced for non-profit, educational purposes. For other purposes, please obtain permission from COGS. Articles in the magazine do not necessarily reflect the views of the Society. Products and services offered by advertisers are not specifically endorsed by the Society.

Contributions are invited. Send on diskette (PC format, Microsoft Word files preferred) or e-mail to <u>cogs@netspeed.com.au</u>. Otherwise, send clean, typed copy.

There are four issues each year: autumn (February), winter (May), spring (August), and summer (November). The deadline for copy and advertising is 15 January, 15 April, 15 July, and 15 October respectively. Printing is done by AussiePrint on recycled paper. Illustrations courtesy of Joan Buckie. For advertising queries, please contact the editor.

PRESIDENT'S REPORT



Hello everyone. My name is Keith Colls and many of you will know that I was elected President of COGS at the last Annual General Meeting. This is my first President's Report for *Canberra Organic* and I would like to take this opportunity to introduce myself.

I have been growing fruit and vegetables in my backyard for about thirty years. For some time I had been aware of COGS through the COGS Quarterly which I had come across in various Canberra shops. A few years ago I decided to join COGS after a

visit to one of community gardens open days. I believe such gardens are valuable community assets and have an important social role to play in any community. The garden I visited was clearly well run and successful and I decided, there and then, to join COGS. I have been a member of COGS for several years now and I have been a member of the Committee for the last couple of years. When John and Margaret Allen moved to the South Coast about eighteen months ago I took over the role of COGS Treasurer.

I would like to congratulate all the members of the Committee who were elected at the last AGM. The new Committee is a mix of those who were previously Committee members and those who have decided to join for the first time. I would particularly like to thank the outgoing President, Steve Sutton, for all his effort in developing COGS into the healthy and active organisation it is today. Steve, as the new Vice-President, is now focussing much of his effort on developing the new COGS gardens. I would also like to thank our outgoing Vice-President, Rod Thirkelsen, for all his work on the Committee. Rod has resigned from the Committee. He has also resigned as Convenor of the Northside garden so that he can put more time into developing the mansion and gardens at Yass that he and Sigrid bought and moved into last year. The complete list of Committee members and their contact phone numbers and email addresses is on page 3. Please do not hesitate to contact any of us should you have any queries, suggestions or complaints.

The Committee has a very busy year ahead. In addition to the regular activities such as the monthly meetings and producing *Canberra Organic* we will be busy developing the new Community gardens, updating the membership and library data bases and revamping the COGS web page and adding additional material. We will also be further developing our seed saving activities. We will also be conducting a beginners gardening course in spring. This course will be presented in conjunction with CIT Solutions, so if you know of any potential gardeners ask them to keep any eye out for our course in the next Winter/Spring CIT Solutions Adult Community Education program booklet.

As you can see there are plenty of things to do and we still have vacancies for general Committee members. If you would like to become more involved in any of these activities (or anything else you think COGS should be doing) please volunteer for one of the Committee vacancies.

Enough of the bureaucratic and organisational stuff and down to the real business of COGS, growing our own organic fruit and vegetables. By the time you see this all the summer crops will have been eaten or preserved and stored away. Preparation of our gardens for winter will be completed or well underway and after a short rest it will be time to start thinking about spring plantings.

Happy gardening,

Leith

Keith Colls

Community Garden Convenors' Reports Our Growing Season at the Cotter Garden

Michelle Johnson

I don't think this season at the garden has been one of our most successful. A number of gardeners—including myself—have not had the opportunity to come to the garden very often and our garden has had a rather neglected look overall, rather than the wonderfully abundant and fertile look it usually takes on by mid -Summer.

For those that have tended their crops with their usual diligence and care the results have been very satisfying. The heat of January and February suited a number of crops such as eggplants and capsicums. Usually we worry that the season won't be long enough or hot enough for these crops, but not so this year! Eggplants matured and capsicums turned a bright red. Unfortunately the last of these crops were hit by the frosts at the garden in mid April. Tomato vines grew well but once more the sucker bugs badly affected the fruit. My beans and cucumbers on tall trellises did very well. I have grown the climbing cucumbers for a few years now and I've decided that they are easier to grow and harvest than those that sprawl over the ground.

One of our members harvested a wonderful crop of large pumpkins after the frosts. Lots of pumpkin soup! The pumpkins were a variety of colours from bluey-grey to pink. Apparently the vines were grown from seed saved at the garden last year and they show what a surprise you can get with saving seed from crops that can cross easily. Other gardeners harvested butternuts and golden nuggets, and an abundant supply of small yellow squashes. Home grown pumpkins seem to have so much more flavour than store-bought ones but come to think of it I could say that about most vegetables.

Crops were planted in summer to give welcome supplies of winter vegetables such as broccoli and cauliflower. It can be hard to leave space in the garden for these crops in Spring when there are so many delicious summer crops, but it is certainly satisfying to harvest your own vegetables in the colder months when there is not a lot of produce around.

The garden can rest over winter after we have tidied up, but peas are now planted for early Spring crops, so already we can look forward to next season's harvest!



6

New COGS Community Gardens

Kambah

We did a leaflet drop in the suburb to alert the residents of a public meeting to explain our plans to establish an organic community garden in their suburb. At the public meeting which was held at the proposed site on Saturday 28 May we had 22 people attend. We now have a list of 20 people who want to become involved in the garden. COGS has applied to the government to grant us a lease or licence to use the land. Once this has been done we will have a fence erected and call a meeting of the interested people so that they can become involved in the setting up of there garden. If you like to be part of this call Steve on 6292 5609.

Cook

COGS is still working through the final processes of the community consultation to be done before we can apply for the granting of a lease of this site. This has taken us a lot longer than was first anticipated. If things go well we should be able to start work on the garden in early June. Inquiries about becoming involved to Keith on 6251 7729.



Woden/Weston

COGS put in an application for the use of a piece of land at the back of Chifley, on the bottom of Mount Taylor. Our application was not successful and we have now applied for the use of land in Holder. Inquiries to Steve on 6292 5609.

Queanbeyan's first Community Garden

This garden will be part of the COGS community garden network. The group are doing a great job in meeting with interested parties and putting together an application for funding which goes to the council on 9 May. For further information ring Katrina on 6232 9743.



Kurrajong Organic

New! Bulk beef and lamb available from the farm of Alan Druce. Call for prices

- ✓ 10% discount to members of COGS, PACT, & Environment Groups
- ✓ Free delivery with orders over \$30
- ✓ All certified organic by BFA or SCPA

For Poultry and animals

Organic Grain for your hens for 11¢ a day!

Wheat - 25kg bag \$14.50, <25kg 75¢ kg

- Special Birthday Mix (formulated for maximum egg production, ingredients vary with availability) 25kg bag \$27.50. (Use 50/50 with wheat)
- KOS Good start and KOS Accelerator, chick starter and grower kibble 25kg bag \$27.50, < 25kg \$2kg
- Sunflower 25kg bag \$27.50, <25kg \$1.30 kg
- Bird grit 50¢ kg
- Vitagrit vitamin mineral grit health supplement 5kg bag \$7.50, <5kg \$2 kg to ensure beak performance
- Oats 25kg bag \$11.50, <25kg 50¢ kg, Barley 25kg bag \$13.50, <25kg 50¢ kg or make beer, mmm beer
- Sulphur \$3.30 kg
- Seaweed meal 15kg bag \$66, <15kg \$8 kg
- Hay, Lucerne market price varies
- Homeopathics for: coccidiosas, worms and lice in poultry and fleas in dogs and cats cheap, safe and effective \$4.95 each
- 'Pestaffect' External Parasite diatomaceous earth powder poultry & caged birds livestock 1kg bags \$14
- Pullets, Hens, Chook Houses, Waterers, Feeders, False Eggs pinup posters of roosters
- Drums 44 Gallon, safely store grain, clothes, anything. \$17.50 ea
- Hire of non-lethal mouse, rat, sparrow traps, bag closer sewing machine

For the Garden

- Biodynamic Fish Emulsion 2.5 litres \$16.50, for balancing the fertility of your garden
- Biodynamic Manure Concentrate, enough for the compost & a huge garden 250g pack \$12.50
- Chicken Manure 20kg bag \$8.50, 40kg bag \$16.50
- Micro Nutrient King Liquid Seaweed Concentrate 500ml pack \$9 each
- Worm juice \$7.50 litre, Liquid comfrey concentrate \$6.50 litre
- Alroc (crushed mineral rock mix) 20 kg bag \$17.50, <20kg \$1.80 kg
- Garden lime 50¢ kg (free soil pH test available)
- Diatomaceous earth/garlic spray, 500ml \$6.60
- Mulch, Lucerne market price varies
- Water tanks, diverters, feed and water troughs, etc. we can beat most quotes
- Frog Pond Ecology Kits \$27.50 includes captive bred tadpoles, water plants, zoo plankton, pond inoculant
- BD Potting Mix/Compost 36lt bag \$11, by the cubic metre \$110 plus delivery



Contact Morgan or Lianne Kurrajong to discuss your requirements 8 am - 5 pm weekdays, or leave a message Ph: 6230 4846 Email: morgan@ko.inspired.net.au Mob: 041 352 0293 More info: www.kurrajongorganic.inspired.net.au

Canberra Organic Growers Society Inc. Canberra Organic May 2001

8

Recycling Without Guilt

Maren Child

Is guilt a good way to make people to recycle? Not according to Gerard Gillespie, who spoke at a recent COGS meeting. Better strategies for encouraging recycling focus on business and economic reasons, and the preservation of the environment. Gerard gave two examples of successful recycling: a test program in New Zealand, and a successful program in the Islands where cardboard packaging was combined with pig farming to produce worms and compost.

One of the problems with our current thinking about recycling is that systems are designed with the inputs in mind rather than the desired outputs. Where do you stop with the multiple bins—one for glass, one for paper, one for green waste, one for rubbish—this system serves neither recycling nor the consumer well. Incineration is dangerous to health, being linked to increased cancer cases. The real cost of landfill is about \$60 per ton, compared to composting which costs around \$30 a ton and has a saleable output.

Meanwhile, Gerard says, our gene pool is under threat and our land is steadily being depleted of organic matter: some Australian soils have as little as 1 percent organic matter. This leads to an increased use of chemicals in farming, susceptibility to drought, and produce which does not supply adequate minerals and vitamins, so that consumers have to buy supplements. There is an urgent need to move organic waste from cities to agricultural areas instead of literally wasting it in landfills.

The Allergy Centre

We have a large range of Allergy Foods, Organic & Biodynamic Grains, Dried Fruit, Nuts, Flours, Breads, Goats Milk, Meat, Yoghurts, etc.

Consultations by appointment

Kaye Green N.D. Allergy testing Naturopathic Consultations Accredited Member A.N.T.A.

Carole Nicola Qualified Therapeutic Masseur

Consultations covered by most health funds

Contact: Costas Kounas Shop 3 Jamison Centre Bowman Street, Macquarie ACT Phone: 6251 2670 Concrete, demolition waste and green waste are the largest components of the waste stream, and much of this could be retrieved and used. Once you take toxic materials out of the waste stream, you can think of it as a resource retrieval system instead of a waste management system.

The New Zealand project was designed for areas where there are large numbers of urban poor, with the goal of taking toxics and organic wastes out of the waste stream. Plastic bags, with colour coded clips for different types of waste, were sold for \$2 at the supermarket. The waste disposal company would only collect these special bags, which were simply placed in the garbage bins. The user pays and the system costs less to operate, while still creating jobs.

We need to encourage local governments to adopt a long-term management strategy of zero waste. Consumers and local businesses will support a strategy that makes good economic and environmental sense, and moves organic matter from the cities back to the agricultural areas where it is needed.



GENETIC ENGINEERING NEWS

2001: A Seed Odyssey

Annual Update on Terminator and Traitor Technology by the Rural Advancement Foundation International

Suicide Seeds: Not Dead Yet!

Issue: Syngenta, the world's largest agrochemical corporation (created last year with the merger of Novartis and AstraZeneca) won its newest Terminator patent in November 2000.

US-based Delta & Pine Land Co. vows to commercialise suicide seeds. Ironically, with increasing evidence of genetic pollution (that is, the escape of engineered genes from genetically modified (GM) crops via pollen), the US government, the biotech industry and some scientific bodies are promoting Terminator technology as a technical 'fix' for gene escape from GM crops. Promotion of suicide seeds as a tool for 'biosafety' is an illogical and unacceptable argument to justify commercialisation of Terminator and Traitor technology.

Impact: If commercialised, Terminator and Traitor seeds will destroy national seed sovereignty and threaten global food security, especially for the 1.4 billion people who depend on farm-saved seeds and local plant breeding. If the Gene Giants are allowed to develop a new generation of GM plants whose traits can be switched on or off with the application of proprietary chemicals, bioserfdom is the inevitable outcome. New patents describing genetically modified plants with weakened immune systems that would ultimately depend on the application of a chemical to regain their natural defenses against pests and disease are the most troubling examples of Traitor technology to date.

The ultimate goal of genetic seed sterility is neither biosafety nor agronomic benefits, but bioserfdom.

Background: Terminator technology, the genetic modification (GM) of plants to produce sterile seeds, has been widely condemned by civil society, scientific bodies and many governments as an immoral application of agbiotech. If commercialised, Terminator would prevent farmers from re-using seed from their harvest, forcing them to return to the commercial seed market. Fertility is just one of many genetic traits that corporate scientists can switch 'on or off' with the application of an external chemical. 'Traitor' refers to genetic trait control technologies .hat could impose chemical dependencies in agriculture with grim implications for farmers, food security and the environment.

The Green Gene Defense: Apologists for Terminator

Proponents of Terminator argue that engineered sterility could play a valuable role in controlling the escape of engineered genes from GM crops to related plants and wild relatives. Engineered sterility offers a built-in safety feature, they claim, because if genes from a Terminator crop escape into the wild, the seed produced from unwanted pollination will not germinate.

The argument is not new. Ironically, in the face of increasing evidence of cross-pollination from GM crops, the 'Green Gene' defense of Terminator is gaining ground. Several recent reports issued by scientific bodies make the dangerous suggestion that there are environmentally friendly and acceptable uses for Terminator because it could be used to prevent unwanted gene flow in GM crops. Not very long ago, scientists downplayed the potential problem of escape of engineered genes from GM crops. Today we are being asked to accept engineered sterility as a biosafety bandage for GM crops with leaky genes.

With Traitor technology, a more frightening scenario unfolds: proprietary seeds will be biologically bound with company chemicals in such a way that they are completely dependent on one another. Farmers will have no choice but to use both, and will depend on a handful of companies for virtually all traits and inputs.

Missing Immunities

Especially alarming are patents describing plants that have weakened immune systems. Last year, Action Aid, Berne Declaration, GeneWatch and the Swedish Society for Nature Conservation identified three new Novartis patents of this type. DuPont holds a more recent patent which involves reducing a plant's natural disease resistance. In most cases. the inventors claim that they are developing 'immune-compromised' plants for research purposes, to test the efficacy of fungicides, to examine plant-pathogen interactions, or to enhance disease resistance, for example. But some patents suggest otherwise and the work is not merely theoretical.

To be clear, the stated aim of most of these patents is to modify plants for *enhanced* disease resistance. The desired trait, of course, would depend on the application of an external chemical inducer. (Farmers could be required to use a proprietary chemical in order to take advantage of the desired trait.) But the patents also describe the development of plants whose natural immune system is disabled, and would therefore be highly vulnerable to pests and disease—unless chemicals are used to restore the plant's missing immunities.

For example, an earlier Novartis patent (now owned by Syngenta), US Patent No. 5,804,693, describes genetically modified 'universal disease susceptible' plants which produce reduced levels of salicylic acid—a key mediator of plant resistance to a wide variety of pathogens (bacteria, fungi, viruses). The inventors subsequently modified a 'disease sensitive' plant to express the Bt gene for insect resistance, but only when triggered by a chemical inducer. Such plants would be unusually vulnerable to bacteria, fungi and viruses, unless immune responses are also re-engineered back into the plant. Restoration of immune responses would also be subject to regulation by external chemicals.

GE-FREE FOOD LIST AVAILABLE

Send SASE to: Martin Oliver Gene-Ethics Network Northern Rivers C/- BSEC, 123 Keen Street Lismore NSW 2480 Would agrochemical companies intentionally create weakened plant strains? They already have. Would they attempt to commercialise 'disease susceptible plants' that require the application of a proprietary chemical to restore missing immunities? There is nothing to stop them.

Action by national governments around the world will determine the future of Terminator and Traitor Technology. Intergovernmental organisations have a critical role to play in raising global awareness and formally banning these technologies. Key international fora in 2001-2002 include:

World Food Summit Five Years Later: When heads of state meet on 9–15 November 2001 in Rome they have the opportunity to re-affirm the recent findings of FAO's Panel of Eminent Experts on Ethics, which concluded that Terminator seeds are unethical, and recommend that member nations ban the technology. They will also have the opportunity to draw on the findings of a report now being produced by FAO's Commission on Genetic Resources for Food & Agriculture, which will examine the socio-economic impacts of genetic use restriction technology (GURTs).

The 1972 Biological and Toxin Weapons Convention: The BTWC will hold its Review Conference in November 2001 for the purpose of reviewing and strengthening the Convention of 1975, ratified by 143 governments. The BTWC Convention must recognise Terminator/Traitor technologies as potential biological weapons and violations of the Treaty.

COP6: The Sixth Conference of the Parties to the Convention on Biological Diversity meets in The Hague, 8–26 April 2002. After numerous studies on genetic trait control technology, COP6 should be prepared to recommend a ban on Terminator as an anti-farmer technology that threatens biodiversity and national seed sovereignty.

UNCED's Rio+10: Over 100 Heads of State meeting in South Africa in mid-2002 (date to be determined) will have the opportunity to call for a ban on Terminator and Traitor technology as an immoral application of genetic engineering that threatens biodiversity and development.

This article was edited by Bridget Farrer—the full text is available at the RAFI website: www.rafi.org

Square Foot Gardening

Joyce Wilkie

The following article is from the notes of a talk that Joyce presented to COGS in 1988. It has been reprinted to provide an example of how you can plan your own vegetable growing

'Square Foot Gardening' is a name coined by Mel Bartholomew to describe an intensive, highly methodical form of gardening that he has promoted both on public television in the United States and in two books that he has written (see references). There is nothing radically new in any of his gardening procedures. What is different from conventional methods is his emphasis on continuous cropping of small plots of ground. What is offered is a very detailed and logical method for producing either:-

- a continuous supply of a wide variety of vegetables to feed a family (Figure 1); or
- a steady supply of several varieties of vegetables that can be sold to provide a small cash income.



Figure 1 A typical square foot garden offers a variety of vegetables

By using square foot methods it is possible to avoid both the late summer glut of vegetables and the winter shortage, experienced by many gardeners.

In the following article I will outline Bartholomew's methods. He is not strictly an organic grower, however this does not detract from his method, which can be used in any organic garden.

Method

Planning the garden layout

The philosophy that the idea of square foot gardening can be summed up by the following quotation from the book *Cash from Square Foot Gardening:* "Why did we grow so much and why was it all ready to harvest at the same time?...We're still being taught by most experts to grow crops in long single rows, and now the latest fad is double or triple rows or even wide rows, as if a single row fifteen feet long didn't produce enough lettuce all at once. What's a home gardener going to do with thirty heads of leaf lettuce in one week? Now we're supposed to grow triple rows and raise ninety heads'!!

The square foot method gets right away from planting in rows. Instead as system of rectangular beds is used. The beds are worked only from their edges making it possible to totally fill the growing areas with vegetables. It works out that almost all vegetables can be spaced using a 1-foot square grid. This makes the garden layout and the organisation of plantings very straightforward. In order to keep the beds full and continually productive you need only think about 1 square foot at a time. This is exemplified by radishes (Figure 2) which are planted 16 per square foot. If your family eats, on average 16 radishes in a week then plant out 1 square foot on a weekly basis. Once the radishes start to mature each square foot is simply harvested and immediately resown.

The most efficient garden layout is a system of 4foot wide beds. The length of the beds and the width of the aisles separating them will depend on your individual requirements regarding efficient use of the space available (Figure 3).

Figure 2 By planting a new square foot of radishes each week, the home gardener can have a weekly supply of 16 radishes.







If you're going to have nine 4'x4' (16 square feet) planning squares, here's how aisles of different widths would affect the percentage of your overall garden space devoted to growing:

Aisle Width	Growing Space/ Garden Space	Efficiency of Space Used
12"	16 sq. ft. x 9=144 sq. ft. 14' x 14'=196 sq. ft.	144/196=73%
18"	16 sq. ft. x 9=144 sq. ft. 15' x 15'=225 sq. ft.	144/225=64%
24"	16 sq. ft. x 9=144 sq. ft. 16' x 16'=256 sq. ft.	144/256=56%

Construction of Beds

Borders

It is important to delineate the beds by bordering them. The recommended method is a system of

raised beds surround by wooden sides at least 6 inches high. These can be very simple, however, well built edgings designed to support covering frames are worth the extra effort in a place like Canberra where the growing season is short (see section on Covers).

Soil

Square foot gardening is an intensive method therefore the soil should be the very best possible. Given that the beds are small and contained this is not too difficult to ensure. Initially the existing soil is dug and loosened then the best possible soil is added on top to fill the bed. The perfect soil is filled with humus, which acts as a sponge to hold moisture in the soil, but at the same time allows drainage of any excess water. Peat moss, vermiculite and well-rooted manure are all sources of humus. The texture of the perfect soil is loose, uncompacted, well drained, and friable-it should be full of earthworms. The square foot method recommends buying planting mix as an easy and quick but expensive option. Organic gardeners, however favor making such soil by composting and by heavy mulching. My own experience with mulching, and the results of generating soil, using weeds heaps as is done in the COGS community garden, have convinced me that extremely healthy and productive soil can be generated quite quickly and cheaply. With square foot gardening even more emphasis must be placed on the maintaining the fertility of the soil and so continuous composting and recycling of organic waste is an absolute must.

Vertical Plant Support Systems

All vine crops are most efficiently grown vertically on trellises. This not only saves space but allows watering and harvesting. The fruit is kept off the ground and so ripens more evenly and is less susceptible to rotting and attack by pests. These supports have to be strong and the size of the mesh will depend on the crop.

I use 6-inch weldmesh for beans, tomatoes and pumpkins; and chicken wire for peas and cucumbers. I tie the mesh to star pickets, which are strong and are easy to move to different locations (Figure 4). However, it is possible to build frames onto southern sides of your beds if you have strong well-constructed borders (Figure 5).

Figure 4 This garden can be used for tomatoes, cucumbers, and other crops



Figure 5 Locate frame 6 inches in from box end, and start the wire mesh about 6 inches above the soil level



Covers

With a set of beds all four foot wide it is easy to devise a system of hoops or wire tunnels that can be moved around the garden and used to support a cover of either:-

- shade cloth to protect young seedlings when newly transplanted or when the temperature is high; or
- plastic to form a mini green house/cloche in early spring and autumn (Figure 6).

Figure 6 Moveable hoops are used to support shade cloth or plastic covers.



Planting

Plants are divided into four sizes (Figure 7a and 7b):

- 1. Extra large 1 plant per square foot
- 2. Large 4 plants per square foot
- 3. Medium 9 plants per square foot
- Small 16 plants per square foot

To start with use string or a template made from wire mesh to help with the spacing of seedlings. For seeds that go directly into the soil just place 2 or 3 seeds at the correct spacing and once germinated snip of all but the strongest with a pair of scissors.

Planning Your Plantings

Sitting down with a paper and pencil and working out exactly what your needs are is an important part of square foot gardening. By creating a table it becomes quite a simple matter to work out how much and how frequently you have to plant.

Starting seeds

Methods for planting seeds are many and varied. The main point here is to plant a few seeds at a time but regularly every week or every fortnight according to your needs or the time of the year.

Transplanting

As soon as the seeds are up prick them out into individual containers to allow them to grow into good size plants ready for planting out. At all times aim to have a steady supply of seedlings to go into the garden beds.

Figure 7a



Figure 7b



Tomatoes, squash, and muskmelons require a square foot per plant.



Set cucumber plants six inches apart in vertical gardening

*		A	*	*	de	4	A	A	æ	A	s.	ø	de	s	A
-	-	-	4	4	4	*		de	4	de	4	4	A	A	A

A double row of peas or pole beans can be planted this way.

Harvesting and replanting

With only a limited number of plants maturing at one time it is easy to harvest the vegetables while they are at their prime. As soon as each square foot becomes vacant prepare it for planting the next crop. At this stage it is advisable to top up the soil with some compost and another helping of mulch.

Square Foot Gardening for a Cash Return

There is little profit for the backyard gardener in growing for the retail market. The competition is too high from the commercial growers and the retailers take too big a slice of the profit. It is much better to sell directly to the consumer who, in general, will be like you and will want a continuous supply of a variety of vegetables. The transition from growing for your family to growing extra in order to get a small income is therefore just one of scale. Increase the number or length of your four-foot wide beds and plant out a few extra square feet of each vegetable every week.

Conclusions

The main reason why people are interested in organic gardening is because they want fresh, wholesome vegetables as a regular part of their diet. A massive planting of the whole garden in the spring will give you plenty to eat in the summer and some extra to bottle or freeze for the winter but too often the winter garden is neglected and there is little continuity of the crop. This results in most people having to supplement their vegetables from the shops for guiet a number of months. Regular sources of organic vegetables are almost non existent in Canberra at present and so if nothing else is gained from the concept of square foot gardening but the determination to plant a small number of seeds on a regular basis throughout the year (and there are lots of tasty and interesting winter vegetables) you will be guaranteed vegetables year round. By dividing your garden up into small manageable sized plots the workload is in fact reduced-you garden more efficiently. There is an added advantage of continuous plantingcontinuous attention-plants thrive on it. If you fully encompass the square foot method not only can you feed your family well but also your vegetables can provide a supplement to your income. Organic vegetables, in good condition, are hard to come by; they therefore command premium prices.

References

Square Foot Gardening by M. Bartholomew, Storey Publishing, Vermont Cash from Square Foot Gardening by M. Bartholomew, Storey Publishing, Vermont Healthy City Canberra

3 ¥ Y I

Healthy City Canberra is an initiative of the Department of Health and Community Care and operates under the Healthy Cities principles set down by the World Health Organization. Healthy City Canberra facilitates partnerships between government, private and community sectors to improve health and quality of life in the ACT region. Our goal is to develop and support communities so that they are able to articulate their priority health and quality of life needs, and willing to engage with others to develop solutions that address those needs.

Healthy City Canberra defines health broadly and works with a broad cross section of people and organisations to promote health and wellbeing in the ACT. The fundamental elements of a Healthy City approach are:

- the involvement of communities in determining both their health and wellbeing goals and the priority with which these goals are addressed, and
- the development of partnerships across government sectors, non-government agencies, educational institutions and the business sector to address these goals.

In the past year a series of community consultations and Citizen's Jury meetings were held to elicit the health and wellbeing concerns of Canberrans. This information has been used to shape the direction of the work that Healthy City Canberra will do this year. We extend our understanding of the term 'community' to include the health promotion community, the research community and the business community. We have also consulted with non-government agencies, health promotion colleagues, and government departments to share information about ongoing and upcoming activities, develop health promotion strategies. and build partnerships to achieve health and wellbeing goats for the ACT region.

Healthy City Canberra works with schools, neighbourhoods, hospitals, workplaces and indigenous communities. Our efforts may take the form of specific projects, general support for health promotion, or activities that recognise and validate health promotion in those environments.

Healthy City Canberra works with people in a number of ways. We involve individuals in our **community consultations** as a way of empowering them to articulate their health and wellbeing concerns and priorities. We also work with communities to help their members develop personal skills that assist them with making healthier choices.

Healthy City Canberra is actively working to strengthen communities and their ability to articulate, priorities and solve health and wellbeing issues. In the coming months, Healthy City Canberra will be examining successful community consultation models to develop our own ongoing way of consulting with Canberrans. This may include community meetings around specific topics, community education sessions, community surveys and/or focus groups. We aim to develop an effective method of learning what the ACT community's health issues and priorities are. We also hope to develop an effective way of providing feed back to the broader public in relation to the work we have done to address their health and wellbeing issues.

In response to comments we received in our community consultation, we will work with people in a neighbourhood to develop a **community** garden. We want this to be a place where all members of that community can come together and engage in a healthy activity, grow nutritious food, and work together to develop closer links and a greater sense of 'neighbourhood'. We are discussing sites for this project with ACT Housing and we hope to develop a partnership with some local businesses to help build and supply the materials for the garden beds.

Healthy City Canberra has carriage of two of the recently announced **Social Capital projects**. Both projects focus on building skills in people that wilt help them make healthier choices.

The first, the **Well Babies Project**, will promote health and well being from the time of conception, focussing on good nutrition, reducing alcohol consumption and stopping smoking in pregnant women. Social supports will be provided to pregnant women with the aim of improving the

birth weight of children born to mothers at risk. The focus of this project will be an awareness and in formation campaign supported by skills development activities for at-risk mothers. Target group goals will include improved nutrition, reduced alcohol consumption and smoking The project will liaise with Family cessation. Planning, the Women's Centre for Health Matters, ACT Community Care, the Pharmaceutical Society of Australia and other organisations with experience delivering women's in health promotion programs.

The Child and Youth Nutrition Project will address issues of child and youth nutrition and eating disorders. Focussing on developing positive and sustainable eating habits, the project also aims to increase awareness of the healthy weight range. The focus of this project will be schools and community-based education and skills development activities for children, young people and those involved in the preparation of food for young people and children. Preliminary discussions have taken place between Healthy City Canberra and ACT Community Care regarding ongoing projects that directly relate to the objectives of this project. Potential partners that wilt be explored in the development of this project include the Department of Education and Community Services, the Health Promoting Schools Network, the Heart Foundation and the ACT Schools Canteens Association.

In 1999 Melrose Primary School was the inaugural recipient of the \$10,000 main prize in the Healthy Schools Reward Initiative for their Families and Schools Together (FAST) program. FAST is a new early intervention program for children and families that supports children 4 to 9 who are experiencing learning and behavioural difficulties. It is a structured and program involving collaboration interactive between the school, parents family support and alcohol and drug family support and alcohol and drug agencies. The impact of this program on the families of children attending Melrose Primary has been great. After only one term, the school reported a long list of new families expressing interest in joining the program. In 1999/2000 Healthy City Canberra provided a small amount of funding for those running the FAST program to

undertake further training to expand the program to high schools.

Healthy City Canberra recognises the value of the people within our organisation as well. We encourage personal as well as professional growth and development in our individual training plans. Each staff member analyses and priorities their needs in terms of personal and professional development, then discusses these needs with the rest of the team. Then an individual training plan is developed that accommodates as many of these needs as the training budget will allow.

> Organic Origins

Gardeners With Attitude



Who are we?

Organic Origins is a Co-operative Enterprise based on Permaculture and organic gardening principles. Offering consultancy services and books. Community Education, Garden Design & Management, Herbs & Vegetables, Mulches & Manures, Compost Bins, Worm Farms, "No Dig", Raised & Easy Care Gardens, Creative Recycling, and Foodscaping, Big & Small.

David Read or Dave Tooley 0409 070 189 Email: kdread@primus.com.au This year training for individual staff members includes internal staff training offered through the Department of Health and Community Care, computer and technical skills training, and community development training. Two staff members recently attended a one week intensive short course on Healthy Cities and Communities conducted through Flinders University in South Australia. Healthy City Canberra staff also support each other's development through mentoring, active workplace democracy and ongoing feedback about our work.

The development of partnerships is a fundamental aspect of the Healthy City philosophy. The work of Healthy City Canberra is guided by the Healthy Capital Coordination Group composed of the Ministers for Health, Urban Services and Education as well as the Director of the ACT Council of Social Services and the Chair of the ACT Health Promotion Board. This helps us to be aware of activities across government departments and in other community-focused agencies.

Healthy City Canberra also works to achieve health and wellbeing goals set by the people of Canberra through the development of strategic alliances or partnerships. These partnerships span government, community and private sectors. Examples of partnerships that Healthy City Canberra works with include:

- The ACT Health Promotion Coordination Group. This is a partnership of agencies involved in health promotion and includes ACT Community Care, Calvary Hospital, the Canberra Hospital, Healthpact and Healthy City Canberra. This group works to share information, support each other in health promotion efforts, and coordinate strategic direction in heath promotion wherever possible. The group also serves as a reference group for the development of the Department of Health and Community Care's Strategic Plan for Health Promotion.
- The Physical Activity Task Force is a group of sport and health promotion agencies who initially came together as reference group for the review of exercise stations in the ACT but has since moved on to discuss broader

activities to encourage physical activity in the ACT.

- The Residents of Childers and Kingsley Streets (ROCKS). This is a group of community organisations housed in premises in the heart of Canberra bounded by Childers, Kingsley and Hutton Streets. They have united to develop a community design brief for their area; one that will ensure sustainable development within the context of a shared community vision. Healthy City Canberra provides in-kind support for this group and assists in their collaborative work with organisations such as Planning and Land Management and Healthpact.
- Healthy City Canberra has been involved in the Health Partnerships for Active Australia and has worked with other members of this group to underscore the importance of physical activity and to develop the Physical Activity and Health Forum 2000.
- Healthy City Canberra works across a range of projects with various government departments other than Health and Community Care. These include the Chief Minister's Department, Education, Environment ACT, Planning and Land Management, ACT Housing, and the National Capital Authority.
- Healthy City Canberra has recently become involved in a partnership with Business Australia. Healthy City Canberra has a regular column in the Business Australia newsletter and plans are being developed for a series of seminars on healthy businesses and workplaces for members. It is hoped that this partnership will lead to improved participation of local businesses in health promotion activities.
- Healthy City Canberra works with both the National Centre for Epidemiology and Population Health at the Australian National University and the Department of Health and Community Studies at the University of Canberra. Healthy City Canberra aims to support the rationale for its projects with academic and practical evidence. We also aim to add to the evidence base for health promotion by contributing to academic conferences, workshops and journals.

Healthy City Canberra strongly supports participation and the positive social capital that often arises from it. Listed below are a few examples of the kinds of participation we both engage in and encourage.

- Healthy City Canberra takes the view that participation in **networks** is an essential role for an effective Organisation. Apart from the partnerships mentioned above, Healthy City Canberra is actively involved as a member of:-
 - the Australian Health Promotion Association;
 - the Public Health Association of Australia (particularly the Health Promotion Special Interest Group);
 - the Western Pacific Regional World;
 - the International Healthy Cities Network;
 - the recently formalised Antipodean Healthy Settings Network;
 - the International Union of Health Promotion and Education; and
 - the ACT Health Promotion Network. (We also participate in the Health Promoting Schools Network and the Health Promoting Hospitals Network.)
- In 1999 Healthy City Canberra coordinated the ACT's participation in Walk to Work Day. This event promoted walking as an important transport mode and a healthy activity, encouraging Canberrans to take up walking as a form of physical activity and participation.
- Our Post-Olympic Activities Awards build on a Healthpact initiative that offers funds to organisations that actively encourage their members to participate in physical activity. Healthy City Canberra is offering awards to agencies that most effectively achieve the aims of this scheme.

Need More Room to Grow (your vegies!)?

I have a very large, empty, uninterrupted, open, sunny, unused backyard area in Aranda. If there is anyone in COGS who would like to use it to grow vegetables, please contact me on 6251 3570. It has never had chemicals of any sort applied to it. Area is approximately 150 square metres.

Victoria Grounds

Healthy City Canberra aims to ensure that all of its **projects** are participative from the initial needs assessment phase through design, implementation, and evaluation. Several of our projects such as the community garden and the social capital projects will encourage communities to take a more active role in dealing with health and wellbeing issues that they have nominated.

For more information on any of our work, ring the Healthy City Canberra office on 6207 9527.



Beautiful Holiday House

Just across the road from the beach at Garden Bay over the hill from Malua Bay surf beach.

Two minutes walk to sandy beach good for swimming, snorkelling, or teaching children to swim.

Easy drive to many other lovely beaches. House sleeps eight, large fenced garden where children can play within sight.

Pets welcome.

Cool sea breeze in summer, warmer than Canberra in winter.

\$190 per week outside holidays or \$80-\$90 for a weekend by the sea.

Only 166 kms from Canberra. Take visiting friends and relatives to see the South Coast.

Telephone Brian or Jackie on 6254 4977, or Betty on 6249 8323 for bookings and holiday prices.



SPECIALISING IN BULK ORGANIC FOODS

- Whole Grains & Freshly Milled Flour
- Herbal Remedies
- Aromatherapy Oils
- Fresh Nut Butters
- Take-away Vegetarian Lunches

14 BARKER STREET GRIFFITH ACT 2603 ph: 6295 1474

Fax: 62951707

Welcoming you and offering fresh and delicious certified organic / biodynamic fruits and vegetables, nuts and dried fruits from local sources and afar.

Quality Australian produce chosen for its flavour is offered through the shopfront or via our easy home delivery service.

- Bulk Buy Discount (10-20% OFF) on 1-2kg or more on most lines.
- Lending Library (books, audio, video) on matters nutritional and healing.

Long Live Good Food!



Griffith Shops

BARKER STREET GRIFFITH ACT 2603 Ph: (02) 6295 6700 Fax: (02) 6295 6701

Open: Monday to Friday 9am-7pm Saturday 9am-5pm



CERTIFIED BIODYNAMIC and ORGANIC MEATS

Home Made Sausages - Game Meats Quality Meats & Poultry Bulk Orders Richard Odell 10 BARKER STREET GRIFFITH ACT 2603

ph: 6295 9781

My Tomato Morning

Betty Cornhill

All the working spaces in my kitchen were covered with tomatoes, and Gary at Northside garden had fired me with enthusiasm to try sundried tomatoes, especially as we have had so much very hot sun lately. I cut up some tomatoes, placed the slices on a black plastic tray in the sun in the greenhouse. It was very hot in there—good for drying, I thought.

Of course there had to be a thunderstorm in the night, and this morning there was no sun, so I thought. 'My tomatoes will go mouldy.' I fetched Sigrid's article in the last quarterly which had also fired me with enthusiasm to try oven-dried tomatoes, deciding that I would do that instead.

I put the little tray full of tomatoes in the oven, turned it to 250 degrees F, and started cutting up tomatoes on a plate. Soon the plate was full of juice, so I fetched a mug and strainer to strain out the seeds

A lot of the tomatoes were ones I was saving seeds from, so I got out a plastic cottage cheese container, and carefully separated out the seeds from Roma, Maria's, Grosse Lisse, Gold Dust, Siberian, and some Peruvian tomatoes, a Heritage variety given me by Gary the day Rod invited me to their barbeque, at Northside garden, as a thank you for getting them 1 0 free loads of manure and straw from the Canberra Show!

Some of the tomatoes were not suitable for drying, so these I chopped and placed in a large saucepan. Later I would add onions, a bay leaf, some thyme, sage and oregano from the garden, some pieces of pumpkin and several zucchinis, sliced and some vegetable salt, or sea salt. Cook them till tender, to make a dish my mother used to do. She called it 'Tomato and Breadcrumbs'. It was a great favorite with the whole family.

Tomato and Breadcrumbs

In a large greased casserole place a layer of the tomato mixture made as above. (Remove the bay leaf.)

Cover completely with about 2 cm of freshly made wholemeal bread crumbs, then another layer of tomato mixture and another of bread crumbs till the dish is full, ending with a bread crumbs layer. Sprinkle a little more vegetable or sea salt and a little pepper. Dot with butter and cook in a moderate oven until brown on top—about 15 or 20 minutes.

So here I am in the kitchen surrounded by utensils and tomatoes in various stages. I am cutting and straining and saving seed (and labeling it), I am putting the unusable bits in the chooks' scrap container... What about the tomatoes in the oven? I get a pot holder and open the oven. Sigrid said they would take 5 or 6 hours at 250 degrees F, so they shouldn't be done yet. Oh dear, some are burnt, but most are shriveled and very dry, so I put these in a jar and pour olive oil on them and add a sprig of thyme and a bay leaf. I'll have to add the rosemary next time I go to the Cotter Garden where I can pick it.

There was no salt on those ones, but the next lot has had their salt on for an hour as Sigrid said, and are ready to go in, but this time at 120 degrees F.

I have finished! The tomatoes are cooling in the kitchen. Every working surface is covered. I started at 8.30am, and took them out of the oven at 2.40pm. They took only 3 and a half-hours at 120 degrees F. Now I must go out and buy some more olive oil. And the sun is shining brightly!

Postscript. I've just had bread and dried tomato and home cured ripe olives. Yummy!

Editor's Note: Sorry to hear about the charcoaled tomatoes Betty. Every oven cooks differently if the temperature is set at its lowest for drying, all should go well.



- Certified organic produce and groceries
- Whole foods
- Bulk sales
- Macrobiotics
- Health care and supplements
- Natural skin and body care

Located at the Belconnen Markets Open 7 seven days Phone 02 6253 0444 Email info@organicsharvest.com.au



FROM THE GARDEN TO THE POT

By Conrad van Hest

What can I do with this vegetable? A few days later out of the blue an idea comes to mindthis how these recipes were conceived...

Cucumber and tomato relish

2–3 large cucumbers (equal to 4 cups packed)
1 1/3 cups red onion diced
425 grams tomato crushed
½ cup olive oil
2 cups apple cider vinegar
½–1 cup castor sugar
1 tablespoon garlic crushed
1 tablespoon ginger minced
¼ teaspoon black pepper
½ teaspoon allspice
½ teaspoon paprika (optional)

Peel cucumber, cut lengthways, removed seeds and slice. Put in a bowl sprinkle salt over, cover and refrigerate overnight. Drain well and rinse to remove salt let drain for 20 minutes.

Heat oil on low heat add onions and cook until golden about 10 minutes stirring often. Add cucumbers cover and cook on low heat for 10 minutes. Add vinegar bring to boil uncovered until liquid has reduced by half.

Then add tomatoes, sugar, garlic, ginger, pepper, allspice and paprika simmer then cover and cook on low heat for 1 ½ hours or until mixture is thick, stirring often. Put into sterile storage jars and seal as per manufactures instructions.

Wild soup

1 tablespoon fresh and dried fennel seeds 2 medium leeks cut in half and sliced 200 grams Jerusalem artichokes washed and sliced 4 cups vegetable stock ½ cup wild (black) rice 1 tablespoon ghee

Melt ghee add fennel seeds and leeks cook until leeks are soft. Add washed rice and artichokes sweat for one minute add stock bring to boil and simmer for 30–35 minutes or until rice and artichokes are cooked.

Beetroot spread

1kg beetroot 1 cup red wine vinegar

- 1 tablespoon crushed garlic
- 1 tablespoon allspice
- 1 tablespoon castor sugar

In a large pot put beetroot cover with water and cook until soft. Cool in cold water, peel, top and tail and cut into pieces. In a bowl using a electric blender or potato masher pulp the beetroot.

In a saucepan add vinegar, garlic, allspice and sugar then to boil for 1 minute, reduce heat to low add beetroot pulp stir in well and heat through for about 20 minutes stirring quite often to prevent sticking and burning. Store in sterile jars and seal as per manufactures instructions.

3rd Prize at the 2001 Royal Canberra Show

After some consideration I entered in the Jam, Spreads and Preserves section under the Pantry Collection class. The Pantry Collection class to consist of 6 to 8 items such as syrups, flavoured oils, dried fruit or vegetables, unusual pickles, jams, jellies, chutneys, etc. and is judged on appearance.

The first prize (prize money \$7.00 and champion ribbon) had done nice oils and well presented time consuming bottling, the second prize (prize money \$3.00) had nice hexagon jars and calligraphy written labels, the fourth got a highly commended.

My collection third prize (prize certificate) consisted of roast capsicum in spring water, spicy tomato and cucumber relish, white beetroot in spring water, peach chutney, capanota, red onion chutney, pickled potatoes and beetroot spread.

I may enter this class next year or maybe enter in the Garden Produce section after seeing and getting ideas as what to enter.

The Challenge of Growing Onions

Michelle Johnson

Onions are one of those crops often overlooked by gardeners to whom gardening means sunripened tomatoes and golden corn, yet it is an important part of many people's diet, adding flavour and goodness to many meals from summer salads to hearty winter casseroles. This makes them a very useful crop to grow, and one that should be considered when planning your vegetable garden.



Gardeners can have their own onions available most of the year, provided the right varieties are chosen to give a succession of harvests, with the main crop variety one with a long storage life. Leeks and shallots can also be grown to be harvested in Spring before the Early onions are ready. For many leeks are the gourmet members of the onion family, and are quite easily grown. However, I have not discussed growing these in this article.

A critical factor for success in growing onions is choosing the right variety to plant in your region at a particular time of the year, as onions bulb up in response to daylength and temperature. Daytime temperatures must reach around 21°C before bulbing commences.

With respect to daylength, onion varieties are put into three classes:-

(i) Short-day or Early which begin to bulb during 11 to 12 hour days. These are usually sown in Autumn and grow through the shortest days of winter to mature in late Spring, e.g. Early Barletta, Late Flat White. The seedlings should be no bigger than a pencil when winter comes or they will bolt to seed in Spring. This class of onion tends not to store very well, but is a sweeter onion for slicing in salads.

- (ii) Intermediate-day or Mid-season which require 12 to 14 hour days to mature. These are sown late Autumn to mid winter to mature in early Summer, e.g. Hunter River Brown, Early Creamgold.
- (iii) Long-day or Late which need daylengths longer than 14 hours to mature. They mature late summer early Autumn. Pukekohe, or Creamgold, the most popular commercially grown onion, can be sown late Winter-early Spring, but most varieties are sown May to July. These varieties tend to be long keepers and have a strong flavour.

Onions must be grown in a sunny position and the soil will need to be well-drained and fertile with a pH of 6–6.5. In many soils around Canberra, this will mean adding lime when preparing the soil. Although they like a rich soil, it should not be high in nitrogen as too much nitrogen leads to thicker necks that allow rot in. Manures should not be added to the soil close to planting time, but compost, rock phosphate and wood ash can help.

Onions can be affected by the preceding crop in your rotation. Different growers have their own favourite rotations which appear to work for them. Eliot Coleman has found the most favourable crops to precede the onion family are a fine grass, lettuce or members of the squash family, and has found they do best where no green manure was sown. They can also follow a cabbage crop which was fertilised before the crop was planted.

The young plants can be lightly fertilised with a low-nitrogen fertiliser, but fertilising should cease when the plant is in the final stages of maturation (about the last 50 days). Some

growers use a seaweed spray on planting and at monthly intervals until maturity, believing this inhibits disease.

Fresh seed must be used as onion seed only remains viable for one, possibly two years. Many gardeners choose to grow from transplants, rather than seed, to save on weeding in those first vital weeks. Onions are very sensitive to weed competition, so weeding must be given a priority with young seedlings. This is not so important in the later stages.

When transplanting, trim the tops and the roots. This makes planting easier and helps stop the tops from drying out. Take care not to plant too deep or neck rot may develop later.



Planting is usually 2 inches deep, 3–4 inches apart, in rows about 12 inches apart (see box insert for Eliot Coleman's recommendations).

Plants can be mulched, but the mulch should be pulled back in Spring to let the soil warm up. Young onions must be well- watered, but watering must be withdrawn towards the end when some of the tops are turning yellow and a few have fallen over. When some tops have fallen over, the others can be twisted over or knocked over with the back of a rake.

After about 2 weeks the onions can be pulled out. However, if you want to store the onions for a long time, make sure they are fully ripened before pulling since organic substances go down into the bulb to promote dormancy as the green tops wither. The bulbs should pull easily out of the ground, otherwise the roots are still alive.

After harvesting the onions should be cured to dry thoroughly, either by leaving on the ground if the weather is warm and dry, or by placing on well ventilated racks e.g old plastic bread trays, chicken wire flames, under shelter. Curing usually takes about 2 weeks. The crop can then be stored in a cool place, ideally with temperatures just above freezing and with about 70% humidity and good circulation e.g. in mesh bags, pantyhose or in well ventilated crates. Keep them off concrete floors and out of paper and plastic bags.

Stored correctly long keeping varieties can last over twelve months. It has also been found that those with a thin neck and flat basal plate (root side) last the longest, so eat the other ones first.

References

1. 'Optimum Onions' by Joanna Poncavage, p42–47 'Organic Gardening', November 1993, Rodale Press Inc.

2. 'Onion Savvy' by Jack Cook, p40-43 'Organic Gardening', July/August 1990, Rodale Press Inc.

3. 'The Finest Keepers' by Olwen Woodier, p60– 66 'Organic Gardening', June 1988, Rodale Press Inc.

4. 'Complete Organic Gardening' by Jonathan Sturm, 1992, Southern Holdings Pty. Ltd.

5. 'The New Organic Grower' by Eliot Coleman, 1989, p143, p250-251



2nd Recycled Organics Conference 25-27 September 2001 Carbon race set to ignite

Competition for biomass by-products from agricultural crops such as sugar cane is set to intensify as the intrinsic value of these bio-assets is appreciated by such diverse entities as electricity generators and fanners desperate to restore soil carbon content.

The competition for carbon will be one of the major topics at the second National Recycled Organics Conference and Trade Expose at the University of Queensland Gatton College campus on 25–27 September 2001).

Themed Partnerships, Processes and Products and hosted by the Recycled Organics Consortium, this conference is designed to link stakeholders who can provide process and marketing solutions to the management of organic resources.

While these materials were once regarded as 'waste', recovered organic by-products are now being processed into a range of products suitable for beneficial reuse.

ROC Acting Director, Associate Professor Alan King said Australia faced major issues in the sustainability of both its agricultural production and industrial development. 'Linear agriculture or "paddock to plate" practices have mined Australia's agricultural soils to the point where ecological sustainability is no longer possible in some areas. Salinity, acid soils and low organic carbon are an outcome of these linear practices'.

'Cities contribute to the issue through the consumption of large quantities of energy and production of high volumes of organic matter. This conference aims to find modem solutions to organic by-product utilisation in industries ranging from aquaculture and packaging to waste processing engineering,' he said.

The conference structure will embrace the highly successful Open Space Technology process. This democratic and structured technique ensured the success of the inaugural 1999 conference by providing a platform for delegate input into determining industry direction. ROC is the outcome of an initiative by the UQ Natural Resources, Agricultural and Veterinary Faculty and recommendations from the initial recycled organics conference at Coolum (Qld) in November 1999.

The consortium's mission is to bring together all sectors of the recycled organics industry and to facilitate research in identified need areas- broker knowledge in recycled organics and facilitate commercial development.

ROC's location helps link the organic resources of the city and the country with the extensive research facilities and fanning trial sites on-campus. ROC director, Professor Bruce Young who is currently visiting international laboratories and meeting researchers working on recycled organic developments said, 'Research projects are conducted on a collaborative basis with suitable stakeholders to meet the specific needs of each project. ROC invites individuals, industries and businesses to become part of the consortium through collaborative projects.'

'ROC is committed to facilitating a national approach to the industry,' he said. To develop themes for the Open Space concept, all interested parties are invited to post topics on the Recycled Organics web site at www.recycledorganics.com.au. This discussion will guide the development of the Open Space program, and selection of speakers for key topics for the keynote addresses.

For further information contact Denise Hart, ROC Operations Manager, telephone 07 5460 1518, mobile 0417 771 327 or email dhart@recycledorganics.com.au

Are You Using Worm Juice?

COGS would be interested in the experiences of members who are using worm juice.

John Brummell reports that the last two years he has forgotten to spray his nectarine tree with bordeaux mixture to stop curly leaf. Someone said 'try worm juice instead!'... So he has given the tree monthly sprayings during the winter with his home made diluted worm juice.

The result was very little curly leaf, less in fact than he had got when using bordeaux.

John now sprays worm juice on everything (lawns, veggies, flowers, and shrubs) and puts some in his liquid manure cocktails that the vegetables get regularly.

The dose for spraying is 5 to 10 mil per 10 square metres, and he uses one of those fittings on top of two litre fertiliser containers, which clip onto the garden hose. You can spray your whole block in two or three minutes.

The Editor would like to hear more reports on worm juice.

Some advice from Bridget Farrer ... I recently bought an old office shredder in an auction for \$10, and am finding it very good at providing me with mulch for all my garden beds. I had tried before with shredded paper from offices. but it grew strange fungal blooms on it. I now use newspaper, having written to the editors of the Canberra Times, the Chronicle and the Sydney Morning Herald, who all assure me that their paper is safe for organic yegs, and their inks soy-based. Neighbours are delighted to save their copies for me, saying its nice to really know that recycling is happening to their discards. And of course, I'm using sun and wind power to do the shredding!

Training Workshops for Biodynamic Farming and Gardening

Training in biodynamic farming and gardening is now available as a competency based training program which will enable you to gain a very thorough understanding of the biodynamic system.

Using this system results in:

- food crops which are nutritionally superior and naturally disease resistant
- dramatic increase in soil fertility for minimal financial outlay
- balance of material and spiritual aspects of nature.

Course dates for Canberra are:

- Level 1 21 (evening only), 22 and 23 September Level 2 3 and 4 November
- Level 3 8 and 9 December

Please contact Lynette West for course details-telephone 6297 2729

WINTER VEGETABLE PLANTING GUIDE

Asparagus

Prepare your bed before you buy the crowns to plant late Winter - early Spring. Since this is a perennial which can last for up to 20 years it is well worth the effort of establishing properly. It needs good drainage and can be planted very successfully in a raised bed It likes compost and well rotted manure. Seaweed is an excellent mulch. The crowns are planted in a trench, but with the roots straddling a ridge. Cover so dormant shoots are about 4cm below surface. Do not harvest spears the first year, and only harvest for a few weeks the second year. Remember this is a long-term investment.

Broad Beans

Late plantings of broad beans in June may be very slow to germinate. Better results are usually achieved with an Autumn planting.

Kohlrabi

Prepare the soil well with lots of organic matter. Needs rapid growth for flavour.

Lettuce

Only plant Winter varieties of lettuces (cos, salad bowl, oakleaf, butterhead and mignonette varieties)

Onions

Mid season varieties are often sown late Autumn early Winter and long keeping varieties in Winter. However, the timing of mid or late season varieties is well worth experimenting with by making successive plantings to determine the best time in your specific locality.

Peas

The yield from peas planted in August could be diminished if there are severe late frosts affecting the blossom.

Rhubarb

This is a perennial but plants generally only produce well for a few years, and then fresh plants need to be started from subdivided crowns planted late winter or early spring. It is very hardy, but it is a grossfeeder.

Other Possibilities

Growers may wish to start a number of crops in late winter rather than early Spring if the winter is mild or if they have a sheltered garden bed Such crops include Artichokes (Globe and Jerusalem), Beetroot, Cabbage, Carrots, Potatoes and Radish.

Frost-sensitive vegetables such as Capsicum, Eggplant and Tomatoes can be started early in August but may need a heated glasshouse or warm spot to germinate and will almost certainly need protection when planted out.

Wint	er Vegetab	le Planting G	uide
	JUN	JUL	AUG
Asparagus		T	ST
Broad Beans	S		
Kohlrabi			S
Lettuce			S
Onions	ST	S	S
Peas			S
Rhubarb			S
Silverbeet			S
Spinach			S

S = Seed Sowing T = Transplanting NB This table is a guide only, please observe the seasonal weather patterns before deciding when to plant, as there will often be distinct differences in weather from one year to the next. The microclimate of your garden will also influence the times when you plant.

Winter is the usual time to plant or prune the soft fruits including:

Strawberries

Plant certified stock or propagate from runners (not from plants more than 2 years old however) in a soil enriched with compost or well rotted manure. On old plants remove the old leaves and burn or throw them in the garbage in case they are infected with a virus.

Berries

Raspberries, youngberries etc can be planted and old canes removed. Remember these bear fruit on canes grown in the previous year only.

Currants

These are easy bushes to grow in Canberra as they withstand very cold weather and don't mind heavy clay soil. They produce a fruit rarely available commercially. They need to be pruned in winter to remove dead wood and allow for good air circulation.

Gooseberries

Like similar conditions to currants.



Camberra Organic Growers Society Inc. INFORMATION

GENERAL INFORMATION

The Canberra Organic Growers Society is a nonprofit organisation started in 1977 with the aim of providing a forum for organic growers to exchange information and encourage society to adopt organic growing methods.

The organic movement endeavours to provide an alternative to the mass of toxic chemicals, fertilisers, fungicides, herbicides and genetic modification used in modern agriculture. Using natural means of improving and preserving our soils produces nutritious, less contaminated food. Enriching the soil with compost, manure, green manure and mulches, and using companion planting, produces healthy plants which resist pest attacks and disease

MONTHLY MEETINGS

Meetings of members are held in Civic at the Griffin Centre, Room 4, at 7.30 pm on the fourth Tuesday of the month (except in December and January). Each month a different speaker discusses organic growing or related issues, for example:

- backyard self-sufficiency;
- worms;
- permaculture.

After each talk a light supper is available. At all meetings, there is a produce and seed exchange table and a book-stall. Members may also borrow two items from the COGS library.

Visitors are welcome (donation requested).



FLIER & QUARTERLY PUBLICATION

These publications inform members about the speaker at the next meeting and any other activities coming up. Canberra Organic, the Quarterly publication, contains articles on organic growing as well as tips specifically for the Canberra region, such as a seasonal planting guide. Members are encouraged to contribute.

COMMUNITY GARDENS

COGS currently operates 5 community gardens in the Canberra area at Mitchell (Northside Garden), Curtin (Cotter Garden), Erindale, Charnwood, Theodore and Oaks Estate. Members may obtain plots to grow organic produce for home-consumption. These gardens provide a wonderful opportunity for people to garden with other organic growers, to share their expertise and learn something new at the same time!

At each garden, plot-holders may be required to contribute to the cost of water and other small expenses.

The ACT Government has supported the establishment of these gardens through the ACT Office of Sport and Recreation.

INTERNET

COGS has an extensive and highly appraised web site devoted to organic growing. The site contains all of the COGS information papers on organic growing, certification information, a page for children, links to related organisations and information sources, a picture gallery, the latest on issues such as genetic engineering, regional information and much much more.

OTHER ACTIVITIES

From time to time COGS organises other activities for its members. For example, we participate in the World Environment Day fair and arrange information days at 'COGS Backyard'. Seminars and workshops are also conducted.

See reverse side for Membership form and rates

To: Memberso Display Protection Pair Dock Stall, seed exchange book stall, seed exchange To: Memberso Typin Carbon ACT 2602 Australia New Application Renewal Concession Drive States Access to community gardens New Application Renewal Concession Drive States Concession and social activities New Application Renewal Concession Drive States Concession and social activities Mame: (1) Two years subscription Name: (2) Dire year subscription Card family seember) Full member - 325 Name: (2) Concession - 515 Concession - 515 Concession - 521 Name: (2) Full member - 320 Card family seember) Full member - 320 Name: (2) Concession - 521 Newsletter address label The Code membership system is based of a 12 Trive State: Towa: State: Towa: State: Phone: H W: State: Concession - 512 Codes membership system is based of a 12 renewed rates State: Towa: State: Towa: State: Towa: State: </th <th>Membershin Application/Renewal</th> <th>Benefits to Members Monthly meetings with speakers, library</th>	Membershin Application/Renewal	Benefits to Members Monthly meetings with speakers, library
If applying for concession rate, please provide justification: Image: Image	To: Membership Secretary Canberra Organic Growers Society Inc. PO Box 347 DICKSON ACT 2602 Australia New Application Renewal Concession . Paying for: One year only Two years .	 book stall, seed exchange Quarterly magazine and monthly Flier update Access to community gardens Latest organic information from the Internet Excursions and social activities Cheaper advertising rates (publications and internet).
One year subscription Two year subscription Name: (1) Full member - S20 Name: (2) Concession - S15 Concession - S15 Concession - S24 Name: (2) Ene wal rates One year subscription Two year subscription Name: (2) Full member - S25 Concession - S15 Concession - S12 Newsletter address label Two year subscription Title: E.g. Jones Family) Street: The COGS membership system is based on a 12 member big rational me	If applying for concession rate, please provide justification:	New member rates
Name: (1)		One year subscription Two year subscription Full member - \$25 Full member - \$40 Concession - \$15 Concession - \$24
Name: (2) One year subscription Two year subscription Newsletter address label Full member - \$20 Full member - \$20 Title: Concession - \$21 Concession - \$21 Newsletter address label About membership system is based on a 12 monthly membership system is a member is a membership system is based on a 12 monthly membership system is a membership system is a membership system is based on a 12 monthly membership system is a membership system is a membership system is based on a 12 monthly issue . A membership system is a membership system is based on a 12 monthly membership system is a membership	Name: (1)	Renewal rates
Concession - \$12 Concession - \$21 Newsletter address label Concession - \$21 Title:	Name: (2)	One year subscription Two year subscription Full member - \$20 Full member - \$35
Title: (e.g. Jones Pamily) Street:	(2nd family member)	Concession - \$12 Concession - \$21
Title: (cg. Jones Family) Street:		n gamaaaang biis nami ya sa sa sa sa sa sa sa
(cg. dones ramity) Street: Town: Town: Street: Town: Street: Town: Street: Country: Postcode: Other: Country: Phone: H: W: Phone: H: W: Country: Phone: H: W: Country: Phone: H: W: Code insues: (a) will not receive and more publications and the second at the members of COGS for the time being in force. Code insues: Code insues: (b) and the rules of COGS for the time being in force. (Signed) Date: Date: Date: (Signed) Newsletter Please tick if you can spare some time for volunteer work: Inclusture and spatialization stand and stand the stand of more spatialization interval; Stalls Management of Committie Ported in form for discuster and spatialization interval; Please tick if you can spare some time for volunteer work: Ported a form form stand stand stand stand or spatialization intervalis and stan	Title:	About membership subscriptions
Town:	(e.g. Jones ramity)	monthly membership rather than a fixed membership
Country: Postcode: Phone: H: W: Phone: H: W: E-mail: (a) Will not receive any more publications until he or she regions; and Receive COGS Flier by e-mail? Yes Yes No Receive corganic e-mail? Yes Yes No (e.g. food issues, questions etc. from people with a common interest) Coassist members, a reminder members, and the sense of the sense members, and the sense of the sense members, and the sense of the sense sense members and sense of the senses and sense of the senses and sense of the se	Town:	membership expires 12 months later. A member becomes unfinancial immediately his or her
Country: Postcode: I will not realize any more publications and its are an analy garden (green convents) are advanded when members become unfinancial). Phone: H: W: I green convents) are advanded when members become unfinancial). Receive COGS Flier by e-mail? Yes No I green to be bound by the rules of COGS for the time being in force. I agree to be bound by the rules of COGS for the time being in force. COGS is an by a voluntary committee when is elected at the AGM in March. All members are smalled in the cast the committee. The committee mesh monthly. I agree to be bound by the rules of COGS for the time being in force. COGS is an association state advantage to consider participanting in the ward the committee. The committee mesh monthly. Please fick if you can spare some time for volunteer work: Poster for use of organic smalled in home gardening. horiculture and agreature in the committee. The committee is advantage of control in the advantage of advantage of the committee. The committee is advantage of control the smalled in the advantage of control the smalled in the advantage of control the smalled in the advantage of advantage of the advantage of advantage of the advantage of advantadvantage of advantage of advantage of advantag		membership expires and thereby ceases to be a member of COGS, and:
Phone: H: W: Phone: H: W: Comparison of the second seco	Country: Postcode:	(a) will not receive any more publications until he or she rejoins; and
E-mail:	Phone: H: W:	 (b) will lose entitlement to any plot held at a community garden (garden convenors are advised when members become unfinancial). To assist members, a reminder will be primad on the last two publications sent prior to the membership expiry date. If you receive the Flier by e-mail, an e-mail message will be sent.
Receive COGS Flier by e-mail? Yes No No Receive organic e-mail? Yes No No (e.g. food issues, questions etc. from people with a common interest) COGS is run by a voluntary committee which is elected at the AGM in March. All members are encouraged to consider participating in the work of the committee. The committee meets monthly. I agree to be bound by the rules of COGS for the time being in force. COGS is an association without specific patients or religious affiliation as a group. COGS has the following objectives - to: (Signed) Please tick if you can spare some time for volunteer work: Library Newsletter Finance Committee meets monthly. Stalls Management of Community Gardens • Foster the use of organic agricultural informed participation of recognised organically growing ther numbers of interest to organically growing the fourth of meeting of organically growing the fourther meets and information and communiting region Agricultural experience * Factinate exchange of intermeting meeting growing the fourther meets and interest of interest of interest of interest of interest of interest of growing amaze Age Profession Yes No No. of years: · Age Profession Yes No	E-mail:	
(Signed) Foster the use of organic methods in home gardening. Please tick if you can spare some time for volunteer work: • Foster the use of organic methods in home gardening. Library Newsletter Finance Committee Stalls Management of Community Gardens • Foster organic agriculture income the production and commution of certified organic agriculture. Education/promotional activities • Promote the production and commution of methods in the second organic growing techniques. Other: • Provide a forum for the document of methods in theme gardening. Agricultural experience • Provide a forum for the document of methods in theme gardening. "Backyard" or Farm (Small Medium Large) Organic: Yes No No. of years: • Assist members in exactional or rehabilitation purposes and the methods. • Administer commuting process and gooups Age Profession Yes No • Organic • Organic agriculture purposes and for self-supply of contaminant-the producta.	Receive COGS Flier by e-mail? Yes No Receive organic e-mail? Yes No (e.g. food issues, questions etc. from people with a common interest) I agree to be bound by the rules of COGS for the time being in force Date: /_/	Administration COGS is run by a voluntary committee which is elected at the AGM in March. All members are encouraged to consider participating in the work of the committee. The committee meets monthly. COGS is an association without specific political or religious affiliation as a group. COGS has the following objectives a to:
Please tick if you can spare some time for volunteer work: Library Newsletter Finance Committee Stalls Management of Community Gardens Education/promotional activities Promote the production and consumption of certified organically grown foods, and the accord of recognised organic standards Other: Encourage and demonstrate the use of organic growing techniques Agricultural experience Provide a forum for the document of activities and groups "Backyard" or Organic: Yes No No. of years: Retired Administer community groups for selection of rehabilitation purposes and for self-suppy of contaminant-free products	(Signed)	Foster the use of organic methods in home gardening,
Stalls Management of Community Gardens Education/promotional activities • Promote the production and comsumption of certified organically grown tools, and the accordinged organically grown tools, and the accordinged organically grown tools, and the accordinged organic standards. Other: • Provide a forum for the document of metogrised organic growing techniques Agricultural experience • Provide a forum for the document of metogrised organic growing region * Facilitate experience • Facilitate exchange of moments and document organic growing region * Backyard'' or Organic: Yes No No. of years: Retired Yes Retired Yes Yes No	Please tick if you can spare some time for volunteer work: Library Newsletter Finance Committee	Foster organic agriculture Foster organic agricultural knowledge
Other: Encourage and demonstrate the use of organic growing techniques Provide a forum for the docussion of matters of interest to organic growers in the ACT and summaring region Facilitate exchange of interest and groups Facilitate exchange of interest and groups Assist members in excellening the rown organic growers and groups Assist members in excellening the rown organic growing areas Administer community genders operated under organic agricultural process and to self-supply of contaminant-free produce. 	Stalls Management of Community Gardens Education/promotional activities	Promote the production and consumption of certified organically grown foods, and the adoption of recognised organic standards
Agricultural experience "Backyard" or Farm (Small Medium Large Organic: Yes No No No No. of years: Retired Yes Yes No	Other:	Encourage and demonstrate the use of organic growing techniques
Agricultural experience • Facilitate exchange of interaction and data between members and with other organic growing areas "Backyard" or Farm (Small Medium Large) Organic: Yes No No. of years: • Facilitate exchange of interaction and data between members and with other organic growing areas Age Profession Yes No • Facilitate exchange of interaction and data between members and with other organic growing areas		Provide a forum for the discussion of matters of interest to organic growers in the ACT and surrounding region
"Backyard" or Farm (Small Medium Large) Organic: Yes No Assist members in each on organic growing areas Age Profession Yes No	Agricultural experience	Facilitate exchange of information and cleas between members and with other organic provent, and only os
Age Profession Yes No	"Backyard" or Farm (Small Medium Large)	Assist members in establishing their own organic crowing stress
Age Profession Yes No	Organic: Ies NO NO. OI years:	Administer community gardens operated under organic
	Age Profession Yes No	agriculture: principles for recreational, educational or rehabilitation purposes and for self-supply of contaminant-free produce.

SPEAKERS Room 4, Griffin Centre, Civic, 7:30pm

Tuesday 22 May *Richard Stirzaker* Scientist, Philosopher and backyard farmer Topic: Water and Nutrient Management

> Tuesday 26 June Topic: Composting

Tuesday 24 July Topic: Bushfoods

PERMACULTURE ACT (PACT)

Please contact David Read on 0407 070 189 if you are interested in becoming involved with the permaculture group within the ACT.

Making Compost

包

Do you want to see it done? Do you want have a hands on experience? Dave Read from Organic Origins will be there to guide you through the process Come along to the Theodore Community Garden—end of Lienhop Street Theodore Saturday 26 May 2pm

Environment Centre Shop

Closing Down Sale

The Canberra Environment Centre Shop will be selling its remaining stock at its stall at World Environment Day (2 June, Garema Place). Posters, cards, decals, Stringybark clothing, environment-friendly cleaning products and personal care items.

All stock massively reduced to clear.



Charnwood Community Garden Plots are available to grow organic home

produce. Inquiries to Peter on 6254 1278