

## Agricultural or Horticultural Scientist

**Agricultural scientists** research and develop new methods of raising animals and growing crops, and try them out on experimental farms and nurseries. They usually specialise in one area such as soil, crops, animals or farm produce.

**Horticultural scientists** specialise in the study of plants, plant identification and classification, and the growth and development of plants and crops including vegetables, fruits and ornamental plants. This includes studying plants used in gardening, landscaping and medicines.

### The Work

You could be:

- carrying out tests, collecting information, analysing results and writing reports
- doing research into animal or plant diseases, pest control, or the use of chemicals in farming or horticulture
- researching better methods of growing crops
- assessing and improving the ways in which farm produce is handled and preserved
- investigating the benefits of introducing genetically modified (GM) crops
- meeting companies which produce seeds or chemicals for farming or horticulture, to talk about their products.

Depending on your specialism, agriculture or horticulture, you could be:

- working out better ways of breeding and keeping livestock
- developing new crops
- visiting farmers to give advice on improving their farming practices
- investigating the impact of wildlife, insects or plant diseases on fruit production
- investigating the use of plants for medicinal purposes
- identifying and classifying new plant species.

### Pay

The figures below are only a guide. Actual pay rates may vary, depending on:

- where you work
- the size of company or organisation you work for
- the demand for the job.

Salaries for qualified agricultural or horticultural scientists tend to be in the range of £17,000 to £22,000 a year. With experience, this can rise to over £28,000 to £35,000 a year.

### Conditions

- You would work in an office or laboratory.
- You might teach in a college or university.
- You would also travel to visit farms and businesses.
- In most cases, you would work normal office hours, but in some cases you may have to work shifts or weekends.
- On farms you must sometimes wear protective clothing.

## Getting In

- You would normally need a good degree (SCQF Levels 9-11) in agriculture or horticulture or in another relevant science subject such as plant science, soil science or animal science. Other relevant degrees include biochemistry, biological sciences, biotechnology, ecology and chemistry.
- Entry requirements for a degree are 4-5 Highers. You will normally need passes in at least 1-2 maths or science subjects.
- For some jobs you need a postgraduate qualification.
- Postgraduate courses (SCQF Level 11) are available in Soil Science (University of Aberdeen) and Applied Poultry Science, Organic Farming and Soils and Sustainability (Scotland's Rural College (SRUC)).
- You usually need a driving licence.

You could work for a commercial company, a botanic garden, college, university, a government agency or research centre such as [Science and Advice for Scottish Agriculture \(SASA\)](#).

## What Does It Take

You need to be:

- methodical
- accurate, and able to pay close attention to detail
- patient
- able to concentrate well
- a good organiser, to carry out and supervise research
- able to analyse and interpret data
- able to work in a team and individually.

You need to have:

- a keen interest in agriculture or horticulture and the science and technology they are based on
- a desire to improve the productivity and environmental impact of agricultural and horticultural processes
- good IT skills
- excellent communication skills, both spoken and written.

## Training

- You would train and gain experience on the job with an employer.
- You would attend a range of short courses and other training sessions relevant to the work you are doing.
- Depending on the specialism you work in you might do BASIS Registration training and qualifications (for

the pesticide, fertiliser and allied industries) or you could undergo training for the Fertiliser Advisers Certificate and Training Scheme (FACTS), which covers the crops, soil, air and water aspects of agriculture.

- If you do not already hold a postgraduate qualification, you could study for one part time while you are working, for example, at a research institute.

## Getting On

- With experience you may move up to a senior scientific job or to a senior teaching job in college or university.
- You may do a PhD and specialise in research.
- In some cases in order to gain promotion, you may have to move to different parts of the country.
- There are opportunities to work abroad.

## Contacts

### Chartered Institute of Horticulture

Tel: 03330 050 181

Email: [cih@horticulture.org.uk](mailto:cih@horticulture.org.uk)

Website: [www.horticulture.org.uk](http://www.horticulture.org.uk)

Twitter: @cihort

Facebook: [www.facebook.com/CIHort](http://www.facebook.com/CIHort)

### James Hutton Institute

Tel: 0344 928 5428

Email: [info@hutton.ac.uk](mailto:info@hutton.ac.uk)

Website: [www.hutton.ac.uk/learning](http://www.hutton.ac.uk/learning)

Twitter: @JamesHuttonInst

Facebook: [www.facebook.com/JamesHuttonInstitute?ref=ts](http://www.facebook.com/JamesHuttonInstitute?ref=ts)

### Lantra Scotland

Tel: 01738 310164

Email: [scotland@lantra.co.uk](mailto:scotland@lantra.co.uk)

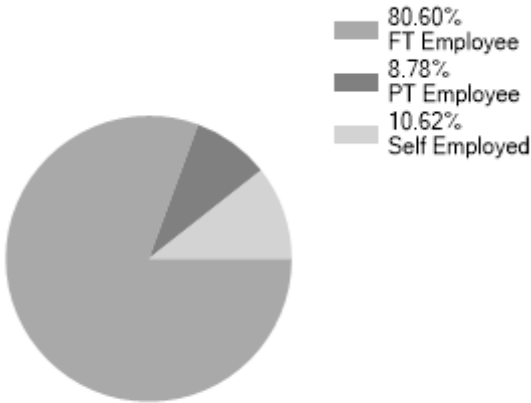
Website: [www.scotland.lantra.co.uk](http://www.scotland.lantra.co.uk)

Twitter: @LantraScotland

Facebook: [www.facebook.com/lantrascotland](http://www.facebook.com/lantrascotland)

Statistics

Employment Status UK %



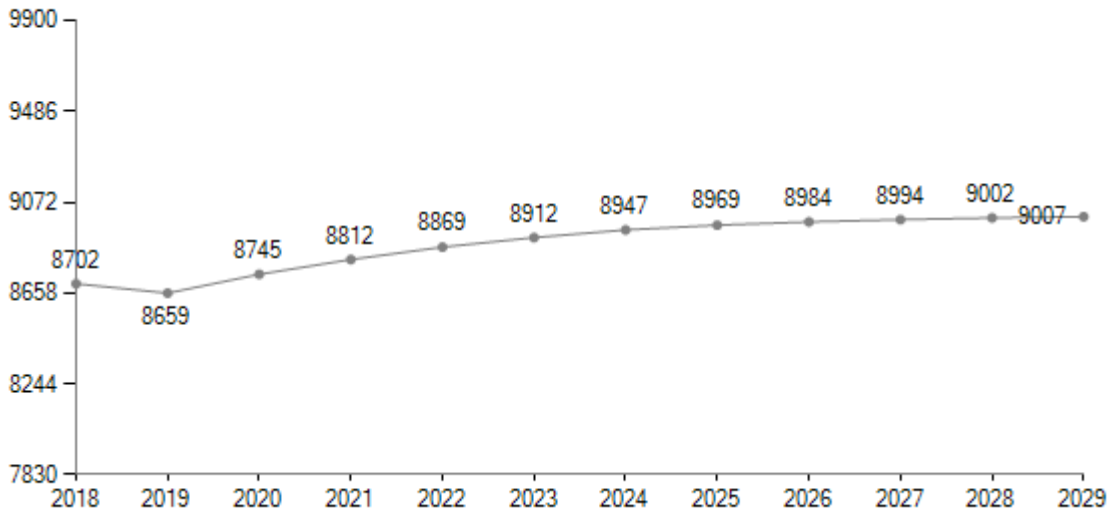
Past Unemployment - Scotland

Date: Dec 2018  
Unemployed: 0.05%

LMI data powered by [EMSI UK](#)

LMI data powered by [LMI for All](#)

Predicted Employment in Scotland



LMI data powered by [EMSI UK](#)