



# Business Planning Guide

For ecological farm and forestry businesses





# INTRODUCTION

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This document is the product of a collective effort of the Landworkers Alliance community. If you would like to comment, suggest edits, contribute farm data, or an example business plan that you would be happy to add to this communal resource, please email [support@landworkersalliance.org.uk](mailto:support@landworkersalliance.org.uk).

There are a number of ways to use this document. If you are looking for a basic introduction, and some help getting started writing a business plan, keep reading. If you are confident about business planning, or are in the latter stages of pulling a business plan together under time pressure, Section 1 of this document may not be the most efficient use of your time. In this case, you can use the content menu to jump to a particular section to answer a specific question, or provide sources of data for your business plan.

## Section 1

Section 1 of this document gives general advice on how to write a business plan and explains some of the fundamental concepts used in business planning.

## Section 2

Section 2 covers a wide range of issues relevant to most land-based businesses.

## Section 3

Section 3 is organised into 5 sector specific chapters, and includes lots of sector specific information and resources, including a range of finished business plans and links to communal databases that allow us to share basic farm business data.



The Appendices provide a range of suggestions for further data by topic and Sector.

**This printed version does not include the hyperlinks to the information referred to. However, you can find all those in the online version of the document on the LWA website under Business Support.**

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Image credit: Eric & Dianne Horn

# SECTION 1: GETTING STARTED

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## Why Write a Business Plan

There are many reasons why we may want or need to write a business plan, but commonly:

- To assist the day to management of the business, for example to plan investments without compromising your cash flow or to identify the areas of your business that need attention.
- To plan a significant change. This might be converting to organic farming, introducing a new enterprise, expansion, or switching from supplying a supermarket or wholesaler to direct marketing.
- To apply for a loan, grant, or to support a planning application.

## The Business Planning Process

A traditional approach to a business planning process might start with an analysis of your situation, resources, capacities, competitors, market situation, etc then let your business strategy and objectives emerge from the data.

An existing farm business with good data, may take this approach, by analysing the labour and financial costs to inform capital investment decisions, for example. For the most part, however, it is much more common for people to have intuitive convictions or a passion to pursue a business idea, then to collect evidence for the purpose of checking their assumptions, or to convince potential investors of the merit of their plan.

These do not constitute a right and a wrong approach to business planning. There are very different reasons to produce a business plan, and it is useful to identify what you are trying to achieve.

Rather than starting from the data, or starting with a strategy in mind, an alternative approach is to follow this process the other way around. Start by defining your goals, then let these goals shape how you frame and gather information to develop the strategy of your business plan. This approach to business planning may be more appropriate to an industry with extra-financial purpose, especially if you are seeking finance from ethical investors or community shares.



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Do you want to increase your profits, reduce your workload, teach more new entrants, feed more people, influence the wider farming community, sequester carbon in the soil, rejuvenate a degraded ecosystem, or provide a rural lifestyle for yourself and a family? Start by defining your goals for yourself. Write them down and rank them according to urgency and importance.

The next question to ask yourself is how will you achieve these goals. Have you already made decisions about what to do? Do you have reasons for these decisions and have you analysed them? What alternatives are you ruling out and why? Are other people or organisations achieving your goals in ways you have not yet thought of? You may make decisions that you cannot rationalise, for example, perhaps you fall in love with a farm and build a business plan around being able to afford it, or you know you want to work with new entrants or some particular crop, though you haven't got a reason other than you find something satisfying. The point of this process is not that you have to rationalise every decision and commitment you make, just that it is helpful to become aware of the mosaic of values and commitments that drive your decision making process by writing them down.

This initial process might be quite quick, or it could take a fair bit of time, especially if it is a group process. Whether individually, or in a group, it can be extremely helpful to

separate out the process of creative and critical thinking, as producing ideas is easier when you are not simultaneously critically evaluating them.

You could have a definite business idea, and need to gather and present the arguments and evidence to persuade people to invest time or money in your business. You might work in or for an existing farm business with data, and you would like to analyse this information to identify how best to invest your time or money to achieve certain goals.

Whatever your business planning needs, there are certain key features that are common to all business plans. Whether you are producing a physical product or providing a service, the essence of business planning is to gather, format and analyse information about the costs and prices of your product or service. You do this to make





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predictions about the impact of investments or changes to the future state of your, or your organisations bank balance.

## Basics concepts of business planning

### Costs

It is traditional to assume that all costs can be reduced to a monetary value. This is not the only way to write a business plan. It is completely feasible to frame your cost benefit analysis with a broad set of values, such that financial costs can be explicitly traded off against ecological, carbon or wellbeing costs. Some of these extra-financial costs are difficult to quantify.

Discussing formal systems for ecological accounting, carbon accounting, well being, or other values that may or may not be countable, are beyond the scope of this document. However, we encourage you to define your values in your business plan, and where you anticipate taking a financial loss in pursuit of a particular value, make that explicit and quantify the financial cost.

### Fixed and Variable Costs

To increase the outputs from a system, some of the inputs will need to be increased proportionately, and some will not. The **fixed costs** of production consists of all the costs you have to incur, regardless of how much you produce. The variable costs of production are those that increase in

proportion to how much you are producing. Financial costs are generally easier to identify as fixed or variable than labour costs. For example, purchasing a piece of equipment with a certain capacity would be a fixed cost until production exceeded the capacity of that machine. A job may have fixed and variable components, so setting up, hitching and unhitching a tractor implement will take the same amount of time regardless of the land area that will be worked with it, whereas the time taken to use that implement in the field will be exactly proportional to the land area worked.

The ratio of fixed to variable costs has a strong impact on a business or industry. If we build businesses with high fixed and low variable costs, this creates a strong economic incentive to scale up and simplify. Huge monolithic operations distribute their fixed costs over large production runs, whereas small diverse operations incur a different set of fixed costs for everything they do. A collaborative network of small companies can address this by trading products and services, so instead of 10 farms all paying the fixed costs of something like a plant nursery or a composting system, only one farm needs to pay these fixed costs if all the other farms buy plants or compost from them, and the total cost of production can be reduced for everyone.

The fixed and variable cost dynamics of information are particularly interesting as knowledge or data can be really expensive

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to create, and completely free to replicate. That is to say, it has a high fixed cost, and no variable cost. Learning new skills, like buying equipment, is a fixed cost, whereas applying your accumulated knowledge, skills and/or equipment to a problem is a variable cost. These dynamics of fixed and variable costs can go a long way to explaining the economic advantages to collaboration.

## Capital and operational costs

Land is at one extreme of the spectrum from capital to operational costs, in that it will depreciate (lose its financial value over time) less through neglect than, say, a house. Whether you treat a piece of equipment as a capital or operational expense depends on how long it will last. Single use plug trays could be an operational expense, whilst a plug tray that lasts you many years

could be a capital expense. Whether polythene for your polytunnel is a capital or an operational expense might depend on how exposed your site is, as well as the quality of plastic you buy.

Roughly, operational costs are those that you keep paying at least annually to run your business, whereas capital costs are one off payments that provide something to your business over many years.

## Making a plan

Your plan should have a summary at the beginning, often called an executive summary, to provide an easy-to-understand overview of your plans and needs, and to make the person that doesn't have time to read the rest of your business plan feel important. Besides this, the minimum you will need is:

- An Operations Plan. Identify your product or service, and produce a plan that explains how you will produce and deliver that product or service.
- A Marketing Plan. Identify your customers and explain how you will inform them that your product or service exists.
- A Cashflow Forecast. Collect as much information as you can about what everything will cost, and what prices you are likely to charge, and put this all into a spreadsheet that forecasts your future bank balance and how it will change over time.



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You may also want:

- A Business Objectives Overview. State your business goals, values and objectives.
- A Capital Investment Plan. Whether you are a startup or an existing business, you are likely to invest in infrastructure and equipment. This could be storage facilities, packing sheds, bottling line, food processing equipment, even an on-farm butchery. A capital investment plan identifies how much money you will need, how you will access funds, the period over which you will pay it back and the period of time over which the asset depreciates.
- A Team Overview. Identify some or all of the people that will work on this business, with a brief description of their role, relevant experience and capacities.

- An Organisation/Farm Overview. List everything about you that is relevant to the business plan, including any stuff you own, how much money you have, and any established relationships or reputations.
- An Industry Overview. Describe the trends and developments in your industry at large.
- Competitor Overview. Describes your direct competition for customers, or lack thereof.
- Customer Overview. Describe who your customers will be and give relevant information about them, separately to your marketing plan.

If there are any idiosyncratic features of your business idea or organisation, such as planning considerations, co-operative or community decision making procedures, or technical innovations, you may want to include specific sections to discuss these.

Once you have a list of all the parts you need, you can base your to-do list around gathering the information, writing sections, and developing the spreadsheets, charts, tables and diagrams you will need for each section.





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## Financial projections

You should ideally decide how you want to use your data before you start collecting it. That way you can enter the information into a system in a usable format as you find it. The spreadsheet is a fundamental tool for business planning, so if you are not confident with basic formulas and spreadsheet conventions, take the time to watch some tutorials. Searching 'spreadsheet tutorials' on youtube should get you what you need.

The point of organising information into categories of fixed, variable, capital and operational costs, is that you can then forecast the financial implications of investments or system changes. There are a number of accounting conventions that it is useful to be aware of to help you organise these spreadsheets.

Financial forecasting spreadsheets generally use the columns to represent time periods, moving forward in time from left to right, and list categories of income, expenses, cash reserve, assets, debts, and equity in the rows. The categories in the rows are generally divided into two main categories, called a profit and loss sheet, and a balance sheet.

## Profit and loss

The profit and loss sheet will start with all your income streams at the top, concluding with an income total. Below that you will list your operational costs, with an operational costs total row, followed by a row for profit, which is your income minus your operational costs.

The income and expenses categories on this sheet will reflect the particularities of your business. If you only anticipate a single income stream, from box payments or a milk round for example, income could be a single row, but if you have several different products or ways of selling produce, you will want separate income rows for each.

You may separate your expenses into categories such as production costs, sales costs, overheads, where each category is broken down into subcategories such as labour, packaging, fuel, etc, and each category concludes with a subtotal. Operational costs have a strong tendency to get complicated quickly. If you want a detailed breakdown of operational sundries, you can make a separate sheet for this and import the total from that sheet into the profit and loss sheet, to keep the latter relatively concise.

If you are able to separate these costs into their fixed and variable components, and identify the variable costs as a total variable cost per unit of production, you can calculate the variable costs by multiplying that cost per production unit by the total production required to meet a sales target. This can really help you to get a sense of the profitability, labour and cost implications for your business of different scales of operation you may strive for.

The final section at the bottom of this sheet will start with a gross profit row, which is total income minus total costs of goods sold. This is followed by some other costs, such as tax, debt servicing, etc, then conclude with a net profit row, which is the gross profit minus these additional costs.

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## Balance sheet

A balance sheet tracks the change in value of your company over time, by listing the value of all your assets (what you have) and all your liabilities (what you owe).

Your assets will be categorised into fixed assets, which are physical things that retain value for more than one year, and current assets, which are the less tangible or consumable things, or the things you intend to sell within a year. For example, your bank balance is a current asset. A pile of wood would be a fixed asset if your intention was to build a building with it, whereas it would be a current asset if your intention was to sell it, or burn it for energy production.

Once you have identified all your fixed assets, it is important to identify which assets are appreciating or depreciating, and produce an estimate of this change in value over time.

You should factor the resale value of an asset in your depreciation calculation only if your intention is to sell it at some point in the future. However, for the purpose of financial forecasting, depreciation is not a measure of the change in resale value of an asset over time, so much as it is a method for distributing the cost of an asset over its useful lifetime. For a given piece of equipment or infrastructure, divide its cost by the number of years you expect it to be useful. The result of this calculation is the annual depreciation of that asset. For example, a concrete slab may cost £10,000, have no resale value at all, but be useful for 50 years. In this case your balance sheet would record that you invested £10,000 in a physical asset, and you would calculate the depreciation of that asset as £200/year. This calculation obviously does not track the resale value of that asset, it is a way to calculate its cost in relation to its utility over time.



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## **Accessing finance**

Please see the Landworkers' Alliance Guide to Fundraising which is available on the LWA website. As well as a general overview to accessing capital, and what funding options are available to which types of organisation, it includes a list of organisations that finance ecological farms.

## **Support and advice**

If you need experienced and knowledgeable people to put focused work hours into your business plan, it can be well worth the money to pay professional agricultural consultants. This is partly because of the experience that these organisations can offer, but also because banks and funders may know and trust the opinions of these consultants. However there are organisations that provide grant funded or low-cost mentors or advisors, and if you can access one, they're likely to be a tremendous source of knowledge and support. There are also courses and forums where you can meet others from your sector, share knowledge and perhaps find peer support. Friends or family members can also help with aspects of your plan you find more challenging.

Finally, the Landworkers' Alliance is able to provide some support and advice to members and farmers, growers, foresters and land-based workers transitioning to agro-ecological systems. If this would be of use please use the contact form on the member support page of the website, and we will direct your enquiry to people best placed to assist you. Members can access the LWA Forums via the website.



# SECTION 2:

## GENERAL FARM BUSINESS INFORMATION

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**The following section picks up on a range of topics to consider for your business planning, partly as a reminder and partly to point towards helpful resources. It also gives some indication of costs where possible.**

**An essential part of the business planning process is the consideration of where money for start-up, expansion or investment is going to come from. The LWA Guide to Fundraising looks at grants and loans from public, charitable and corporate sources.**

### **Accountancy**

While there are no standard accountancy costs, we can look at what others with similar businesses are spending. As accountancy fees vary within the UK, it's also worth getting quotes from local accountants for preparing your annual accounts, and if relevant to your business, payroll services.

Our survey of 10 farm and forestry businesses found that sole traders are spending £65-£75 pa to have an accountant prepare a balance sheet and profit and loss account. Some sole traders choose to prepare their own accounts. Larger amounts are spent on annual accounts by farm and forestry businesses with a requirement to report to Companies House, grant funders, and/or the Financial Conduct Authority (FCA).

Our research found that these organisations spend c. £600 - £700 pa. VAT registered businesses were also spending c. £750 pa. Registered charities are spending considerably more per year when required to have an independent examination of their annual accounts. Appendix 1 details the results of our research.

If you're registered with Companies House or the FCA, don't forget to also budget for their annual fees which you can find on their websites.

### **Card payment services**

The LWA's publication Direct Sales and Short Supply Chains (2020) details the cost of card readers such as SumUp and fees for payment service providers such as Stripe. You can also obtain quotes for card payment services for your business over the phone by contacting an independent payment advisor, such as Accept Cards and Annectouk.

Existing farm and forestry businesses surveyed aren't separately accounting for card fees so we can't provide an indication of actual annual spending on card fees by the farms and woodlands we surveyed. However, typically card readers charge 1.75% per transaction, transactions on the internet cost 2%, and direct debit transactions are charged at 1%. For detail see the LWA's Guide to Direct Sales and Short Supply Chains (2020).

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### Cost of borrowing

The interest we can expect to pay on any loans we need for our businesses changes with the economy. A cautious rate to use in your business plan in 2021 would be 6%, but it's possible to find cheaper loans. The LWA's Guide to Fundraising includes links to lenders with a particular focus on farm, forestry and community businesses, including some providing loans at 0%. The guide also includes information on grants from different sources.

The interest rate of a loan is one of two important considerations, the other being the terms of repaying the loan. Use your cash-flow forecast to work out the amount you could afford to repay every month. This can then be used to work out how long you need the loan for (loan term).

### Certification costs and membership schemes

Certification and assurance scheme fees are easy to find as the likes of the Organic Control Bodies and Red Tractor have fixed fees which can be found by searching their websites. The government produces lists of certifying bodies and assurance schemes which are listed in Table 1 below.

However, there are some schemes omitted from the government's websites, including Pasture for Life and Grown in Britain.

Membership fees for organisations including the LWA and the OGA are upwards of £25 pa, depending on the type of membership. Those fees are on their websites. Subscription services, such as to publications, can also be accounted for here.

**Table 1 : Organic certifiers and assurance schemes**

Organic certifiers

You can find these on [www.gov.uk](http://www.gov.uk)

Farm assurance schemes

Look for approved assurance schemes on the FSA website

Woodland assurance schemes

FSC and PEFC provide forest and woodland certification schemes for woodland management on their websites. For fire wood and biomass certification see the Biomass Suppliers List on [www.gov.uk](http://www.gov.uk) or [www.woodsurre.co.uk](http://www.woodsurre.co.uk)  
For Northern Ireland look on the DEARA site

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### Insurance

Our research of 10 farm and forestry businesses showed that there is a wide range in costs for insurance. The smallest costs were associated with those only needing public and product liability insurance at around £300 pa, with prices doubling to around £600 pa for those also needing insurance for staff and/or volunteers. Those businesses with regular open days, school visits, machinery, tenants, corporate days and more have higher insurance costs. See Appendix 2.

### Marketing and promotion

Your business plan will need some combination of market research, meaning some evidence that you have collected to show that the customers you need are available, and a marketing plan with a budget for the work of reaching that customer base. It may well be feasible to do your initial marketing campaign as your market research to support your application for finance. For example, if you need market research to show that you can get 100 initial or additional customers for your business, the easiest way to do this may be to gather the contact details of 100+ people that say they want to be your customers. This way, your market research work can also function as a preliminary marketing campaign.

Be aware that if you collect contact details or any other personal information for business purposes, data protection laws are likely to apply. This means that you have a legal obligation to inform people how their data is going to be used, and to secure that information, including having passwords on any mobile devices that have access to your company email account, and the like. The ICO (Information Commissioner's Office) website provides more information.

Budgets for marketing can include website development and maintenance, social media, leafleting, posters, events, and the administrative work of customer communications. Our research of 10 farm and forestry businesses found large differences in marketing activities, with some doing almost all of their marketing themselves, with little financial cost (£100 pa or less), and others allowing a large budget to reach a wide community of volunteers, and customers for their education and corporate services as well as their produce. The website Start-Ups provides an overview of prices associated with developing and maintaining a website: .





## SECTION 2: GENERAL FARM BUSINESS INFORMATION

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### Farmers' markets and online sales platforms

A stall rental for the day at farmers' markets is typically around £25, but ranges from £10 to £75. There is no one definitive list of farmers' markets in the UK but you can find your local farmers' or producer markets by searching the internet. The Farm Retail Association is a good place to start but there are many others. Each market will have a contact who'll be able to provide you with their stall rental pricing.

Online sales and management platforms such as food hubs through the Open Food Network, Ooooby, BigBarn, Boxmaster, and others all have transaction and sometimes set up fees. You can find these on their various websites.

### Packaging

The Landworkers' Alliance publication Direct Sales and Short Supply Chains (2020) details the cost of packaging and provides supplier lists.

### Machinery and repairs

The Farm Management Handbook produced by Scottish Agricultural College is free to download and contains a table of estimated annual cost of spares and repairs as a percentage of purchase price (page 369).

### Distribution and vehicle costs

Vehicle expenses are highly variable, depending on the size of the business and the type of sales model that's used. A CSA which has one distribution point where members collect their produce has very different vehicle expenses than a business with daily deliveries to restaurants. If you have a vehicle, a starting point to budget for vehicle expenses will of course be your annual insurance premium, vehicle tax and if applicable, an MOT. After that, it's recommended that you estimate your annual mileage, and budget for at least £0.35 per mile.



## SECTION 3: SECTOR SPECIFIC DATA

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### Fruit and Vegetables

We have synthesised a lot of the data on horticultural yields and sales prices in a spreadsheet that you can use in your own documents. We will try to maintain and build this resource. This is housed on the LWA website and can be accessed through the online version of this document.

#### Annual Incomes

For your business plan you'll want a lot more detailed financial information than just a total projected annual income, but it is still helpful to have an idea of the range of net incomes being generated in your sector. Fortunately, the Landworkers' Alliance, the Ecological Land Cooperative (ELC) and Moss Brook Growers between them have reviewed the net incomes of over 60 UK-based small-scale ecological producers, primarily small-scale fruit and vegetable growers:

- Production Case Studies: UK (2018)- available in the publications section of the LWA website
- A Matter of Scale (2017), as above
- Moss Brook Growers Venture Forth, article in OGA's journal (accessible to members only), No.34 (2016).
- Small is Successful (2011), ELC.

The Organic Centre Wales has provided example figures for the impact on whole farm profitability for introducing field-scale vegetables into an existing livestock system within a larger farm setting. Though these prices are from around 2008, the relative change in income should give some sense of the likely impact of introducing horticulture to a livestock holding.

#### Start-up Costs

The LWA interviewed three fruit and vegetable producers on their start-up costs which are set out in detail in the publication [New Entrant Example Start-Up Costs \(2019\)](#).

Moss Brook Growers, producing field-scale vegetables on 21-acres, have shared [their business information](#), including investments in machinery, buildings and equipment.



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Gardening for Profit, published by Green Books guides the reader through the process of securing land and setting-up a small-scale vegetable business and includes figures for start-up equipment for a 2-acre market garden. It is available to [download](#) for £6.99.

Mark Measures and Iain Tolhurst of the ORC produced [example business plans](#) for the ELC for three horticultural businesses on plots between 3-9 acres, including start-up costs for protected and field crops (Appendices 2-4).

In [Appendix 4](#) we've provided a list of suppliers to check latest prices for equipment and tools, new and second-hand.

### Yields

The LWA, Centre for Alternative Land Use (CALU) and the CSA Network have provided or provide data on the yields that are being achieved for individual fruit and vegetable crops.

- A Matter of Scale (2017), LWA, provides yields data for 22 fruit and vegetable crops. The farms surveyed for this publication include those making use of intercropping, polyculture and agroforestry (see page 13 and Appendix 1, tables A1.5 - A1.7):
- The CSA Network (2020) provides yields for 19 vegetable crops within its [Horticultural Cropping Tool](#).
- The Network for Climate Action provide [this](#) as a home gardeners perspective on yields for over 50 horticultural crops.
- [CALU Technical Notes](#) (2005) include fact sheets on over 30 non-organic fruit and vegetable crops which include yields.

### Sales Prices

- The Soil Association produces [weekly horticulture produce prices](#) (wholesale and retail).
- Growers also refer to prices set by the larger box schemes, such as Riverford Organic Farmers, or set by local producers.
- The government compiles [weekly average wholesale prices](#) of certain UK produced fruit and vegetables, although these aren't organic. You can also access historical data at the same site.





## SECTION 3: SECTOR SPECIFIC DATA

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### Financial Costs

We've compiled a list of suppliers to establish up-to-date costs for: seed, plug plants, crop covers, etc. You'll find it in [Appendix 3](#).

### Labour Costs

The AMOS Report (A Matter of Scale, 2017) (section 7.1) provides data on labour per hectare from nearly 60 small-scale fruit and vegetable producers.



If you are an existing farm with decent records of the fixed and marginal labour costs of production, you may be able to project the increase in labour that a particular increase in production will entail.

If you are developing a business plan for a startup, you will need to find operations that are doing what you want to do and ask for their data.

Remember that productivity is highly variable, dependent on infrastructure and equipment, skill, experience, land quality, farm layout, weather and climate, proximity to market, and a host of other factors. If you seek to pay, or pay yourself minimum wage, labour could be anywhere from 50% to 90% of the operational costs of production in organic horticulture. Getting a handle on the labour costs of production is a key challenge to the sector and is something we are seeking to address.

### Projecting Quantities Needed

The Soil Association/ CSA Network has developed a free [Excel spreadsheet](#) which projects quantities (kilos) needed annually and corresponding planting area based on weekly demand. The spreadsheet comes with standard yields for fifteen vegetables, but the spreadsheet can be edited to include other produce.

LWA member Jonathan Hughes has produced this [veg box planning tool](#).

### Cropping Planning

The Soil Association spreadsheet (see above) which projects quantities (kilos) needed annually also gives corresponding planting area based on weekly demand.

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## Crop Data Management

Veggie-Compass (USA) is a very detailed free tool designed to calculate crop costs and margins in detail, including by sales outlet (e.g. farmers' market, wholesale, etc.). The tool takes you through all of the possible costs which otherwise may be hidden and allocates labour and overheads proportionally to each crop. The website includes helpful video tutorials.

The ORC (UK) has prepared a similar (and also free) tool to calculate individual crop costs and margins, although without supporting video tutorials.

## Example Business Plans

- Mark Measures and Iain Tolhurst of the ORC produced examples plans (2017) for the ELC for three horticultural businesses on plots between 3-9 acres:
- Moss Brook Growers, a vegetable business on 21-acres of Grade 2 land in Lancashire has shared their business plan and Excel files (2011).
- Sutton Community Farm produced a 5-year business plan (2017) for their 7-acre community farm providing veg boxes, volunteer opportunities, school visits, workshops and tours.
- Community Farm Bristol produced a 5-year business plan (2013) for their 28-acre community farm providing veg boxes, wholesale veg, education and volunteer opportunities.

## Cereals

### Annual Incomes

An increasing number of arable farmers are growing cereals on a relatively small-scale, cultivating heritage varieties and selling grain and/or flour directly to consumers.

There aren't yet any publications that have looked at the range of incomes being generated by these small-scale cereal producers.



Image credit: Blackbark Films

# SECTION 3: SECTOR SPECIFIC DATA

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## Start-Up Costs

- The LWA interviewed a new-entrant arable farmer producing wheat on 25 acres and using the grain to produce bread sold directly to customers. The start-up costs are set out in detail in the publication [New Entrant Example Start-Up Costs](#).

## Yields

- Researchers have looked at cereal varieties more suited to organic production. A comparison of yields, and protein content, of 17 conventional, heritage and new European wheat varieties grown on organic land can be found at [Innovative Farmers](#) (2018).

- [Organic Farm Management Handbook](#) (2017) provides yields for a range of organic cereals as does the [Farm Management Handbook](#) (2019) for non-organic systems.
- The above case study from the LWA (see Start up costs) details how much wheat, and land, one farmer uses to produce a given amount of bread.

## Running Costs

- The [Farm Management Handbook](#) (2019) provides average variable costs for organic cereals including wheat, oats, and barley.

## Sales Prices

The price achieved by a small-scale cereal farmer varies significantly depending on whether the cereal is being sold wholesale, retail, or being used in bread making and sold directly to customers.

- [Tamarisk Farm](#) in Dorset sells whole and milled grains directly to consumers.
- In Northumberland, [Gilchesters Farm](#) sells its milled heritage grains directly to consumers.
- [Dartington Mill CIC](#) is selling the wheat it mills via a local food hub.
- For wholesale prices, the Soil Association produces monthly prices for oats, wheat and barley.
- Scotland the Bread based in Fife in Scotland publishes trade prices for flour and grains of heritage cereals grown in Scotland.



Image credit: Blackbark Films



# SECTION 3: SECTOR SPECIFIC DATA

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## Woodland

### Annual Incomes

As yet, there aren't any sources of data to evidence and help understand the range of net annual incomes being generated at the different small-scale and community woodlands operating in the UK. There are however a handful of case studies:

- The LWA interviewed two forestry businesses: one forester managing a 20-acre mixed woodland, producing timber and firewood and providing contract work felling and extracting; and a coppicing social enterprise managing 20-acres, producing poles, firewood and charcoal, providing contract services managing woodlands, and providing educational and training. The [examples](#) include the business' turnover and start-up costs.

Making Local Woods Work created dozens of case studies of community woodlands and some provide simplified financial information, including:

- Abriachan Forest
- Knoydart Forest

### Start-Up Costs

- **Coppice products:** The [LWA publication on new entrants](#) provides a case study of a coppicing cooperative, including start-up costs:.
- **Firewood:** The publication above also provides a case study of a small-scale forester selling, firewood et al. The case study includes start-up costs.
- **Logs:** [The Farm Management Handbook \(2019\)](#) has an extensive section on woodland which includes conifer and broad-leaf example start-up costs, grants, direct costs and income (Scotland only).
- **Sawn timber:** CALU provides an [introduction to mobile milling](#), including equipment needed.



Image credit: Blackbark Films

# SECTION 3: SECTOR SPECIFIC DATA

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- Coed Cymru provide a comprehensive guide to starting up in chainsaw timber milling, including equipment needed.
- **Wood Fuel Pellets:** CALU has produced a 'technical note' for Small Scale Wood Fuel Pellet Production, and although now a little dated, it is still useful. It sets out the equipment needed, along with a comparison of the economics of different rates of pellet mill throughput:
- **Prices for equipment** can be checked with suppliers listed in Appendix 4.
- **Wood products:** Cobweb provides factsheets for wooden furniture and toy businesses (fact sheets under art and crafts). These contain costs for: fire detection and prevention equipment; trade memberships; online marketplace trading etc.

## Running Costs

- Figures for certain direct costs are given in the Farm Management Handbook (2019): extracting round wood to roadside; planting by machinery; pruning and shearing; and harvesting and marketing. However, this has been written for the Scottish forestry sector.

- Business plans in the public domain provide projections of costs, including those not covered in publications, such as clearing Rhododendron:
- Glenan Community Woodland
- Kilfinan Community Woodland

## Sales Prices

The project Making Local Woods Work looked at 10 community woodland businesses. It found that the majority of businesses selling milled wood based their prices on local sawmill prices and then negotiated with customers on a case by case basis.

Many small-scale sustainable woodland businesses sell products directly to customers and publish their prices online, including:

- Ben Law
- Devon Sawmills
- Leeds Coppice Workers
- Kilfinan Community Forest

Grown in Britain provides up-to-date prices for eight of the more popular hardwood timber species Log prices for Scotland for ash, beech, oak, elm, larch, pine and spruce are listed in the Farm Management Handbook (2019) The Forestry Commission keep up-to-date prices for coniferous standing and softwood sawlog sales prices Example Business Plans Glenan Community Wood (2018) Kilfinan Community Woodland (2008)

# SECTION 3: SECTOR SPECIFIC DATA

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## Livestock

### Annual Incomes

Unlike for horticulture, there are as yet few sources of data to indicate the range of current net annual incomes from animal and meat sales for businesses employing regenerative or ecological practices. There are, however, publications looking at the differences in yields and costs at farms employing regenerative and ecological farming practices compared with margins achieved in conventional farming systems, and these are included in the sections below.

### Start-Up Costs

- The LWA interviewed two meat producers, one on a 22-acre mixed holding and the other on a 300-acre livestock holding. Their start-up costs are set out in detail in the publication [New Entrant Example Start-Up Costs \(2019\)](#).
- The ELC (2011) interviewed a [farmer with a small-scale duck hatchery](#), and details captured include start-up costs
- In 2022 the LWA did a webinar on pastured poultry which included a presentation by a crofter in the west of Scotland doing broiler chickens. This included building an on-farm slaughter facility with a blast chiller. Their total investment was about £40k which included all field ware, labour and a commercial kitchen. The webinar also includes information on pastured poultry for eggs. The recording can be watched back here and a summary of relevant information has been collated here.





## SECTION 3: SECTOR SPECIFIC DATA

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- Cobweb provides business factsheets for turkey and duck farmers, including typical prices for infrastructure and equipment. Cobweb factsheets can be accessed for free via [Business Wales](#)
- Although now in need of updating, CALU produced '[technical notes](#)' for raising goat, turkey, venison, buffalo, alpacas, geese, and pigs for meat which provide a helpful introduction to each sector
- Latest prices for equipment and tools can be checked on suppliers' websites. [Appendix 4](#) lists some suppliers.

### Yields

- The AMOS Report (2018), in Appendix 1, Table A1.1, provides example yields per herd size from 26 small-scale and ecological livestock farmers based in the UK. Although the data does need some further analysis to provide a benchmark.
- The Farm Management Handbook (2019/20) from the Scottish Rural College provides average weights for a range of livestock, including for animals reared on both organic and small-scale farms.
- Pasture for Life provide a comparison in income from beef and lamb achieved in conventional versus regenerative farming systems
- Meat Promotion Wales provides fact sheets on beef and lamb production and these include average weights.
- The AHDB provides guides to calculate the weight of prime cuts per weight of animal for beef, lamb and pork



Image credit: Joya Berrow

## SECTION 3: SECTOR SPECIFIC DATA

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### Sales Prices

If you are producing meat to a particularly high standard, you can ask a price which reflects its quality. It's therefore more appropriate to research prices set by other businesses selling similar products.

Examples of agro-ecological farms selling meat include:

- [Burnt Edge Farm](#)
- [Butchery at Bowhouse](#)
- [Smiling Tree Farm](#)
- [Tamarisk Farm](#)

If you would like to also know the market prices, these can found as follows:

- The Soil Association produces [monthly wholesale organic beef and lamb prices](#)
- The AHDB provides [wholesale prices](#) for pork, lamb and beef (deadweight and liveweight)
- Meat Promotion Wales provides [daily prices](#) from English and Welsh livestock markets
- The AHDB provide [cost calculators](#) for the full range of beef and lamb cuts, including retail selling prices by cut (non-organic)

- Cobweb provides [business fact sheets](#) for duck and turkey farmers which include average retail prices.

### Production Costs

- The [Farm Management Handbook \(2019\)](#) contains data for direct costs for most types of livestock, including for organic and small-scale farms
- The ORC provide a technical leaflet '[Financial Performance, Benchmarking and Management of Livestock and Mixed Organic Farming](#)' (2019) which contains average direct costs (now slightly dated), as well as data for yields and overheads
- The AHDB provide [prices for hay and straw](#), updated monthly
- Cobweb's [factsheets](#) for turkey and duck farmers include typical prices for live poults and fertilised eggs
- Quality Meat Scotland produces an annual report on [Cattle and Sheep Enterprise Profitability](#), which includes typical direct costs, including feed and vet bills. The data does come from farms with larger herds



## SECTION 3: SECTOR SPECIFIC DATA

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- Pasture for Life has created a comparison in costs for beef and lamb reared in conventional versus regenerative farming systems
- We haven't find a source of typical market prices for butchery, packing and meat processing costs (e.g. for sausages). These costs could be researched either by asking your nearest abattoir, or joining one of the forums. There was a discussion on the Pasture for Life members forum about abattoir costs for cattle under and over 30 months in March 2022. The overview of these costs can be found [here](#).

### Modelling Tools

- The AHDB provides a [free tool](#) for modelling meat box schemes (cuts, costs, and margins).
- The Accidental Smallholder provides a [free calculator](#) to calculate the cost of rearing weaners on a small-scale. You will need to create a free account to access.

### Dairy Products

#### Annual Incomes

Unlike for horticulture, there aren't yet any sources of data to indicate the range of current net annual incomes being generated in the UK at dairy farms employing agro-ecological or holistic land management practices. There are a few indicative sources to look to:

- Christine Page has produced indicative net incomes from raw milk, cream and butter sales based on her experience on 12-acres at Smiling Tree Farm. Christine can be [contacted directly](#) for her financial template.
- The LWA's publication [New Entrant Example Start-Up Costs](#) (2019) provides two case study farms with dairy cows, including (gross) income from milk and cheese sales.
- The ELC's publication, [Small Farm Profits](#) (2018), provides a simplified example of income at a micro dairy on 12-acres with 6 cows selling milk through a milk vending machine.
- The Real Farming Trust produced a [report about access to land and micro-dairies](#) in 2017. Although focused on the 'big picture' around micro-dairies, it does contain some useful pointers about markets and business models.



Image credit: Clem Sandison



## SECTION 3: SECTOR SPECIFIC DATA

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### Start-Up Costs

- The LWA interviewed a dairy cow farmer on 35-acres selling fresh milk locally through a milk delivery scheme, and a mixed farmer producing cheese. Their start-up costs are detailed in [New Entrant Start-Up Costs](#) (2019).
- Christine Page from Smiling Tree Farm has a [blog](#) with many resources to help develop a business plan for a dairy cow business.
- She also has developed a financial template for micro-dairies, which includes typical start-up costs, as well as a cash-flow and profit and loss. She is happy to share the template and can be contacted via her [website](#).
- The British Sheep Dairying Association (BDSA) offers to [connect aspiring sheep milk producers](#) with established producers so that they can talk with them about start-up costs (among other things), although those producers may not to be focused on agro-ecological land management practices.
- Although now in need of updating, CALU produced 'technical notes' for organic dairy goats and sheep, as well as water buffalo, which provide a helpful introduction to each sector.
- Alex Heffron of Mountain Hall Farm has written an introduction to small-scale dairying, with links to keeping cows, goats, and sheep.
- Latest prices for equipment and tools can be checked on suppliers' websites. [Appendix 4](#) lists some suppliers.

### Yields

There are many sources of data for milk yields, both organic and non-organic, although you are likely to get lower yields if you intend to set-up, for example, a cow-calf dairy.

- The National Bovine Data Centre (NBDC) provide [average milk yields](#) by breed of dairy cows within conventional farming systems.
- The [AMOS report](#), in Appendix 1, Table A1.3, provides the milk yields being achieved at four small-scale dairy holdings.



Image credit: Eric & Dianne Horn

## SECTION 3: SECTOR SPECIFIC DATA

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- Smiling Tree Farm runs a 100% grass-fed holistic cow-calf dairy with daily yields per cow of around 8L and recommends new entrants plan on 6L until they have established a good working system with their cows and calves. Smiling Tree Farm website has detailed resources on their compassionate cow-calf management practices via a [series of blogs](#) on cow-calf dairying. You can also [contact her direct](#) for advice.
- Domesticanimalbreeds.com provides [milk yields for different breeds of sheep](#) within conventional farming systems.
- The largest survey of commercial dairy goat farmers, reported goat milk yields ranged from 700 to 1,800 litres/goat/year, median 1,022 litres/goat/year.
- CALU in their introduction to water buffalo farming provide expected milk yields for buffalo.
- If you are converting milk into cheese the rule of thumb is that you'll get 1 kg of cheese from every 10L of milk for cows and goats milk and about double that for sheep's milk.

### Production Costs

- Christine Page from Smiling Tree Farm has prepared a financial template which contains typical figures for direct costs. Provided for free on [request](#).
- The [Farm Management Handbook's](#) (2019) section on organic dairying contains typical costs for AI, replacement costs, medicines etc.
- The AHDB provide average market prices for hay and straw, and cow and heifer prices, updated monthly.
- Latest prices for consumables and milk testing can also be checked on suppliers' websites. Appendix 3 and Appendix 5 list suppliers.

### Sales Prices

There are easily accessible sources of data for milk and dairy products prices, such as from the Soil Association and AHDB, but these prices aren't representative of the prices achieved by micro dairies employing regenerative or holistic land management. Dairy produce from these dairies is sold at a higher price due to higher welfare and land stewardship standards, and has higher nutrient levels in the milk. Existing dairies with a similar sales model and ethos would be a better source for expected prices. Examples include:

- [Calf at Foot Dairy](#).
- [Ethical Dairy](#).
- [Laverstoke Park Farm](#) (buffalo)
- [Mossgiel Organic Farm](#)
- [Old Hall Farm](#)
- [Plaw Hatch Farm](#)
- [Smiling Tree Farm](#)
- [Stroud Micro Dairy](#).
- [Tablehurst Farm](#)
- [Taw River Dairy](#).

# APPENDIX 1: SAMPLE ACCOUNTANCY FEES

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Business description	Legal structure	Services	Budgeted / actual	Cost (£/yr)
Established 10-acre organic mixed farm operating a box scheme, market stall and on-line sales. Volunteers, but no paid staff.	Sole trader	Annual accounts	Actual	£74
Established 5-acre organic mixed farm with a focus on high value salad leaves for retail and restaurants. Volunteers but no paid staff.	Sole trader	Annual accounts	Actual	£65
Established 18-acre farm operating a veg box scheme and veg van. Volunteers and paid employees.	Sole trader	Annual accounts prepared by farmer	Actual	£0
Established VAT registered mixed farm selling directly to consumers.	Sole trader	Annual accounts for self-filled VAT return	Actual	£750
Established field scale vegetables on 21-acres selling to small number of independent outlets. Paid staff and volunteers.	Workers Coop	Annual accounts	Budget'd based on previous years	£650
Established 7-acre community farm providing veg boxes, volunteer opportunities, school visits, workshops and tours. Staff and large number of volunteers.	Community Benefit Society	Annual accounts	Actual	£1,123
Est. 1,300-acre community woodland with a focus on sustainable woodland livelihoods, education etc, staff and vols	Registered charity	Independent examination of annual accounts	Actual	£3,115



## APPENDIX 2: SAMPLE INSURANCE FEES

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Business description	Which insurance?	Budgeted/ actual	Cost (£/yr)
Established 10-acre organic mixed farm operating a box scheme, market stall and on-line sales. Volunteers, but no paid staff.	Public and product liability	Actual	£310
Established 7-acre community farm providing veg boxes, volunteer opportunities, school visits, workshops and tours. Staff and large number of volunteers.	Public and product liability, employers insurance	Actual	£620
Established 3-acre organic market garden selling to local retailers and via Farmdrop. Volunteers and paid staff.	Public and product liability, employers insurance	Actual	£675
Established 18-acre farm operating a veg box scheme and veg van. Volunteers and paid employees.	Public and product liability, employers insurance	Budgeted	£700
Establishing 146-acre community woodland with plans for land management for biodiversity, community activities and access. Plan includes paid staff.	Public and product liability, employers insurance	Budgeted	£975
Charity managing 1,105 acres woodland for recreation, crofts, timber, firewood, and vocational training.	Public and employee liability insurance	Budgeted	£1,900
Established field scale vegetables on 21-acres selling to small number of independent outlets. Paid staff and volunteers.	Employers' liability, public liability, contents cover	Budgeted	£2,350

# APPENDIX 3:

## SUPPLIERS OF CONSUMABLES

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### Sources of Prices for Direct Costs

\*\* For packaging suppliers see LWA's publication Direct Sales and Short Supply Chains (2020), pages 52-59 \*\*

**Please note: this list will never be complete and inclusion in the list doesn't constitute a LWA endorsement of the products sold by these companies.**

#### Cheese making

- [Cheese and Yogurt](#)

#### Crop protection

- [Garden Organic](#)
- [Tamar Organics](#)

#### Ear tags

- [Dalton Tags](#)
- [Shearwell Data](#)

#### Feed Supplements

- [BW Feeds](#)
- [Uist Asco Ltd](#)

#### Ground cover

- [Garden Organic](#)
- [Tamar Organics](#)

#### Labels

- [Beechman & Co](#)
- [Labelling Solutions](#)
- [Telford Marketing](#)

#### Milk testing kits

- [Fisher Scientific](#)
- [Millwood Products](#)

#### Pest control

- [Garden Organic](#)
- [Tamar Organics](#)

#### Plug plants

- [Delfland nurseries](#)

#### Seeds

- [Garden Organic](#)
- [Organic Arable](#)
- [Tamar Organics](#)
- [The Real Seed Company](#)
- [The Seed Coop](#)

#### Soil conditioners

- [Uist Asco Ltd](#)

#### Trees

- [Perrie Hale Nursery](#)
- [Woodland Trust](#)

#### Tree guards

- [Farm and Garden Supplies](#)
- [The Farm & Forestry Co Ltd.](#)

#### Yogurt making

- [Cheese and Yogurt](#)

# APPENDIX 4: SUPPLIERS OF EQUIPMENT AND TOOLS

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Please note: this list will never be complete and inclusion in the list doesn't constitute a LWA endorsement of the products sold by these companies.

## **2nd hand farm and forestry equipment**

- [Agriaffaires](#)
- [Baggleys Machinery](#)
- [Ebay](#)
- [Hugh Page](#)

## **Cereal, Milling and Baking Equipment**

### **Baking ovens**

- [Cool Experts](#)
- [Second hand Catering](#)

### **Dough mixers and troughs**

- [Ecatering](#)
- [Nisbets](#)

### **Flour mills**

- [Astreia](#)
- [Zentrofan](#)

### **Seed cleaners, separators and driers**

- [Chief Industries](#)
- [McArthur Agriculture](#)
- [Nickerson Brothers](#)

## **Dairy Equipment**

### **Bottle washers**

- [Aquatech BM](#)

### **Butter Churns and cream separators**

- [Milky Day](#)

### **Cheese making equipment**

- [Jongia \(UK\) Ltd](#)

## **Dairy Equipment (cont)**

### **Milk vending machines**

- [The Milk Station Company](#)
- [CE Projects Ltd](#)

### **Mobile milking parlours**

- [Milking Systems](#)

### **Parts and spares**

- [Dairy spares](#)
- [Promar Dairy Direct](#)

### **Pasteurisers**

- [Goat Nutrition Ltd](#)
- [Milky Day](#)

### **Processing equipment**

- [Goat Nutrition Ltd](#)

### **Sterilisation**

- [Nisbets](#)

### **Tanks**

- [Alfredo and Co](#)

## **Horticulture equipment**

### **Horticulture tools suppliers**

- [Keen Gardener](#)
- [Harrod Horticultural](#)
- [Mole Valley](#)

### **Greenhouse specialists**

- [Greenhouse People](#)



# APPENDIX 4:

## SUPPLIERS OF EQUIPMENT AND TOOLS

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### Horticulture equipment (cont)

#### Jang seeders

- Terradonis (UK supplier [here](#))

#### Polytunnel specialists

- [First Tunnels](#)
- [Northern Polytunnels](#)

#### Scythe specialists

- [The Scythe Shop](#)

#### Wheelbarrows, carts and trolleys

- [Wheelbarrows](#)

### Livestock Equipment

#### Cattle handling

- [IAE](#)

#### Livestock equipment general

- [Carrs Billington](#)
- [Mole Valley Farmers](#)

### Poultry Equipment

#### Feeders and drinkers

- [Commercial Poultry](#)
- [Dalton Engineering](#)
- [Potters Poultry](#)

#### Mobile Housing

- [McGregor Polytunnels](#)
- [Potters Poultry](#)

#### Nests and perches

- [Commercial Poultry](#)
- [Dalton Engineering](#)
- [Potters Poultry](#)

#### Poultry processing

- [Sedgbeer](#)

### Woodland Equipment

#### Chainsaws

- [FR Jones and Son](#)

#### Charcoal kilns

- [Four Seasons Fuel](#)
- [Woodsmith Experience](#)

#### Handtools

- [Four Seasons Fuel](#)
- [Woodsmith Experience](#)

#### Mobile sawmills

- [Lucas Mill](#)

#### PPE

- FR Jones and Son

#### Wood pellet mill

- [Kovo Novak](#) (Hungarian)

# APPENDICES 5 & 6: PRODUCE TESTING AND SECTOR FORUMS

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## Appendix 5- Produce testing companies

- [ALS](#)
- [Celtic Food](#)
- [Microtech](#)
- [NML](#)
- [One Scientific](#)
- [QMMS](#)

## Appendix 6- Sector Forums

Sector forums provide a route into asking questions of others doing similar things. In a business planning context they are especially useful in sectors where there isn't a lot of published information on yields and incomes from agro-ecological approaches.

### Arborists

- [Arbtalk](#)

### Cereals

- [UK Grain Lab](#)
- [Welsh Grain Forum](#)

### Coppicing and hedgelaying

- [Facebook group](#)

### Dairy

- [Alternative approaches to dairying](#) (google group)

### Fruit and vegetables

- [CSA Network discussion group](#) (Facebook)
- [Organic Growers Alliance](#)
- [UK Organic market gardeners](#) (Facebook).

### Livestock

- [Pasture for Life members forum](#)

### Poultry

- [Pastured poultry UK](#) (Facebook)



**The Landworkers' Alliance is a grassroots union of farmers, foresters and land-based workers in the UK. We campaign for the rights of producers and lobby the UK government and devolved nations for policies that support the infrastructure and economic climate central to our livelihoods. We have a growing membership who we work to support by developing agroecology training and solidarity support networks.**

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