



# BSc (Hons) / BSc Animal Behaviour and Welfare (Clinical)

<b>UCAS code</b>	D390
<b>Institution code</b>	H12
<b>Duration</b>	4 years (full-time) including a one-year work placement. A three year programme is available for applicants with at least two years, full-time relevant work experience.
<b>Start date</b>	September 2022
<b>Accredited by</b>	This course is subject to re-accreditation
<b>Location</b>	<a href="#">Harper Adams University campus</a> (and location of work placement)*

## The course

Do you long to find out why animals behave the way they do and what this can tell us about their welfare? Do you care passionately about the welfare of animals but realise that applying scientific principles is likely to achieve better results than responding in a purely emotional way? Then this course is for you.

This degree enables those interested in the behaviour and welfare of companion and farm animals to study at degree level without covering the broader animal health sciences in detail. You will examine animal biology as it relates to the behaviour and welfare of animals, and have the opportunity to study ecology in relation to animal habitats.

All main groups of farm animals are represented on [our farm](#) and the [Companion Animal House](#) has a range of exotic and companion animals.

Students carry out an animal-based investigational project in their final year, looking at an aspect of animal behaviour or welfare.

## Choose your route

This degree has two routes: clinical and non-clinical.

The clinical route has been validated by the Association for the Study of Animal Behaviour (ASAB) accreditation committee as delivering the academic elements necessary for an individual to achieve ASAB certification as a clinical animal behaviourist (CCAB). All of the modules on this course are core (compulsory) to satisfy ASAB's requirements.

The [non-clinical route](#) (see module tables) does not lead to the CCAB qualification but does include a choice of optional modules.

## Duration

4 years (full-time) including a one-year work placement. A three year programme is available for applicants

with at least two years, full-time relevant work experience. Please contact [Admissions](#) for further information on this option.

## A-level entry requirements

- Offers tend to be in the region of **88 - 104** UCAS points (from A2 exams only)
- An understanding of a biological science based subject, for example Biology, Human Biology, Applied Science or Physical Education would be preferable. We would welcome applications from candidates offering other evidence of their suitability for this programme
- Students should typically be studying **3 subjects at A2 level** to be considered
- When combining qualifications no more than one Subsidiary Diploma or Diploma (or comparable qualification such as an Extended Certificate) will be considered alongside A levels (two A levels for BSc)
- General Studies and Critical Thinking are encouraged but **not** included in grades required
- Applicants are encouraged to gain experience working with a number of different animals in different settings. Applicants should include details of this in their application. Experience of different animals will enable reflection and will help with many aspects as students' progress through the course.
- **4 GCSEs at grade C/4 or above**, including English Language, Maths and a Science
- Where an applicant was not given access to GCSE Science, a BTEC level 2 in Science will be accepted as an alternative at a grade M. Confirmation will be required from the school/college that GCSE Science was not an option.
- Applicants can expect to receive offers including specific grades in specific subjects (for example, a B or C at A level, or an M or D for BTEC modules)
- Key Skills (and other level 2 variants) and First Certificates/Diplomas are not accepted in place of GCSE passes
- Interviews will take place on an ad-hoc basis should the Course Manager wish to discuss any aspect of your application and for all potentially suitable applicants who require visa sponsorship.
- Overseas applicants please check our [English Language Requirements](#)
- We have developed a range of measures and initiatives to give everyone the best chance to access our undergraduate degree programmes. The main feature of **Access to Harper** is our contextualised offer scheme. A contextualised offer is an offer which is reduced, by one grade or more from the standard entry requirement and is made to those applicants who may have experienced personal circumstances which put them at a disadvantage during their education, such as attending a low achieving school, living in an area of low participation in Higher Education or being a Care Leaver. The aim of this is to make the University more accessible for those applicants who may not have previously thought that they were eligible to apply. We have also introduced reduced entry requirements for those applicants who are over 21 years of age and further initiatives to make the application process easier for those applicants who need it.

To check if you qualify please visit the [Access to Harper](#) page.

*Note: Entry Requirements are for guidance only, please check the UCAS website or contact Admissions for further information.*

## Work placement

Students undertake a placement during their third year in an animal-related organisation of their choice. You may want to gain experience working at animal hospitals and shelters, research facilities, zoos and wildlife parks, veterinary practices, livestock farms, stables, catteries and kennels or other animal-based organisations.

## Accreditation

## Teaching and learning

Lectures are complemented by tutorials, visits and practical classes. Depending on the module, practicals may take the form of laboratory work, behaviour/welfare assessments or animal handling in the Companion Animal House or on the farm.

## Assessment methods

A wide range of assessment methods are used. Depending on the module these include examination, assignments, practical spot-tests and presentations.

## Learning in Higher Education – how is it different?

Whilst a student's prior experience or qualifications should prepare them for Higher Education, most will find that study at university level is organised differently than they might have experienced at either school or college. Higher Education sets out to prepare students to think and learn independently, so that they are able to continue learning new things beyond their studies and into the workplace, without needing a tutor to guide them. This means that the time spent in classes with tutors provides direction, guidance and support for work that students undertake independently through:

- finding useful information sources and compiling bibliographies of reading material, in paper and online
- reading and making notes to help make fuller sense of subjects
- engaging with online materials and activities found on the College's own virtual learning environment
- preparing assignments to practise skills and develop new insights and learning
- preparing for future classes so you can participate fully

In order to develop the skills of a graduate (whether at Foundation Degree or Honours Degree levels), students are expected to not only be able to recall and explain what they know but also to be able to:

- **apply** what they know to new problems or situations
- **analyse** information and data and make connections between topics to help make sense of a situation
- **synthesise**, or draw together, the information and understanding gained from a range of sources, to create new plans or ideas
- **evaluate** their own work and also the work of others, so that they can judge its value and relevance to a particular problem or situation

Tutors will expect students working towards a Degree to be able to use what they know to solve problems and answer meaningful questions about the way in which aspects of the world work and not just rote-learn information that they have been told or read, for later recall. This means using all the bullet-pointed skills and to think critically by questioning information, whilst also being rigorous in checking the value of the evidence used in making one's own points. Students will be expected to become increasingly responsible for recognising the areas where they themselves need to develop. Taking careful note of tutor feedback can help to identify the skills and abilities on which attention could usefully be focused. To be successful, students need to be self-motivated to study outside of classes, especially since in higher education, these higher level skills need to be practised independently.

At Harper Adams students are gradually supported to become less reliant on class-based learning, so that they are able to spend a greater proportion of their time in their final year working on projects of interest to themselves and in line with their future career aspirations. Whilst in the first year of a course, a student might spend around one-third of their time in class, they will typically spend 15 - 20% in class by the time they reach their Honours year. At Harper Adams, we are fortunate to have not only an extensive estate and great facilities for students to use as a source of information and inspiration, we also have a well-stocked library and access to countless specialist sources of paper-based and online information. Many of the staff at Harper Adams are involved in research work, which helps ensure the content of the courses is at the forefront of the discipline. This also means that amongst the library books and online journals that students use, there may be some familiar names.

The [Bamford Library](#) and [Faccenda Centre](#) each have spaces in which students can work, either individually or in small groups, using either their own laptop computers or the provided desktop computers, all of which can access the network. Working spaces are zoned to reflect different working conditions, so there is a study space for everybody, whether they need silence or work better in a livelier environment.

\* During the Covid-19 Pandemic the University is delivering blended learning. Government guidance is being constantly reviewed to establish the learning events which can be delivered face to face. Please refer to our [frequently asked questions](#) for further details.

## Careers

This course prepares graduates for careers involving animal behaviour and also in animal welfare and management. Increased awareness of animal welfare and behaviour issues has opened up more employment opportunities in the animal sector.

Organisations that house animals are becoming more aware of the need for employees to understand animal welfare and behaviour.

Welfare organisations are expanding, and nutrition and pharmaceutical companies have careers suitable for graduates with a sound welfare education. Many graduates move into higher education as lecturers or researchers and others choose further postgraduate study.

# What will I study?

Year	Study time (The percentage of time spent in different learning activities)			Assessment methods (This is the breakdown of assessment methods)		
	% time in lectures, seminars and similar	% time in independent study	% time on placement	Written exams	Practical exams	Coursework
1	34%	66%	0%	60%	0%	40%
2	30%	70%	0%	70%	0%	30%
3	0%	0%	100%	0%	0%	100%
4	19%	81%	0%	19%	38%	44%

Year 1	Year 2	Year 3	Year 4
Professional Scholarship Programme (PSP) 1 - Academic Skills Development (A4001C17) 15	Behavioural Methodology (A5015C17) 15	Placement year	Honours Research Project (HRPROJC17) 30
Fundamentals of Physiology (A4007C17) 15	Companion Animal Studies (A5012C17) 15		Diagnosis and Treatment of Behavioural Problems (A6013C17) 30
Companion Animal Management (A4013C17) 15	Farm Animal Science (A5016C17) 15		Applied Clinical Animal Behaviour (A6006C17) 15
Large Animal Management (A4015C17) 15	Principles of Animal Behaviour and Welfare (A5008C17) 15		Integrated Health Management (A6017C17) 15
Introduction to Animal Health (A4008C17) 15	Law and Professional Practice for Clinical Animal Behaviour (A5029C17) 15		Applied Companion Animal Health, Welfare and Behaviour (A6007C17) 15
Introduction to Animal Welfare, Behaviour and Ethics (A4009C17) 15	Animal Ethics (A5014C17) 15		Advances in Farm Animal Health, Welfare and Behaviour (A6003C17) 15
Adaptive Biology (A4002C17) 15	Philosophy of Zoos (A5007C17) 15		
Introduction to Ecology (C4004C17) 15	Research Methods (Animals) (A5011C17) 15		

## Professional Scholarship Programme (PSP) 1 - Academic Skills Development

**Year of study** 1

**Code** A4001C17

**Credits** 15

**Core/option** Core

**Module contact** [Mrs Emily Chapman-Waterhouse](#)

This module supports the development of students' personal, academic, employability and self-management skills for students in the first year of their undergraduate studies. Whilst the module provides a basis for the rest of the Professional Scholarship Programme it also supports learning in every other module. The module will be delivered throughout the academic year to students on animal-health related undergraduate courses. The main rationale for a first year module of this type is to ensure all students are fully equipped for higher education and to provide space in the curriculum in which to develop relevant skills to aid progression within and out with technically oriented modules. The key themes addressed by this module include transition into higher education and beyond the first year, approaches to learning, independent study, effective communication for animal health-related vocations, reading and reviewing literature, referencing convention, using feedback for learning and using technology to enhance learning. Whilst the roots of the module are in academic skill development, learning resources and assessments will be tailored to the vocational areas relevant to students. Students will need to actively undertake a self- review of progress at regular intervals and develop action plans for self-development.

## Fundamentals of Physiology

**Year of study** 1  
**Code** A4007C17  
**Credits** 15  
**Core/option** Core  
**Module contact** [Jim Huntington](#)

This module introduces important anatomical terms and describes the concepts required to understand the processes involved in the functioning of organ systems and the maintenance of homeostasis in vertebrate species, including humans, food producing animals, companion animals and other species addressed within the programmes this module has been validated for. A broad knowledge of normal body structure and functioning provided by this module will be invaluable for students studying modules within the animal related programmes such as *Companion Animal Studies*, *Principles of Animal Health*, and *Animal Disease Sciences*. For those studying food related programmes the module will be invaluable for the study of *Well-being Through the Lifecycle* and later modules such as *Advanced Aspects of Nutrition*. This module is designed to be a prerequisite (for some courses) to either *Veterinary Physiology* or *Applied Anatomy and Physiology*.

## Companion Animal Management

**Year of study** 1  
**Code** A4013C17  
**Credits** 15  
**Core/option** Core  
**Module contact** [Mrs Jennifer Sadler](#)

An understanding of companion animal management practices is essential for working within the animal industry to promote good health and welfare for companion, collection and experimental animals.

The module will provide learners with knowledge of relevant companion animal management practices with emphasis placed on environmental requirements, nutritional needs, and animal management.

The module will underpin several modules at Levels 5 and 6 including *Companion Animal Studies*, and *Applied Companion Animal Health, Welfare and Behaviour*.

## Large Animal Management

**Year of study** 1  
**Code** A4015C17  
**Credits** 15  
**Core/option** Core

It is important that students studying animal-based courses have an understanding of the systems involved with the keeping of large animals and appreciate the commercial context in which many of these animals are kept. This module will highlight the differences in the approach to the management of large animals in comparison to that for companion animals (covered in *Companion Animal Management*). The underpinning knowledge gained in this module will enable these students to evaluate behavioural adaptation and the welfare of large animals and understand how management can impact upon the health of the animal. The students will be introduced to the husbandry requirements associated with the most common agricultural systems involving animals such as cattle (dairy and beef), sheep, pigs, poultry and horses. Students will gain sufficient knowledge of the requirements of the system, and the effects of the management of the animal on its health and welfare status.

## Introduction to Animal Health

**Year of study** 1  
**Code** A4008C17  
**Credits** 15  
**Core/option** Core  
**Module contact** [Mrs Helen Cartlidge](#)

Knowledge and understanding of key topics related to animal health, such as causes of disease, how the body responds to disease and preventative health care, are essential for all persons working with animals. This module aims to introduce students to these key topics creating a foundation of knowledge in animal health that can be built on in subsequent modules (follow on modules will vary depending on the individual course being studied).

## **Introduction to Animal Welfare, Behaviour and Ethics**

**Year of study** 1  
**Code** A4009C17  
**Credits** 15  
**Core/option** Core

This module will introduce students to the science of animal behaviour and the importance of behaviour in our understanding of animal welfare. It will also consider the ethics of society's usage of different types of animals and the role of legislation and different organisations in the promotion of the interests of animals. Examples will be drawn from a range of diverse species and scenarios to illustrate the principles and practices discussed.

The content of this module will be of benefit to anyone considering working either directly or indirectly with animals in a range of environments. An appreciation of the science of animal behaviour and welfare and how underlying ethical values may influence the acceptability of animal use, will enhance the ability of the individual to undertake welfare assessments of the animals they are responsible for. The knowledge and understanding gained in the module will be an important foundation for those going on to study the module Principles of Animal Welfare and Behaviour.

## **Adaptive Biology**

**Year of study** 1  
**Code** A4002C17  
**Credits** 15  
**Core/option** Core  
**Module contact** [Professor Mark Rutter](#)

This module provides a broad overview of how the process of evolution through Darwinian natural selection has resulted in the diversity of life seen on Earth. Historic theories of evolution are evaluated, and the mechanisms underpinning evolution are explored, from microevolution, through speciation to macroevolution. The role of DNA and mechanisms of inheritance are studied, as is animal taxonomy. The evolution of humans is considered, along with the history and process of animal domestication. The effects of evolution and domestication on animal physiology and behaviour are explored. The module is designed to give the students a deeper understanding of evolution and its role underpinning the biological sciences.

## **Introduction to Ecology**

**Year of study** 1  
**Code** C4004C17  
**Credits** 15  
**Core/option** Core  
**Module contact** [Dr Nicky Hunter](#)

Ecology is about understanding the dynamic changes in individuals, populations, communities and ecosystems in relation to each other and the physical environment. This requires knowledge of the essential

processes that determine the distribution and abundance of organisms and the variety of complex biotic and abiotic interactions that take place. This module is designed to provide students with a general understanding of the ecology of living systems together with an introduction to basic ecological theory. This module will include a field studies element which will deliver the practical elements of identification, sampling and analysis of data collected.

## Behavioural Methodology

**Year of study** 2  
**Code** A5015C17  
**Credits** 15  
**Core/option** Core  
**Module contact** [Professor Mark Rutter](#)

This module will cover the principles and methods of quantitative studies of animal behaviour. The often subjective nature of animal behaviour makes it all the more important to devise and conduct experimental studies that allow behavioural data to be recorded, analysed and interpreted objectively. This module aims to teach students to devise and conduct a variety of behavioural experiments, and use the knowledge and understanding gained from the module Principles of Animal Behaviour and Welfare to interpret their data. The synthesis of these should enable them to critically appraise published behavioural research papers. Note that this module will not teach statistical methods – these are taught as part of the Research Methods module.

## Companion Animal Studies

**Year of study** 2  
**Code** A5012C17  
**Credits** 15  
**Core/option** Core  
**Module contact** [Mrs Susan Jeavons](#)

An understanding of the principles of companion animal nutrition, health, and reproduction is essential for the successful management of companion animals.

This module is designed to introduce students to the principles of companion animal nutrition and the effects of differences in digestive anatomy. As well as the physiological processes on nutrients supply, nutrient requirements and diet composition.

Reproductive processes of a variety of companion animals will also be considered, with an understanding of how genetic information can be passed to the next generation in breeding programmes.

Companion animal health will be explored for a variety of companion animal species. The effect of health on welfare and behaviour will also be considered.

## Farm Animal Science

**Year of study** 2  
**Code** A5016C17  
**Credits** 15  
**Core/option** Core  
**Module contact** [Dr Emma Bleach](#)

The ability of farmers to manipulate the outputs of animal production systems and consequently their productivity, environmental impact and profitability depends on the successful application of animal sciences. This module will build on the first year agricultural /animal science and animal production modules and will cover the essential principles of animal reproduction, lactation, breeding, nutrition, growth and health & welfare in a number of farm animal species and a range of livestock production systems.

## Principles of Animal Behaviour and Welfare



**Year of study** 2  
**Code** A5008C17  
**Credits** 15  
**Core/option** Core

Their complex behaviour is one of the main factors that distinguish the Animalia from the other Kingdoms of Life. This module aims to explore the richness and diversity of the behaviour we see in the animal kingdom, considering the various factors that have influenced its evolution. Although there will be an emphasis on the more complex behaviour patterns seen in the higher animals, this module will consider the behaviour of animals in general, and will not focus on just the domesticated species. This diverse approach will help in the understanding of the general principles which underpin the development of the various patterns of behaviour we observe in animals.

Animal welfare is of major concern to those working in the animal industry as well as the general public. In this module, students are encouraged to consider the issues that affect the welfare of many groups of animals such as farm, companion, zoo and research animals. The physiological and behavioural changes which occur when welfare is compromised will be studied and how these may be used to assess an animal's welfare status. The philosophical and ethical considerations of how we use animals will be discussed and an overview is given of the legislation which governs animal welfare across a range of species.

## **Law and Professional Practice for Clinical Animal Behaviour**

**Year of study** 2  
**Code** A5029C17  
**Credits** 15  
**Core/option** Core  
**Module contact** [Mr Stephen Baugh](#)

It is vital that interactions with clients and colleagues are carried out professionally and appropriately in order to ensure that clinical animal behaviourists comply with legal and ethical requirements.

This module explores the responsibilities and limitations of the role of the professionals who may be involved in a clinical animal behaviour case. The module will determine the legal and professional issues that may arise when consulting with members of the public and considers how these issues may be avoided or resolved. A thorough understanding of the UK legal and judicial processes will be developed in order to demonstrate how these underpin the behaviourists' actions when consulting with a client and patient.

## **Animal Ethics**

**Year of study** 2  
**Code** A5014C17  
**Credits** 15  
**Core/option** Core  
**Module contact** [Mr Stephen Baugh](#)

Most of us interact with animals on a daily basis, whether that be via our pets, via commercial animals in a work environment or through the animal products that most of us eat. Through these interactions animals are treated by humans in particular ways dependent on many factors including species, utility, religious or cultural beliefs and beliefs based on an animal's sentience or intrinsic value. This module considers our interactions with animals and explores the challenges we face when making moral judgements about how we utilise and treat animals. We will consider many questions that underpin our beliefs about other species and our interactions with them. How should we treat animals? Is it acceptable to use animals for our own benefit? Do animals have intrinsic value? Do animals have rights?

The main ethical theories that are useful when exploring these issues are discussed and explained and examples of how these theories can be applied to our interactions with animals are discussed.

## **Philosophy of Zoos**

**Year of study** 2  
**Code** A5007C17  
**Credits** 15  
**Core/option** Core  
**Module contact** [Dr Ellen Williams](#)

Zoos and menageries began as prestigious private collections. In the 19<sup>th</sup> century many zoos were established as sites of recreation. The primary role of entertainment continued to the 1960s but as societies views have changed, zoos have had to revise their "missions". Development of zoo licensing legislation and key organisations such as British and Irish Association of Zoos and Aquariums (BIAZA), European Association of Zoos and Aquaria (EAZA), World Association of Zoos and Aquariums (WAZA) has supported zoo development. Zoos have advanced from predominantly recreational facilities to centres of research excellence. Modern zoo missions are centred around four key principles: education, research, conservation and recreation. Students will appreciate the extensive development of zoos over time, including advances in understanding of animal health and welfare needs, and review how modern zoo missions are undertaken by zoological collections.

## Research Methods (Animals)

**Year of study** 2  
**Code** A5011C17  
**Credits** 15  
**Core/option** Core  
**Module contact** [Dr Stephen Mansbridge](#)

The ability to collect, analyse and interpret data appropriately is a core skill for all those involved in modern animal science. In view of this, research skills are important to enable the critical appraisal of published research, and for the development of appropriate study designs to fulfil research objectives. This module forms part of the Professional Scholarship Programme (PSP) and is taken by all BSc and MSci students studying animal programs. The skills gained within this module are essential for the completion of the level 6 / 7 research projects in the final year. Students will learn valuable skills covering critical literature reviews, the importance of research designs and protocols in the context of quality assurance schemes, data collection / analysis and presentation of information. By carrying out statistical analysis using appropriate software during tutorials, the students will develop their ICT skills and further their understanding of the role of statistics in the research process.

## Placement year

**Year of study** 3  
**Core/option** Core

Read our dedicated [Placement Learning](#) pages for information on the many benefits of the placement year.

## Honours Research Project

**Year of study** 4  
**Code** HRPROJC17  
**Credits** 30  
**Core/option** Core

The Honours Research Project is designed to allow students to develop the skills and personal resilience needed to undertake a sustained, significant and high quality project. In conjunction with his or her supervisor, and in light of detailed course specific advice, each student will select a topic for investigation. They will then plan, execute and report their project. The module will draw upon learning from other taught modules, but it also requires a high degree of independent learning.

Students will need to apply their learning about the research methods associated with their discipline as they locate data to support their project; they may need to apply methods creatively according to the

nature of their research topic. Throughout the module, students will be expected to make choices about the scale and manageability of their work; they will also need to apply good time management skills to ensure success. The project will require all students to search for literature related to their topic and to read independently. Students must make decisions about the direction of their research, and they will be expected to work pro-actively to benefit from supervision opportunities.

Students will be expected to ensure that each part of their project is ethically sound; this means following protocols but also by developing an ethical mind-set which is sensitive to stakeholders and issues arising in the research process. Students must ensure that they attend to issues of health and safety throughout their research.

## **Diagnosis and Treatment of Behavioural Problems**

**Year of study** 4

**Code** A6013C17

**Credits** 30

**Core/option** Core

**Module contact** [Mr Stephen Baugh](#)

Domesticated animals can develop behaviours that will be considered by their owners to be problematic. In many cases these “problem behaviours” will be normal behaviours inappropriately expressed. There are many techniques that have been developed over recent years to help the animal behaviourist to treat these conditions and minimise any welfare compromise to the animal and inconvenience to the owner.

This module explores the behavioural states of domestic animals that commonly contribute to behavioural problems and evaluates the range of techniques that can be used to treat them. Consideration of behavioural modification techniques are considered in detail in order to prepare the student to use these techniques when treating behavioural cases. It is vital that students have a reliable understanding and knowledge of the drugs commonly utilised in clinical animal behaviour and these will be discussed in detail with particular reference to inappropriate application and the potential health and safety and legal and moral issues associated with their use. Other techniques used in clinical animal behaviour such as pheromonal, dietary and herbal interventions are also considered in terms of their efficacy, safety and the ethics of their use in order to ensure students are aware of their appropriate and safe use.

## **Applied Clinical Animal Behaviour**

**Year of study** 4

**Code** A6006C17

**Credits** 15

**Core/option** Core

**Module contact** [Mr Stephen Baugh](#)

Effective and professional interactions with clients are vital to ensure the successful outcome of a behavioural case. Practitioners need to be skilled in the art and science of counselling and be able to effectively analyse data gathered in order to apply this knowledge to synthesize effective treatment protocols.

This module introduces the student to the underpinning theories of counselling and discusses the skills required of the counsellor in order to effectively gather relevant information to ensure that effective treatment protocols can be synthesized. An evaluation of client understanding and compliance is essential to maximise a successful outcome and a full understanding of the limitations is required. A sound understanding of the legal, professional and ethical issues that the practitioner may encounter are vital.

## **Integrated Health Management**

**Year of study** 4  
**Code** A6017C17  
**Credits** 15  
**Core/option** Core  
**Module contact** [Dr Claire Kershaw](#)

Often factors affecting animal health, disease, welfare and production such as nutrition, reproduction and epidemiology are taught independently. Within this module, students will learn the importance of considering how these individual factors influence one another. This module integrates these factors to develop student's ability to assess the management status of various animal management systems.

The application of knowledge and intellectual skills gained from the module and from experience within the animal industry will be required to formulate appropriate programmes for the maintenance of the health and welfare of the animals and also of the health and safety of staff members and the public.

## **Applied Companion Animal Health, Welfare and Behaviour**

**Year of study** 4  
**Code** A6007C17  
**Credits** 15  
**Core/option** Core  
**Module contact** [Mr Stephen Baugh](#)

An integrated understanding of companion animal health, welfare and behaviour is essential for the development of companion animal management programmes that ensure optimum welfare.

This module is designed to provide a detailed knowledge of the factors involved in the aetiology and development of common diseases seen in companion animals (cats, dogs, small mammals, birds and reptiles) and develops the skills required to recognise signs of ill health in animals and to develop disease control and prevention strategies.

The behaviour of companion animal species will be considered, how health can influence behaviour, why certain behaviours may be suppressed in domestic settings and how this may lead to the development of pathology and inappropriate or abnormal behaviours. The prevention and control of behavioural problems will also be considered.

Aspects of animal physiology, nutrition, health and general husbandry introduced in earlier modules will form an essential background for this module.

## **Advances in Farm Animal Health, Welfare and Behaviour**

**Year of study** 4  
**Code** A6003C17  
**Credits** 15  
**Core/option** Core

This module will deepen students' understanding of farm animal welfare and its links to animal health, behaviour and disease control. With the increasing public interest in the welfare of farm animals, an understanding of different indicators and how these may show an animal's welfare status is required by those involved in any aspect of animal production. The welfare of animals is important not only during their housing and management but in response to handling, transport and slaughter; this module will focus on the welfare of farm animals in all of these situations. There is also growing public concern for human food safety and the importance of animal health; graduates in all fields of animal science need to understand efficient diagnostic techniques and disease surveillance and possibilities for the future in this field. Understanding the production of effective animal medicines is also necessary.