

# Statement of the Royal Society's position on the use of animals in research

We have all benefited immensely from scientific research involving animals. From antibiotics and insulin to blood transfusions and treatments for cancer or HIV, virtually every medical achievement in the past century has depended directly or indirectly on research on animals. The same is true for veterinary medicine. Modern biology, with all its contributions to the well-being of society, is heavily dependent on research on animals. Along with the great majority of the scientific community, the Royal Society considers that the benefits provide the justification for the research that led to them. At the same time, the Society also recognises that special ethical considerations are involved and that animal research must be undertaken only with the greatest care.

All possible measures must be taken to minimise the suffering of animals used in research. The Society strongly endorses the principle of the 'three R's' (which are enshrined in UK legislation). This means that every effort must be made: to replace the use of live animals by non-animal alternatives; to reduce the number of animals used in research to the minimum required for meaningful results; and to refine the procedures so that the degree of suffering is kept to a minimum.

Current UK legislation requires all researchers who propose to undertake laboratory or field work involving animals to give full consideration to the three Rs and to seek independent advice from a local ethics committee. Researchers should seek, where possible, to avoid the use of animals and must advance sound scientific arguments for their use, explaining in proposals for research why no realistic alternative exists. The number of animals used in an experiment must be the minimum necessary to give a statistically valid result. Using too few animals can be as wasteful as using too many, but numbers can be kept down through good experimental design. The Society believes that it is important to ensure research is of the highest quality in every area of science. Such considerations apply with special force where the lives and welfare of animals are being considered. All research on animals should, therefore, be subjected to rigorous independent peer review in order to ensure the validity of both the approach and problem, and thereby promote an environment conducive to excellent science.

All research supported by the Society should be carried out with a high regard for animal welfare. The Society requires that the research it supports in the UK must comply with UK legislation. International research supported by the Society must be carried out in the spirit of the UK legislation as well as complying with all local legislation and ethical review procedures. For publication in the Society's journals, papers describing work with animals will be accepted only if the procedures used are clearly described and conform to the legal requirements of the country in which the work was carried out and to all institutional guidelines. In addition, referees are required to express any ethical concerns they may have about the animal experimentation under review. Papers will be accepted for publication only if they are considered to be ethically sound in the judgement of the editor.

The Royal Society takes an active role in policy discussions on the use of animals in research with numerous bodies including government, funding agencies, charities and discussion forums. It supports national and international efforts to improve conditions for laboratory animals. The Society condemns activities that break the law in pursuit of a particular position. It welcomes attempts to maintain and strengthen an ethical approach to the use of animals in research through discussion and debate.

**Royal Society policy document 16/06**

**September 2006**

**Update of Statement 3/02 (January 2002)**

**ISBN-13: 978 0 85403 628 8  
ISBN-10: 0 85403 628 8**

**This report can be found at [www.royalsoc.ac.uk](http://www.royalsoc.ac.uk)**

## Other Royal Society work in this area

***Statement of the Royal Society's position on the use of human biological material in research*** (2 page position statement, November 2004, ISBN 0 85403 607 5)

***The use of non-human animals in research: a guide for scientists*** (28 page document, February 2004, ISBN 0 85403 598 2)

***Response to the Nuffield Council on Bioethics consultation on the ethics of research involving animals*** (5 page consultation response, December 2003)

***The use of Animals in Research*** (3 page response to the inquiry by the House of Lords ad hoc Animals in Scientific Procedures Committee, June 2001)

***The use of genetically modified animals*** (46 page document, May 2001, ISBN 0 85403 556 7)

The full text of these reports can be found on the Royal Society's website at [www.royalsoc.ac.uk/policy](http://www.royalsoc.ac.uk/policy), or obtained from: Science Policy Section, The Royal Society, 6–9 Carlton House Terrace, London, SW1Y 5AG [science.policy@royalsoc.ac.uk](mailto:science.policy@royalsoc.ac.uk)