



# The Mushroom Journal

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**INSIDE:** Occasional Diary from Fiddleford Mushrooms,  
Mushroom Journal Profile: Dr Kerry Burton,  
Producer Organisations ..... and more

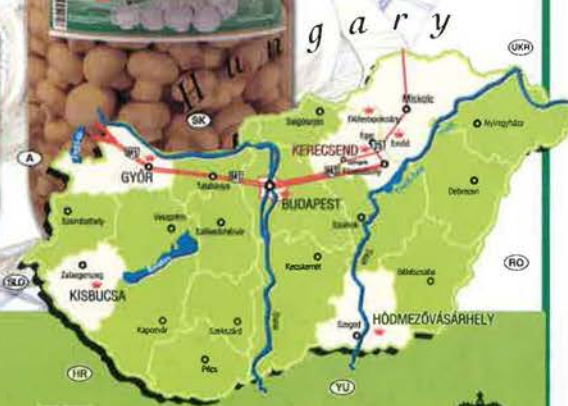


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# THE Mushroom JOURNAL

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## EDITORIAL

### Off with the Old and .....

With a 365 day a year crop; what the Americans would perhaps call a 365/12 business, but then, perhaps not; seasonality has little to do with the seasons and more to do with other punctuation points in the passing year.

The Christmas-New Year holiday and general extravaganza, with all its attendant staff and marketing difficulties, is the full-stop that completes our year and separates it from the new.

The 'flip' of the calendar to a new year also makes this time an almost irresistible opportunity to contemplate the past year and form a game plan for the future. That plan will vary, depending on the character of the planner, from the mildly optimistic to the gravely pessimistic. There are, in truth, reasons for both points of view, but if we consider 2004 there are certainly grounds for mild and cautious optimism. There still may remain much to do but opinion has hardened concerning the nature of what this is and encouragingly much of the time-consuming railing against the immutable has now become directed at constructive action. We have begun to close the cost gap between our product and that of our competitors and in 2005 will no doubt continue to do so, and it is hoped that we can find a way of exploiting the fact that it is our home market.

We can also dream a little, in what has to be a hard commercial and pragmatic world. We can imagine a situation where demand for home-produced mushrooms outstripped supply and the two thirds of our consumption that we have lost once more becomes our oyster. Knowing when to begin to invest in new growing facilities will be crucial. Too soon or too late could be disastrous, but surely it is not an unattainable dream?



Front Cover photograph  
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# Chairman's Notes

We are coming to the close of another year and again we have seen a year of reduction and farm closures in the UK mushroom industry. Only a few weeks ago many felt that the atmosphere at our mushroom conference at least seemed to show the green shoots of a bit of optimism and a general feeling that the worst may be over – maybe somebody told TESCO and they decided that they should be the next multiple to put the boot into their suppliers and demand another round of price reductions! I suppose that it was only to be expected that TESCO should act in this way, indeed maybe we should have been surprised that it has taken them so long to follow the other large multiples and displace English and Irish product with Dutch and Polish. However the trend towards dealing with marketeers rather than direct with the grower could be very ominous.

This week I attended a meeting arranged by the HDC as a follow up to the Fenlon Report on the situation of the UK Industry, which John Fenlon presented at the Conference in October. I don't intend to review the whole day here but the flavour of the day could probably be summed up simply as 'cooperate and invest to survive' and it is interesting that Ronnie Wilson and Huub Heijer also concentrated on the need to invest in their remarks to the Conference- not so sure about cooperation in their case.

The investments envisaged came from both ends of the spectrum, on the one hand investing time and effort to undertake Benchmarking and cooperation exercises, and on the other hand looking towards a huge investment in automated harvesting.

The Benchmarking exercise was well received and I am sure that growers will take up the chance to examine their costs in detail and compare them with others – the exercise would be particularly effective if we could compare to growers in Hol-

land, Ireland and Poland. We were told that many farmers who have joined Benchmarking groups have been very surprised to see the range of a particular cost across the group when it is analysed. However I would be surprised if the most important variations were not in yield efficiency and labour cost.

I was doubly surprised by the discussions on automated harvesting with the presenter, Ken Young from the Warwick Manufacturing Group appearing to think that picking by Robot should be 'no big deal' and industry representatives seeming to dismiss it as impossible. What is good news is that the HDC mushroom panel hopes to be able to find money for work in this area in the coming year maybe that will clarify things. What has changed from the days when Silsoe was working in this field is the cost of the robots – I believe that we were looking then at a cost of £200,000 per installation whereas now the basic robot can be bought for £25,000. Maybe a system where phase 4 blocks are individually conveyed to a number of robots working '24/7' and each picking one mushroom every 2 seconds could start to become attractive – after all each harvester must now cost £12,000 to £15,000 per year to employ never mind the cost of their training, recruitment and supervision and normally they would only work for 8 hours per day.

It may well be that to advance in the area of automated harvesting the grower would have to modify his growing techniques to produce thinner flushes and lower yields perhaps but fewer mushrooms at higher profits certainly seems attractive!

Finally on behalf of Melissa, Richard and myself can I wish all our readers a Merry Christmas and a Happy New Year and thanks for all your support over the last year.

**Peter Woad**



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## **CALLS FOR THE ABOLITION OF THE A.W.B.**

Hugh Robertson, the MP for Faversham and Mid-Kent and Secretary of the Parliamentary Fruit Group, has called for the abolition of the Agricultural Wages Board.

Speaking at the last DEFRA Questions of the 2003/04 Parliamentary Session, Mr Robertson said: "It is wholly wrong that agriculture should be the only remaining part of the economy to have a wages board. The introduction of the National Minimum Wage has made it totally redundant - and farmers simply feel that they are the subject of discrimination."

The Agricultural Wages Board annually sets wage tariffs for agricultural workers. Some fruit farmers have blamed it for a series of above inflation wage increases that they say have made their businesses uncompetitive. Labour costs can account for as much as 40-60% of a grower's costs.

In 2002 Mr Robertson was involved in a series of negotiations that led to the resignation of two board members and the early retirement of the chairman. Mr Robertson added: "Fruit farmers and indeed anyone in the horticultural sector suffer particularly badly. Labour accounts for 40-60% of a fruit farmer's cost base so, at a time when they are getting less and less for their produce at the supermarkets, constant above-inflation increases simply put them out of business. This has obvious implications for the countryside.

"Agriculture should not be discriminated against in this way. Farmers run businesses like anyone else and the national minimum wage should be the basis for wage settlements".



**Season's Greetings**

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**Feliz Navidad**

**Wesołych Świąt**

**Joyeux Noël**

**Prettige kerstdagen**

**Frohe Weihnachten**

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# AN OCCASIONAL DIARY

by Michelle Gibbs  
of Fiddleford Mushrooms Ltd

*We are delighted to bring you an insight  
into last month, November, with  
Michelle Gibbs of  
Fiddleford Mushrooms Ltd.*

## November 2004

### Week One - Monday 1st to Sunday 7th

Welcome to The Blackmore Vale, famous for dairy farming, cheese making, Thomas Hardy and, of course, mushroom growing. It is hard to know how to pitch an article of this kind so I have decided to stick to issues close to us all as we strive towards maximising quality, technical excellence and cost efficiency, albeit in an uncertain marketplace.

Monday saw the arrival of an eagerly awaited, new casing machine and winch. Naturally they failed to fit through the growing room doors or work in the expected fashion. A brief with Limbraco resulted in an unscheduled visit to the UK for both Reny and his engineer for the following week. After a six-month wait for the machine my husband, Marc, can be seen walking in circles in the distance muttering under his breath. The planned introduction of this machine is yet another way of ironing out variables in the growing cycle. Whilst we have had great success with our manual system, the intention is to achieve better consistency in casing texture to avoid minor patchiness.

By Wednesday we had reviewed our Health and Safety Policy, been informed that a new label design was on the way and also welcomed the Environment Agency for one of their routine sampling visits. We have had an interesting year with the Environment Agency, arguing about the level of naturally occurring phenols in the surrounding soil. It would appear that we are releasing two pin-pricks rather than one pin-prick of phenol into the adjacent stream. The fact that readings both up and down stream are the same is naturally of no interest to them. We have now reached a terrific compromise - they allow us to discharge naturally occurring phenols from surrounding farmland into the



*The main site in the heart of Blackmore Vale*

stream and we pay them a suitable fee for doing so!

First flushes are looking a bit leggy on the last day of picking so Chris, our grower, plans to give the case runners extra water. Our software management system 'Unifarm' is indicating that we are over-picking today. Percentages of small grades are up significantly. A quick check in the pack-house proves this is the case. Graze picking is not as accurate as it should be so our Picking Manager, Dave, heads back to the tunnels to sharpen things up.

Our Production Manager, Andy, and Chris the grower, spend a couple of hours replacing rusting hot water pipes on the heating system with shiny new copper ones. This saves us a £600 plumbing bill. As an 'Investor in People', the company has previously paid for Andy to attend plumbing and other trades courses and this pays dividends every time.

### Week 2 - Monday 8th to Sunday 14th

Three new staff arrived from the Ukraine today with horror stories to tell. Unfortunately they met a bored Immigration Officer on their way through Gatwick who promptly relieved them of their passports and work permits. They were released pending an enquiry next Monday on the condition that they did not do any work. Apparently, and I quote the Immigration Officer, "The Public is under the misconception that just because someone arrives in the UK with a Visa and Work Permit it grants them temporary residence". Those of you who spend hundreds of pounds on Work Permits might be slightly bemused at this! Marc's response was to resume his circle walking position and continue his reverie to the Gods of Red Tape.



## AN OCCASIONAL DIARY - (continued) ....

The Limbraco guys arrive from Holland to attend to the new casing machine, which has not done a stroke of work yet. After brief investigation everyone concludes that with some minor alterations to motor positioning and steel-work, the machine will do exactly what it should do. Reny and Jan spend the rest of the day fiddling with machines, conveyors, belts and winches in the workshop. We realise, at this point, how useful it is to have a South African Farm Manager, Vaughan, who speaks fluent Dutch. (This becomes even more useful later on in the pub when buying a round.).

Meanwhile, I spend a couple of hours with an extremely interesting man from Customs and Excise who wants to trawl through two years of energy bills in an attempt to ensure we are claiming the correct level of horticultural relief from the Climate Change Levy. You have to admire the man for maintaining unswerving levels of enthusiasm in the face of such a clearly bored reception.

Our Technical Manager, John, holds a training day on the use of machinery in the Pack-house. This seems to go smoothly and bodes well for his intention of reducing time wasted from mis-wrapped or poorly labelled punnets. Vaughan finds time to start the Christmas production and staff planner.

The casing machine is used to case half a growing room with some success. Some minor alterations are still necessary but the main concern of the day comes from production staff, who worry about getting flabby without buckets of casing to throw about. Crops are very active this week and the thirds are especially easy to pin. Perhaps this is down to the weather cooling off. Chris sends a team of pickers into a pebble-dashed room to carefully remove pins and small buttons to avoid a quality problem at the weekend. Compost (Phase III in blocks) is a little on the dry side.

### Week 3 Monday 15th to Sunday 21st

It would appear that our main customer has a new Stock Controller and a new Buyer - oh, and a new Category Manager. This gives us all food for thought. Obviously, this is now the norm and surprise is actually not one of our reactions. However, no matter who you are, how your record stacks up or

what size you are, you know that you have to be quick to read and adapt to the hidden agenda that is current supermarket buying strategy.

Great news - I take a call from Immigration who confirm that the enquiry is cancelled and our three waiting staff are allowed to work. What a truly productive experience that was. John heads off to the supermarkets to do some store quality comparisons. His work-load has doubled in twelve months following the off-loading of most technical and R & D work from within the supermarket structure. These hidden on-costs are worrying as they are so difficult to budget or find efficiencies for.

Heidi, our Office Manager, is busy organising for us to rent another property locally for our Ukrainian work-force. A good part of her work is now taken up with property management and staff welfare. However, no matter how much we moan about our social work it is far, far better than the issues that prevailed just two years ago when we tried to find local staff to fill our work-force. Productivity has reached new heights and it is pure pleasure to walk around the farm and be met by enthusiastic, happy staff.

Feathering is rearing its fluffy head at the moment. Interestingly, shed 13, which had an extractor fan installed as an experiment, is showing little signs of any feathering. The extractor fan is connected to the Fancom controller and when CO<sub>2</sub> reaches its upper set point the fan kicks in gently and brings the CO<sub>2</sub> under control without a gale blowing. Seems to work with good solid mushrooms and fast picking - we've now got to find the £15,000 to do the other 23 rooms. The new casing machine is finally in action and doing a fantastic job. We look forward to seeing its first crops' pinning.

Friday night is the annual skittles match - Ukraine versus the Rest of the World! We have a younger staff than last year and this is evident when they persuade the pub to put on loud Ukrainian music so they can dance on the skittle alley. Having quickly put a stop to such nonsense we educated them in the serious sport of skittles. Naturally, we thrashed them for the second year running and they will have to seek solace in trying to retain the Eurovision Song Contest.

## AN OCCASIONAL DIARY - (continued) ....

### Week 4 - Monday 22nd to Sunday 28th

Chris has noticed some marking of second and third flushes and quickly adjusts his watering regime to avoid watering new pins and increases evaporation in these rooms. This creates an instant fix and proves that close attention to detail really pays off. A brief visit to the local Tesco store proves that quality on the shelf is very good.

The third flushes have gone from one extreme to another with few pins. Vaughan tells Chris his favourite



*Happy pickers picking a first flush*

mushroom saying, "In this job you have to be quick to change your mind". Chris finds no solace in this. The graphs produced from the Fancom system confirm that the thirds are not retaining compost temperature and have simply run out of steam tied into dry compost and some early incorporation of new season straw. Will have to look out for tight stock levels at the weekend. Compost arriving this week smells very sweet and has excellent moisture levels of 65 to 66%.

At this point I tackle Vaughan for not giving me anything challenging to report about mushroom cultivation. He racks his brain and suggests I mention that we have found time to get all the equipment maintenance bang up to date, build a new sheep barn ready for spring lambing, finish the Christmas and New Year planner and carry out some staff appraisals. He adds helpfully that I might want to mention disease. There isn't any. Not quite what I was looking for.

Dave uses the Unifarm reports to check accuracy of pick weights in order to keep the Pack-house up to speed. One report highlights that several pickers are

picking too high a percentage of cases over or under weight and he quickly sorts the problem out. The joy of this system is its instant impact on cost control. The system gives us the complete financial and production profile of each room, from filling, through cultivation, picking and packing. We are looking forward to assimilating the data it gives us for a complete year so we can identify our optimum criteria for raw materials and their use. I met our new Buyer today and spent a worthwhile hour reading between the lines and second-guessing the way forward.



*Farm manager, Vaughan Young, inspects a first flush*

With each subsequent Buyer the lines get narrower and the guesswork gets more critical. Our philosophy is to strive for perfection in output and cost management - so, no matter what the future brings, we will know that we could not have done better. It is now a waiting game to see how low prices have to go to secure this relationship in the future. My de-brief to Marc sets him off on another stint of contemplative circle walking.

Having read this back I realise that November was a little uneventful. The farm is cropping and selling well, staff are productive and appear to enjoy their work, we are keeping our heads above the water and we still find time to enjoy ourselves, despite the worrying state of our industry and our future security. The mood on the farm is currently buoyant and optimistic and we are going into 2005 in the best possible shape for what lies ahead.



# The Problem Page

## TRIALS AND TRIBULATIONS



### Staggering & Grazing

By  
Richard Gaze

#### Introduction

Two ideas seem to be gaining increased 'attention time'. Whether they are new ideas is debatable, but it probably doesn't matter anyway. They are the concepts of staggering and grazing. Which comes first? Do we stagger to graze or graze because we stagger? The latter probably because if you stagger, grazing becomes a virtual necessity.

#### Foreign Journals

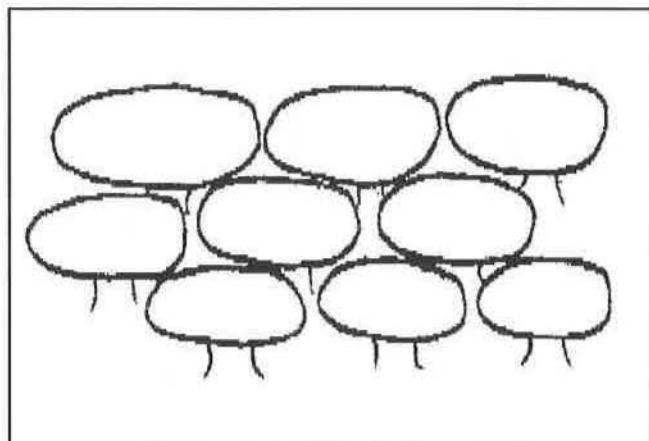
Two complementary articles have appeared recently in foreign publications. The Problem Page in the August Journal drew attention to Jan Koestel's two-part account in Mushroom Business, in which he expanded the advantages of selective picking. He touched on 'staggering' but the main thrust of his account was the yield advantage of picking each mushroom at its optimal development stage. That is, not picking it prematurely and thus wasting weight. To achieve this he endorsed the need for strict and intelligent management of harvesting and the requirement to graze over the crop at frequent intervals, several times each day in fact. By this means, it was claimed, yields could be increased by 1/2lb per ft<sup>2</sup> with no increase in labour.

In October's Mushroom News, David Beyer reviewed the casing and casing management required for a staggered first flush. His central point is the yield advantage of staggering. If you stagger in the way described, however, grazing ceases to be just an eccentric notion,

more akin to bovines than mushroom pickers, it becomes absolutely essential. So what is behind it all?

#### Concepts

Returning to the question of novelty and which concept came first, it would seem that the necessity to, if not exactly stagger, at least to wobble a bit, has been becoming more and more obvious, ever since hybrid strains appeared on the scene. With these strains, and improvements in environmental control and in compost quality, it has become apparent that a traditional flush has a yield ceiling. You can only pack so many mushrooms into any given flush. The need to grow more and more mushrooms in fewer and fewer flushes was the natural stimulus that began the dual trends of staggering and grazing.

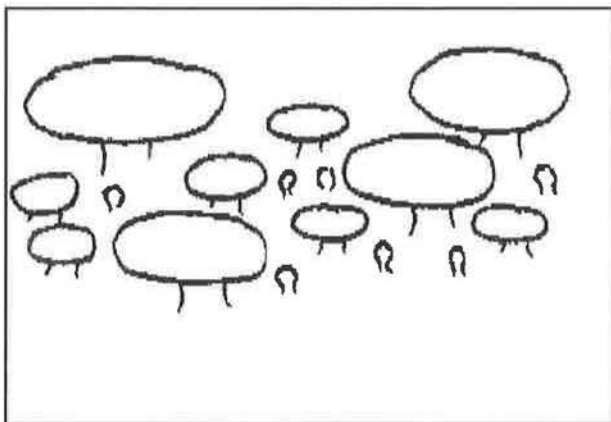


*A Hard pin.*



## THE PROBLEM PAGE — (continued...)

The ceiling, of course, applies to the old-fashioned 'hard pins' where all the mushrooms have been initiated at about the same time. Initiation has been slowly 'softening', enabling one to pack more into a given area, simple by removing the earlier ones to make space for the later mushrooms.



*A soft or 'staggered' pin.*

*(The schematics show how the number of mushrooms dramatically increases in a soft or staggered pin compared to that in a hard or traditional pin-set).*

By this 'softening' the 3lb/ft<sup>2</sup> ceiling has been progressively broken. David Beyer, in his article, suggests that a first flush can be expanded to 4 or 5lb/ft<sup>2</sup>, over, of course, a rather longer period; 5-9 days compared to 2 or 3 in a non-staggered flush. The staggering he describes, results in 3 waves or mini flushes instead of one continuous short sharp flush. The cropping pattern he refers to is three flushes of 4-5lb/2lb/1lb, or a total of 7-8lb/ft<sup>2</sup>. Unfortunately he doesn't go on to describe what, with a 5-9 day first flush, the total crop length adds up to.

Taking these two ideas together there is a nice complementarity (if such a word exists) of principles. Staggering breaks the glass ceiling of yield from uniform flushes allowing one, due to the factor of time, to get many more mushrooms off a square foot than will fit on it at any given time. It also, virtually, enforces the use of selective picking by the necessity to graze over the crop rather than picking a la our usual blitz krieg techniques, thus, once again, ensuring maximum yields. The bonus claimed is that picking rates improve and the number of pickers required is less. All in all, an attractive combination.

### Balance

As with everything there will be a balance to be explored. The gross extension of a first flush may make the total length of crop uneconomically long for a final third flush, so that economic cut-off points are likely to change. Watering regimes will be affected. In extreme cases a nine-day flush could simply rob Peter to pay Paul. And you might need a lot of pickers willing to work unsociable hours in order to achieve the almost continuous grazing that would be required.

None-the-less, these mean little qualifications aside, the ideas encapsulated in these two concepts, staggering and grazing, are quite exciting. The potted history lesson on how they may have developed is not meant to be begrudging; very few ideas spring out of the ground totally new and unrelated to what has gone before; they are more an endorsement of the logic and a recognition of the possibilities.

Staggering has really crept up on us. We have begun to do it without maybe fully realising its potential. The two articles referred to report on the practices now taking place that exploit the realisation of that potential. In addition to breaking the time & space ceilings, the effect of forcing us to pick more optimally, as well as reducing picking costs, adds a pleasing bonus.

### The practice

But these are only the principles. The subsequent question anyone interested in the ideas will ask is "how does one achieve a staggered two or three wave first flush?"

We are deeply into the complexity of pinning or initiation techniques, an area I have always been reluctant, or too frightened, to enter into, as any attempt to produce absolute prescriptions in such a complex area is usually less than helpful. If we all used the same casing in the same growing houses, using the same air-conditioning on the same growing system, one could eventually, with trial and error and experience, write a prescription. As we don't, all one can say is that one needs to be able to control the mycelial growth in the casing and the CO<sub>2</sub> and temperature levels in the air, very well indeed in order to set pins on the sur



## THE PROBLEM PAGE — (continued...)

face sequentially over a period of 6 or 7 days.

If you can exert a high level of control in both casing and air, a modicum of trial and error plus your already high level of pinning expertise will no doubt suffice. If you can't, these 'modern' concepts must just remain a nice idea.

### Summary

Perhaps I am being over-impressionable. The evolution of these ideas do seem to me to be really quite exciting. They seem to be utilising an evolved logic that, to use a rather tacky phrase means "you are in a win win situation".

\* Extending the length of a flush does mean you can get more off a given area.

\* Picking mushrooms when they are ready, rather than when you are, will give you more weight.

\* If you get that bit right the easy picking may well improve picking rates and thus reduce costs.

It sounds good to me. All the more so because its evolutionary rather than revolutionary. The only snag is you have got to be pretty sophisticated to be able to do it. No problem?

I cannot resist airing a final personal prejudice by saying, beware of prescriptive recipes. Every pundit and guru from here to Patagonia will have the exact answer for how to achieve this difficult and complex process of sequentially setting pins to give the required stagger. Do not believe them. There are useful hints to be gained but exact recipes there are not. These you have to develop for yourself, as you always have.

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# Producer Organisations

by

Rob Smith of Genesis Business Developments Ltd

**Participants at the MGA 2003 Conference in Harrogate were interested in the paper presented by Rob Smith of Genesis Business Developments Ltd, in which he described in detail what 'Producer Organisations' are and how they operate.**

**The following article is based on Rob Smith's presentation given at the 2003 Conference.**

## **Introduction**

I propose to talk on the subject of Producer Organisations under the following headings:

- \* What they are and ways in which to form one.
- \* The need for and benefits of a Producer Organisation (PO).
- \* Success factors of POs.
- \* The importance of being a "recognised" Producer Organisation under Council Regulation (EC) 2200/96 and Commission Regulation (EC) 412/97.

I will then take questions from the floor and we can have a general discussion drawing on the experiences of those around me on the platform.

## **What they are**

The use of the term "Producer Organisations" is the name used in EU speak for what we more familiarly call "Co-operatives" or "Farmer Controlled Businesses", which specialise in marketing produce for their members. But the criteria set by the EU strictly speaking does not meet the full requirements of the legislation governing co-operative status in the UK without a few additional amendments. However, that is another issue and there would not be time available in this session to go into too much detail other than to say, from the view-point of many of you in this room, that the important thing is to satisfy the authorities that the

PO you set up qualifies for recognition.

They are set up as a legal entity, in the same way that any limited company or Industrial and Provident society is, but the main criteria is that they are there for the benefit of their members as opposed to the shareholder. The control of the PO is in the hands of the members who elect the board of directors from amongst themselves who are, of course, growers. It is possible to have outside directors or non-grower directors but these must be in the minority. No one member is allowed to have more than 50% of the voting rights and no one member is allowed to have more than 60% of the marketed production in terms of sales or the total eligible area cropped. This does differ from a true co-operative where one of the main criteria is one member one vote or less common, voting is according to throughput with a maximum of 10% share of the vote. They can, of course, market any of their members' produce but only those PO's whose members grow fruit and vegetables can benefit under Regulation 2200/96. I will return to this later when I have finished describing more fully what they are and how to set one up.

There is more than one way of forming a PO. The most common method in the earlier days, was to register under the Industrial and Provident Societies Act and become what is known as an I and P Society. This was done under the auspices of the



sponsoring body, the Federation of Agricultural Co-operatives but the NFU has taken on this responsibility and now fulfils the role. The sponsoring body provides a set of model rules under which the new organisation signs up to and agrees to abide by. The cost of doing it this way is less than if you were to draft them yourselves. It is possible to make amendments to the rules if you wish to, for which there is an additional cost! This sets out the conditions of becoming a recognised society. I do not propose to go fully into this subject, but basically it lays out the terms under which the organisation operates, its duty to its members and the services it will provide for them. In turn, each member signs what is commonly known as a members' agreement which sets out the terms and conditions for them to be bound by. Usually this also includes a commitment to market all their named produce through the PO but there are allowances for PO members to market up to 25% directly themselves.

The advantage of forming a legal identity this way was because it was simple to set up and it was cheap. Unfortunately that is not necessarily the case any more, the cost of setting up is dependent on the amount of amendments made and the annual registration fee is dependent on the assets the society owns. The fees for registration are payable to NFU Corporate.

Another of the favoured methods used was to form a company with limited liability but to alter its Memorandum and Articles so that it is recognised as a co-operative by DEFRA and thereby subject to all the benefits that a co-operative may enjoy, such as exemption from ratings and competition laws and certain taxation requirements relating to the distribution of surpluses. I use the word "may" here because there are changes afoot and it is always best to treat each case individually and if necessary, to seek legal advice. However, to become a PO, it is not necessary to have the company recognised as a co-operative, but then you will not be able to take advantage of any of the previously mentioned exemptions if you are just a straightforward limited company.

You can set one up using the rules of the Co-ops Ltd UK. This is certainly low in cost but you have to be aware that the rules were written sometime ago and in the opinion of many, do not necessarily match up to the demands of modern twenty-first century businesses and the way in which business is conducted today. However, there will be an updated

version available soon but these are for general use so tend to be more generalist in their language and may need fine tuning to be more relevant to the needs of a PO specialising in marketing.

More recently the setting up of a co-operative as a company limited by guarantee has gained in popularity but again, this is not an area I propose to cover in any depth in this paper.

In summary a co-operative or farmer controlled business could be recognised as a PO but the reverse statement is not necessarily true. When considering what form of legal entity to register under it is important that you look specifically at what the objectives of the organisations are and what functions it will be required to undertake.

### Needs for and Benefits of a PO

Before we move on to looking at the benefits we should just pause to look at why we may need POs in the first place:

- \* We have in the UK, a developed retail sector with access to and tradition of trading in imported goods
- \* There is concentration of purchasing power in the hands of few buyers.
- \* The quality of product is becoming of increasing importance.
- \* Consumption patterns are changing.
- \* Producer income is on the decline.

So what can producers do to improve their position? They can organise themselves so they can:

- \* Improve consistency and quality of their product
- \* Improve their continuity of supply.
- \* Establish better methods of growing, grading, storing and delivering produce.
- \* Develop new product lines.
- \* Promote their product to their customers.

How then, can Producer Organisations be of benefit to the grower? They can:

- \* Reduce unit costs of inputs and services.
- \* Improve on methods and systems of planned production.

- \* Make better utilisation of facilities for preparation for specific markets.
- \* Realise new market opportunities.
- \* Optimise the overall return.
- \* Provide greater security.
- \* Save the producer time and remove some of his anxieties.
- \* Provide economics of scale.
- \* Improve competitive strength.
- \* Take on new product development and branding.
- \* Gain access to greater market information.
- \* Employ professional management and marketing.
- \* Provide the ability to spread risks.
- \* Provide the ability to identify and manage change.
- \* Provide and share technical advice with fellow growers.
- \* Enable market research to be carried out.
- \* Carry out promotion and advertising.

I am not suggesting that a grower will automatically gain all of these benefits but these are just some that he or she might find resulting from membership of a PO.

### Success factors for a PO

What makes for a successful PO?

You require from the members:

- \* Funding and commitment.

The PO should:

- \* Take a positive response to the market place.
- \* Operate on sound business principles.
- \* Provide fair and equitable treatment to members.
- \* Employ professional and motivated staff.
- \* Make sure that the directors understand their responsibilities.

### "Recognised" POs

The previous section dealt with the many benefits to be gained from forming a PO. But there is also one very major benefit to be had under the scheme referred to as The Fresh Fruit and Vegetable Regime. Many of you in this room will know what I am referring to because you yourselves have been able to benefit from this scheme.

The fact of the matter is that there is a grant aided scheme open to all those POs who fit the eligibility criteria under EC Regulation 2200/96 for "recognised" POs. So what do we mean by a "recognised" PO? I am afraid I shall now have to start using the official terminology as used in the booklet issued by the Rural Payments Agency (RPA).

To be "recognised" under this scheme, the PO should already be a legal entity and be functioning as a PO. The PO has to meet two quantifiable criteria:

- \* They must have a minimum of five grower members.
- \* They must meet the minimum amount of annual turnover required which is now 1 million Euros.

However if you are lucky enough to be producing mushrooms or nuts, the turnover is set at 250,000 Euros only! Please do not ask me why - it is a question to which I would like to have the answer to, but I have not found anyone who can give me an explanation!

There is a restricted list of products covered under the scheme (a comprehensive list is available from the RPA) but in general, it covers most field vegetables with the exception of potatoes, top fruit and soft fruit, protected crops as well as the already mentioned mushrooms and nuts.

The RPA divide POs into two categories, Specialist and Generalist. The former basically refers to the POs formed under the old regime EC 1035/72, which was in force before the present regime started - a sort of grandfather's right for the existing POs to benefit under the replacement scheme.

Generalist POs are the ones seeking recognition for the first time or the ones that did not retain their rights because they did not re-register. They must be recognised in one of the following categories:

- \* All fruit and vegetables.
- \* All fruit.



- \* All vegetables.
- \* Products intended for processing.
- \* Citrus.
- \* Nuts.
- \* Mushrooms.

It means that these POs must market all of their members' produce within the category they have registered under. Again there are certain exemptions to this ruling which allows a certain amount of flexibility for farmers/growers who belong to more than one PO or who have specialist needs which their own PO cannot provide.

### Recognition

The recognition process is a question of providing the RPA with the relevant information which includes proof of legal entity, the rules governing the organisation that you have set up (ie. the rules of the society or the memorandum and articles and members' agreement. There is a sizeable amount of information to provide and if you are setting up from scratch can be quite time-consuming. The RPA does stipulate that the PO is formed on the "initiative" of the growers because the scheme is primarily directed at the growers and is aimed at improving their ability to market. Any grower may join provided he signs the members agreement and the scheme also enables growers to join from other member states with certain provisos.

When you have succeeded in becoming recognised there is still another hoop to jump through before you can get your hands on any grant aid under this scheme! You have to produce an Operational Programme (OP) which is in essence, a kind of business plan for the next three, four or five years. This can include both capital and revenue items, depending on what is in your OP. To finance the OP, a separate bank account must be set up as distinct from the normal account used by the PO. This is called the Operational Fund and it is there to hold contributions from the members raised by levies based on each member's eligible turnover or volume.

The size of the fund available is dependent on the turnover of the PO and the level of assistance is set by the Commission, currently standing at 4.1% of eligible turnover, known as the marketed production. This means that you will receive 50% financial assistance of eligible expenditure from the op-

erational fund for the implementation of your OP up to a maximum of 4.1% of marketed production. So, all in all, it makes the hassle of being a recognised PO extremely attractive. All these figures, the turnover of individual members, purchases made by the PO, will be checked by an assessor from the RPA and I can vouch that they are pretty thorough!

I should, before we move on to questions, just mention what the RPA refer to as an Association of POs (APO). These are umbrella bodies which can consist of two or more recognised POs. It must be set up with its own legal entity but cannot be a PO itself. It is possible to use it to set up an operational programme on behalf of its members. POs and the APO will take responsibility for running the programme. In co-operative terminology this is referred to as a second tier co-operative. It occurs in certain sectors such as top fruit, where many smallish POs combined to form a second tier co-operative or APO as it is now called, so market jointly to the supermarkets. You could say that it was an early form of category management and perhaps one of the best known ones was Home-grown Fruits in the 70s and 80s, who accounted for a major portion of the apples and pears sales in Kent and Sussex. They are still operating through I loose track of the their latest name change.

Is there anything here for recognised mushroom POs to gain from? It seems like putting an extra tier, and therefore extra costs, on what the mushroom POs are already doing for no particular gain other than marketing under one brand. But the POs do not necessarily have to do their own marketing anyway, they can appoint another organisation as their Marketing Agent and pay them a fee to carry out the marketing of their produce. In this scenario there is an additional agreement drawn up between the PO and the Marketing Agent similar to the members' agreement. In theory, the PO should have the choice of choosing the Marketing Agent who they consider will do the best job for them. However, each case should be judged on its own merits and there may well be benefit for some POs to follow this route.

### Finally

To finish off this introduction to POs, they are essentially organisations set up by growers for the benefit of growers and in today's harsh economic climate, can be the salvation of many a small grower unable to compete on his own in the marketplace because he lacks volume and bargaining power.

# Looking back .....



*Aoife O'Brien with John Lockwood, Paul Middlebrook, Pat Walsh and Geoff Ganney during the final session*

This month's image is taken from a report, *Growing Systems in Perspective*, written by Richard Tite and Andrew Swatton of ADAS. The report was based on a one-day seminar of the same title, organised by the ADAS Mushroom Group, the rump of which was later absorbed into what has become Warwick HRI.

We do not normally feature photographs of people in this monthly item. This month we have made an exception in order to refer to the subject of the seminar, which in its way was quite remarkable. In 1988 the question of the relative merits of a wide range of growing systems was topical enough, not only to draw over 210 delegates to Harrogate, but also to command the participation of four high profile speakers.

What has 16 years brought to the debate? Would we still be able to raise such an event

on this subject? Almost certainly not. If conditions allowed such a thing to occur it is likely the audience would be somewhat smaller and the subject would surely be quite different.

It is possible that speakers of similar stature could be found who would be willing to share their views and experience. As was the case at the recent Industry Conference in Stratford-upon-Avon.

It could be interesting, to speculate what subjects might be chosen, in the hypothetical case of a similar seminar being held today. Yield, harvesting costs and marketing would be high on the list. Perhaps these subjects or some of them would bring us full circle to growing systems. Because, of course, the main claims in the old battle between systems would have involved costs of production. But today the emphasis would be quite different, or would it?



# 2004 Peterborough 'Ray Samp' Seminar

This paper is based on a presentation given by Ray Samp on  
Tuesday, 15th June 2004 at the  
Marriott Hotel in Peterborough.

Reported by Richard Gaze & Melissa Nairn

## Introduction

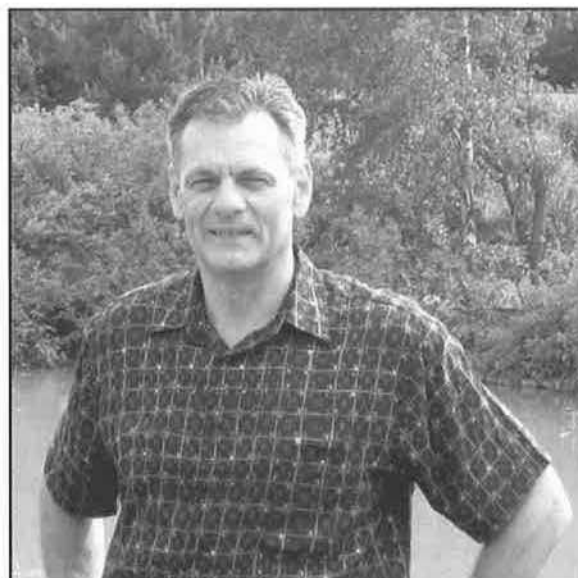
On the 15th June Ray Samp kindly gave us the benefit of his views on our industry in a day-long seminar. The morning session he entitled "How to survive in the Mushroom Business" and the afternoon session, "Growing Quality in Economically Viable Volumes".

We had hoped to publish Ray's own narrative but in this frenetic lap-top and power-point-dominated world, who writes anything down if they can avoid it? We have, therefore, resorted to a combination of reflections and notes, taken on the day by various people at the seminar. So, what follows will be a pale reflection of Ray's presentations. For this I apologise, if there are any major omissions or inaccuracies we will endeavour to correct them at a later stage. While offering these introductory explanations I would add that every attempt has been made to exclude any personal opinion of what I believe was said on the basis that I've probably misunderstood what Ray was trying to convey, anyway. It is his opinions, not anyone else's, that's the subject of this report.

## How to survive in the mushroom business by Ray Samp

### Fight for survival:

Ray took as his starting point the fact that the business of producing and marketing mushrooms had become a matter of survival. No



Ray Samp.

longer are circumstances able to accommodate the good, the bad and the indifferent, now it is a fight, winners versus losers. The best of the opposition are the opponents, finding ways to match them, the prime objective. Those lucky or talented enough to be currently winners have to find ways of remaining so as others challenge their leading position.

The way we sell our product is a major component of survival. We must adapt as necessary to face the changes that are ahead. Unfortunately some will not or cannot make these changes.

Darwin's theory of evolution has often been paraphrased as 'the survival of the fittest'.

Our situation can be described as Economic Darwinism and can be similarly paraphrased. Comparisons of biological and economic evolution have always been apt. What has altered is the selection pressure we are currently experiencing. Now only the most able will survive. But as a result of this situation, change must be considered a good, desirable and essentially, vital thing. How else are the necessary adaptations to the selection pressure to be achieved?

## The UK situation

Ray did not dwell too long on this subject as his audience were only too painfully aware of the situation but he summarised the position as an introduction to his subsequent remarks. Imported mushrooms have been taking an increasing share of the market and this competition is being waged on price. Some of the price advantages have been won due to low labour costs in Poland, favourable currency rates for importers and production efficiencies.

## What can be done by British Growers?

There is an assumption that the downward spiral of home production has bottomed and is now fairly stable. If the British industry can 'hold on' for a few more years labour costs across Europe will achieve a higher degree of parity. His answers to how British growers were to hold on were:

- \* Be a good operator
- \* Increase yields
- \* Reduce costs
- \* Improve marketing
- \* Invest well
- \* Move swiftly to change when necessary.

It was accepted that 'competitive' quality must not be compromised. A question was asked, "How do you reduce costs and increase revenue without more man hours and with lower sales prices?"

His emphatic answer was, "Grow more". An example was given of production increases in the USA. (Table 1.) The dynamics of high volume related to cost of production and revenue generation were explored. (Tables 2. & 3). The example in table 2 illustrates that despite a pro-rata increase in variable costs the increased yield from 50,000lb to 60,000lb results in a total cost reduction from 75p to 66p.

In table 3. a similar comparison between 50,000lb and 60,000lb production shows the effects of increased revenue production even with a lowered price at the higher production level. Such figures should leave no doubt as to the effects of increased production levels from a given facility. The reduced costs of production per pound of mushrooms bring with them a huge resilience, particularly if sales price falls. The equation becomes slightly more complex in relation to increases in cost not directly pro-rata to yield.

The morning session was entitled "How to survive in the mushroom business".



Growers		Total Sales million/lb/annum	Average Yield/lb per ft <sup>2</sup>
<i>Table 1.</i>			
1990	238	749	5.36
2004	110	880	6.06



Fixed Cost/week		Variable Cost @ 25p/lb	Total Cost to produce	Cost/lb
25,000	@ 5lb/ft <sup>2</sup>	12,500	37,500	75p
25,000	@ 6lb/ft <sup>2</sup>	15,000	40,000	66p

Table 2.

Pounds Sold	Average Sales Price	Revenue	Adjust Sales Price	Adjusted revenue
50,000	82p	41,000	80p	40,000
60,000	82p	49,200	76p	45,600

Table 3.

Having convincingly endorsed the need to maximise yield Ray moved on to the means by which this might be achieved. Under the umbrella of maximising yield out of present assets he itemised a number of things which he would return to in the afternoon session. These included increasing the dry matter content per square foot of compost and so providing more nutrition for the production of more mushrooms per square foot. Supplementation with a similar rationale. Improved cultural practices, a big subject but encompassing all those practices that improve or hinder productivity. He also touched on the effects of a two flush cycle which, apart from the more obvious benefits of improved disease control, can provide a cost benefit if the resource formula is favourable. He concluded by suggesting that bought-in phase II or III compost could be beneficial.

### Cost reduction

But unit cost of mushrooms is not all about yield, important though it is. Cost reduction can be tackled directly by more efficient use of resources.

Harvesting was dealt with first. The '900lb gorilla' as it was graphically described, responsible for 33% of production costs, making any significant improvement, therefore, very worthwhile.

Picking technique alone can often be improved and various picking aids are available to speed up the rates. Various other options include picking parlours in combination with picking aids and he suggested that the robotic systems, for example, that developed at Silsoe have perhaps not yet been fully explored.

Other options for cost-cutting were also touched on, economics in raw materials such as improvements in the composting cycle, alternative cheaper organic nitrogen sources and ensuring casing depth is optimal. 40mm depth is required for 2 or 3 flushes, the use of deeper casing layers is probably wasteful.

Ray thought there was little scope for reducing

spawn rates which were already about half that used in the USA. He was, he said, shocked by our short spawn runs and variable, that is often low, rates of spawn usage and felt the effects were unlikely to be beneficial. Other areas of potential cost reduction were packing and energy costs. The implication being, by the suggestion that the Polish and Dutch industries were economical with energy, that we were not.

Having outlined the routes toward producing lower cost mushrooms by increasing yields and directly reducing costs, his target was marketing. The initial message was, appear 'big', "Big it up". Look and behave big and getting bigger, create market and sales co-ops, create strategic alliances, buy-in foreign produce, relish multiple product lines, produce value-added products, promote UK produce and move quickly to fill marketing gaps. He likened the strategy to butterflies which, by means of eye spots, appeared bigger and fiercer than they were. I wait with excitement to seeing the various marketing directors around the country trying that particular technique, it should at least cheer us up.

### **Growing quality in economically viable volumes**

After lunch the seminar changed a gear and focused in more detail upon some of the more important subjects covered in the morning. Ray quoted an imaginary grower, it could in the past have been almost any of us, "On this farm we are interested in quality not quantity". Until relatively recently this was an accepted belief. We thought quality was paramount and that quality and quantity were inversely proportional, one went up and the other down.

Ray's contention is that they are not necessarily mutually exclusive, you can have both. Quantity, high quantity, is now an economic necessity and 'competitive' quality a marketing necessity. His strategy for growing quality in economically viable volumes was given under the following five headings:

- Providing excess nutrition.
- Optimising casing soil.
- Having excellent pin control.
- Installing good environmental control systems.

- Achieving good harvesting management.

### **Providing excess nutrition**

The principle that Ray proposed was to make excess nutrition available to supply "energy to burn" in an attempt to achieve parity between flushes or in other words produce a 3rd flush of similar size to the first two. He explored the options for achieving this interspersed with comment and questions from the floor. A complex equation between fill weights, available dry matter and supplementation, but a simple enough message, make sure you have enough nutrition available in the compost to support an optimum or perhaps maximum third flush, ensuring a high total yield.

### **Optimising casing soil/Pin-set control:**

It was his contention that we have the best supplies of casing soil in the world at our disposal. Achieving control of pinning and the desired 'stagger' to aid both harvesting management and high quality was a subject of great interest to all those present. Perhaps we can persuade Ray to give us his ideas in an article sometime soon. It would be difficult to do the discussion justice in this brief report.

### **Harvesting management**

He concluded his presentation by offering some thoughts on harvesting, wrestling his "900lb gorilla", covering the principles of timeliness of harvesting and multiple harvesting to expand the production potential, 3 flushes of 2.5lb/ft being the objective.

In the concluding question time Ray Samp was asked whether he thought that we had the drive and options open to us for survival? His answer was that despite our poor facilities the intelligence and desire to survive is there. Those that had not survived may have found the prospect too hard, too expensive or too demanding. Maybe some just didn't want it bad enough.

We are all grateful to Ray for sharing his thoughts with us. Also thanks must go to David Mann for chairing the seminar and to Melissa for organising the day.



## 2004 PETERBOROUGH 'RAY SAMP' SEMINAR - (continued....)



*David Spurdens of TAS Valley Mushrooms, one of the Ray Samp Seminar grower delegates.*



*Ray fields questions from the floor in the afternoon session entitled "Growing quality in economically viable volumes"*



*Delegates at the Ray Samp Seminar.*



*Ray with some members of the audience at the Ray Samp Seminar in Peterborough. in June of this year.*



*David Mann of Flixton Mushrooms chaired the event for the day. (Right)*

# Obituary - Hugh Barton

25th February 1915 - 20th October 2004

Hugh Barton, who died on 20th October 2004 aged 89 years, was a much-loved and respected man who had enjoyed a full and fascinating life. He was extremely honourable and dedicated to his wife Joan and his family of six children. He was a wise counsellor who always gave sound advice when it was asked of him. He always wanted to achieve the best in life and tackled projects with enthusiasm and determination - qualities which were with him as a young man and went through his Army career and the commercial world of mushroom growing.

His mother died when he was a young boy which resulted in him living with an aunt in Plymouth. Whilst he was there he developed a love of the sea and wanted to sail. At the age of 16 years he joined a yacht as a crew member and sailed the Atlantic to America and the West Indies. By the time he was 20 years old he had sailed the world and learned the art of navigation which he later taught to his children and many other budding mariners.

Joining the Army at the beginning of World War II he went to Sandhurst and gained his Commission. He survived Dunkirk and was later posted to York Barracks where he met Joan who was stationed at the same camp. They married in 1942 and Hugh later joined The 3rd/1st Gurkhas Regiment going to Kabul in Afghanistan and then Calcutta in India in 1944 on special operations. During his tour of duty he was responsible for dealing with the Bombay explosion which occurred in the harbour when a munitions ship blew up killing and injuring thousands of people. He was later sent to Columbo with Special Forces where his sailing and navigational expertise came to the fore once again. He was put in charge of a Ceylonese Trading boat transporting classified cargo from India to the Coco Islands. For services rendered to the country, Hugh received a personal letter of thanks from the Indian Government.

Civilian life saw him move from Yorkshire to Sus-



*Hugh Barton at the MGA Past Chairman's Luncheon in London on 17th August 1995.*

sex when he purchased an ex-Army Nissan hut at Pease Pottage as family accommodation. A year or so later he acquired some land at Lower Beeding and built a few small mushroom growing sheds which eventually developed into the Winterpick Mushroom Company employing over 100 local people. Winterpick became a modern, highly productive farm respected in the United Kingdom and many far corners of the world.

Hugh gave a lot of his time to the Mushroom Growers' Association, serving on most of the committees and becoming MGA Chairman in 1974. He also acted as treasurer for many years, keeping the Association's finances on an even keel.

He had a great zest for life and a wonderful sense of humour - capable of seeing the funny side of life in the most unlikely places. He will be sadly missed by all who had the pleasure of knowing him.

**Peter Cracknell**



# The Mushroom Journal Profiles:

## Kerry Burton,

Warwick HRI.



### Back on home ground

In one of those curious twists of life, Kerry has eventually returned to work in the area of his childhood. Born and brought up in Coventry, he now lives less than ten miles away in Royal Leamington Spa and works at Warwick HRI, Wellesbourne, a department of the University of Warwick. "At least", he admits, "I can now visit mum at weekends".

### "Ugh" leads to mushrooms

On leaving Kenilworth Grammar School with 'A' levels in Physics, Chemistry and Maths, (no he didn't study biology), he went to Bristol University to read biochemistry. His first job as a qualified biochemist, following a common trend for biochemists, was in a hospital laboratory in Hereford. There he spent a year analysing body fluids and 'soft solids', Ugh! It was probably this experience which directed his interests towards agriculture, because his next step was to study for an M.Sc. at Wye College, Kent, in Applied Plant Science.

Around about this time, in the late 1970s, jobs became more difficult to get. Among the many jobs he applied for, more for interview practice than with serious intent, was one at the Glasshouse Crops Research Institute (GCRI) at Littlehampton in Sussex. The job was advertised as being concerned with cucumber physiology and, as his M.Sc. thesis had been on aspects of courgettes, it seemed a propitious choice. However, it took some months for G.C.R.I. to offer him a job and when the offer eventually came it was to do with tomatoes. Initially, he began working on questions relating to a, then, relatively new growing system for tomatoes, the nutrient film

technique in which the plant roots are continuously bathed in a liquid nutrient solution. This project didn't last too long, but Kerry is rather proud that during his participation he developed the use of automatic light level control. A number of varied projects followed. He remembers working on five separate projects in five years including one on mushrooms in conjunction with John Hammond and Roy Nichols. The mushroom project was concerned with the growth and development of the fruit body.

So, eventually, he had reached the mushroom crop.

### A different approach

Kerry believes that he approaches work on mushroom science and the mushroom crop rather differently from many of his colleagues. Whereas they probably have a microbiological background, he has one based on plant science. As a result he tends to look at the organism as a whole rather than concentrating on one or two particular aspects of it. His early work with the mushroom was studying the biochemistry of the brown staining of the fruit body. Before long this project developed into a more general one on mushroom quality including the application of modified atmosphere packaging.

Kerry recalls that in those days scientists had greater freedom to select their own lines of investigation. "It is not like that now", he declares.

From work related directly to mushroom quality, bruising, storage and refrigeration, Kerry moved over to a study of the mushroom's enzymes, particularly the proteases, which are concerned with the

biochemistry of proteins. This work, still related to aspects of mushroom quality, led to Ph.D. studies at King's College, University of London.

### **A strong will needed**

The last twenty years or so have seen many changes in the way horticultural research, including the mushroom projects, has been organised. A major factor has been a decline in government funding. One of the early changes was that the Glasshouse Crops Research Institute became the Institute of Horticultural Research. On the 1st April 1990 several horticultural research and experimental centres were merged to become the British Society for Horticultural Research and very soon afterwards the Horticulture Research International with a corporate plan to provide a centre of excellence for horticultural Science at Wellesbourne, near Warwick.

Eventually the staff at Littlehampton were transferred to the Wellesbourne site. Of this move Kerry's abiding memory is that while driving from Littlehampton to Wellesbourne, his car broke down. Perhaps not an auspicious start and Kerry goes on to remark that all the changes and re-organisations bringing with them staff redundancies had an inevitable effect on morale. "One had to be very strong-willed to keep the research effort going forward", he says with some feeling.

### **The best of all changes**

The most recent development, with the newly named Warwick HRI becoming a department of Warwick University, Kerry regards as the best of all the changes. They now have several years of stability ahead and have also been released from the civil service shackles.

Academic need has become a primary driving force. Mushroom quality and fruit body initiation are now Kerry's major mushroom research interests and he is now finding the new atmosphere of greater co-operation within the institute and with other university departments very encouraging. He is now looking forward with optimism, but is also mindful that future funding for research is closely tied up with the progress of the UK mushroom industry.

### **Far-reaching effects?**

In addition to his more conventional mushroom pro-

jects Kerry has for some time been engaged, under the auspices of Agarico Ltd, in exploring the possibilities of producing biopharmaceuticals via the mushroom crop. This approach has been called 'mushroom pharming' and requires considerable expertise in molecular biology.

In recent years there has been a dramatic increase in demand for biopharmaceuticals, particularly monoclonal antibodies. There is an urgent need to develop better ways of producing such products other than by the usual expensive method using large fermenter vessels. Plant-based systems using genetically-modified maize, soya bean and tobacco crops are already being considered and tested. Biomanufacturing systems based on the mushroom crop have several advantages. For example, production is continuous throughout the year, there is no risk of contaminating other food crops and production of biomass per hectare is much greater than from field-based crops. A successful break-through in this technology could have far-reaching effects on the mushroom production industry.

### **International mushroom science**

In recent years Kerry has been HRI Mushroom Group Leader and a participant in several mushroom projects in which there has been a co-operative effort with scientists from several European countries. These have involved several enjoyable and exciting trips to the Netherlands, Portugal and France. On one overseas trip when he had been invited to present a paper at a conference in Hong Kong, he was approached by the late Dr Fred Hayes. Fred was, at that time, President of the International Society for Mushroom Science. "I would like a word with you, Kerry", said Fred, "how would you like to take over from Peter Flegg as Executive Secretary of ISMS?" This seemed to Kerry to be an unusual form of international recognition and sounded to be a rather exciting prospect. So he accepted. From January 1st 1994 Kerry has been ISMS Executive Secretary and he has spent the last eleven years promoting the aims of that organisation - arranging international scientific meetings, encouraging scientific and technical mushroom research, supporting the collection and dissemination of information and stimulating the exchange of research workers around the world. It has been a lot of hard work, not without its problems, but nevertheless interesting,



rewarding and allowing even more international travel. Kerry is giving up this post at the end of 2004 leaving ISMS stronger and better recognised internationally than ever before.

During his time at ISMS Kerry has seen considerable change. While mushroom production, and with it related scientific research, has decreased in some of the hither-to world-leading countries, production and interest is growing in such countries as Poland, Hungary, Turkey and India. Production of *A. bisporus* is on the rise in China and several of the African states now have emerging potential centres of mushroom production and research. He regards it as most important that ISMS makes and maintains contact with the first mushroom grower or scientist of a country to take an interest in cultivation fungi so as to bring them into the ISMS fold.

### **'Having fun'**

For Kerry, 'having fun' is a philosophy of life. In pursuit of this he loves dancing, walking, friends and English beer. He used to play rugby union, but now is only a supporter. Another current activity is cycling. He has cycled home to England from the Dordogne area of France and next year he is planning to cycle out there where the family has a 'ruin'.

"At least it now has a roof," he declares proudly. From there he aims to cycle to Spain. The French property is a joint project of Kerry and his brother.

Kerry's own family includes his three sons, Luke (24), with a degree in biology and looking forward to moving out next year to a banking job in Mumbai, India and Alistair (23) reading business studies at the University of Western England, Bristol. "He will go far", is Kerry's verdict. Then there is Tom (20) at the University of Salford following media studies and French. Last, but not least, comes Ruth, Kerry's partner. She works for a biotechnology company.

### **Practical results and great potential**

In addition to having fun, Kerry is keen to see his mushroom research projects produce practical results of benefit to the UK Mushroom Industry. Of his work on the Agarico mushroom 'pharming' project, currently outside the present economic situation in mushrooms, he believes it has great potential and good prospects, but is not being carried away with excessive optimism.







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